

JasperMate Datasheet

model: V1-EX2

JasperMate is a DIN-rail automation controller for industrial and commercial applications, programmed in plain English through a web browser. It runs JasperNode, which handles logic generation via the built-in AI assistant, local execution of deployed logic, and remote monitoring over an outbound secure connection.

The controller accepts a 12-36V DC supply and carries 8 digital inputs, 4 relay outputs and 4 isolated 4-20mA analog inputs onboard, with up to 10 expansion cards for larger jobs. Setup needs no programming cable, no software install and no licence: connect power and network, open jaspermate.link, and the controller is discovered automatically. Describe the logic, review the flow diagram the assistant draws, and approve it before anything runs.



ELECTRICAL SPECIFICATIONS

DC Supply Voltage	12-36VDC (12 Watt)
Onboard I/O	Included
Digital Inputs	8x Digital Input (12-24VDC)
Digital Outputs	4x Relay Output (3A)
Analog Inputs	4x Analog 4-20mA (Isolated)
Expansion	Up to 10 I/O Cards via Side-Bus

PERFORMANCE SPECIFICATIONS

Main Programming Method	AI Agent via chat
Alternative Programming	JavaScript
User Interface	Web Browser
Operating System	Optimised Ubuntu 20.04 LTS
CPU Architecture	Quad-core ARM Cortex-A55
Memory and Storage	DDR4 4GB / eMMC 32GB

CONNECTIVITY & INTERFACE

Ethernet	2x RJ45 Ports (Independent MACs)
WAN	For Cloud/AI (10/100/1000 Mbps)
LAN	For Local Fieldbus (10/100 Mbps)
Wireless (WiFi)	Dual-Band WiFi (802.11b/g/n/ac/ax)
Cellular	2x Nano-SIM, LTE Cat4 support
Serial Connectivity	2x RS485, 1x RS232, 1x CAN ¹

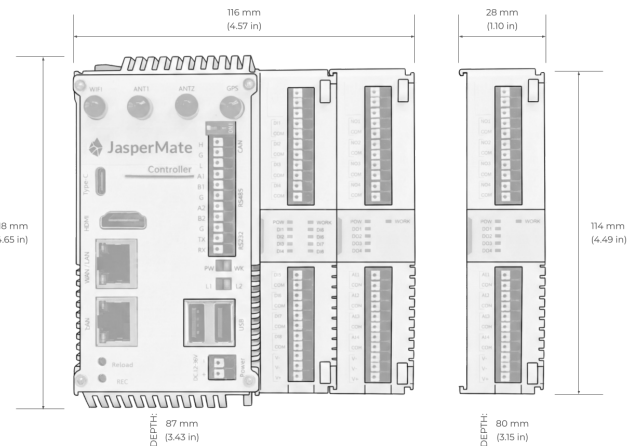
¹ Hardware ready, not supported in early firmware versions.

WIRING & INSTALLATION

Terminal Type	Spring-loaded Push-in
Recommended Wire	1.5mm ² (with bootlace ferrule)
Maximum Wire Size	⚠ Do not exceed 2.5mm ² wire size

MECHANICAL SPECIFICATIONS

Dimensions	Including onboard I/O
Base Unit	118H x 116W x 87D (mm) 4.65H x 4.57W x 3.43D (in)
Additional Expansion Card	114H x 28W x 80D (mm) 4.49H x 1.10W x 3.15D (in)
Weight	500g / 1.1 lb
Mounting option	Standard 35mm DIN Rail

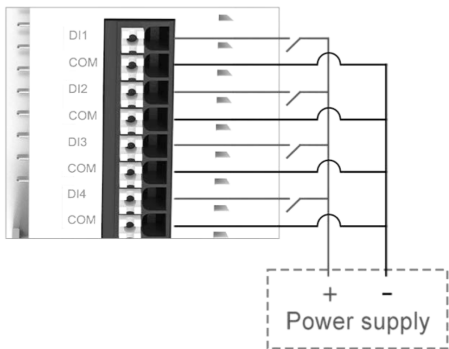


ENVIRONMENTAL SPECIFICATIONS

IP Rating	IP20 (Cabinet installation required)
Enclosure	Flame Retardant ABS/PC
Operating Temperature	-20°C to +70°C
Humidity	5% to 95% (Non-condensing)

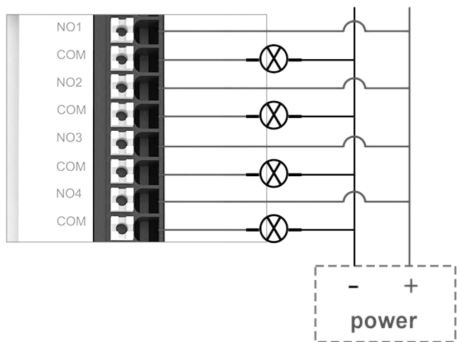
Standard Wiring & Expansions

DIGITAL INPUTS



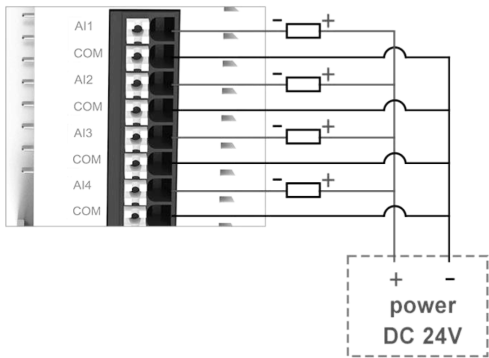
Compatible with standard switching sensors (e.g. proxies), switches, and buttons. Inputs rated for 12V to 24V DC.

RELAY OUTPUTS



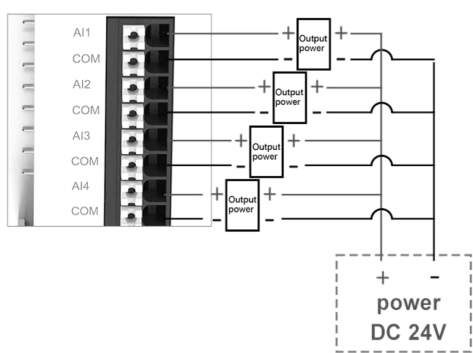
Dry contact relays rated for 3A. Perfect for switching contactor coils, pilot lights, or signaling to other systems.

ANALOG INPUTS (2-WIRE)



Standard 2-wire 4-20mA inputs for level sensors, pressure transducers, and temperature transmitters.

ANALOG INPUTS (4-WIRE)



Standard 4-wire 4-20mA inputs for externally powered sensors and transmitters.

EXPANSION CARDS

JasperMate supports up to 10 I/O cards in total.
⚠️ Digital Inputs and Outputs are not suitable for high-speed applications.

I/O Type	I/O Spec	IO8000	IO0440	IO4040	IO0080	IO0404
Digital Inputs	12-24VDC, no High Speed DIs	8	0	4	0	0
Analog Inputs	4..20mA	0	4	0	0	4
Digital Outputs	3A relay	0	4	4	8	0
Analog Outputs	4..20mA / 0..10V (selectable via JasperNode)	0	0	0	0	4