

RM1A40A50 Carlo Gavazzi 440VAC 50A Solid State Relay Datasheet



SKU: [710870230921](#)

Category: Relays & Contactors

Price: **\$85.43**

E-mail: sales@equipspares.com

Web: <https://www.equipspares.com>

Product Page:

<https://www.equipspares.com/product/rm1a40a50-carlo-gavazzi-440vac-50a-solid-state-relay>

Product Description

Carlo Gavazzi RM1A40A50 is a 1-phase zero-cross switching solid state relay rated for 440 VAC operational voltage and 50 A maximum load current. The unit features a dual control voltage input range of 20 to 280 VAC or 22 to 48 VDC, utilizing Direct Copper Bonding (DCB) technology for optimized thermal management. Structural elements include a built-in varistor for transient overvoltage protection up to 800 Vp, self-lifting screw terminals accommodating up to 16 mm² wiring, and a clip-on IP20 protection cover. The relay provides 4000 Vrms opto-isolation between input and output, integrated LED status indication, and an antiparallel thyristor output architecture.

RM1A40A50 Specifications

Model Number: RM1A40A50

Brand: Carlo Gavazzi

Product Category: Solid State Relay (SSR)

Phase: 1-Phase

Switching Mode: Zero-Cross

Operating Voltage (Ue): 42 to 440 VAC

Peak Blocking Voltage: 800 Vp

Rated Operational Current (AC-51): 50 A

Rated Operational Current (AC-53a): 15 A

Control Voltage (AC): 20 to 280 VAC

Control Voltage (DC): 22 to 48 VDC

Isolation Voltage (Input to Output): 4000 Vrms

Protection Rating: IP20

Terminal Type: Screw with captive clamp

Maximum Cable Capacity: 16 mm²

Thermal Technology: Direct Copper Bonding (DCB)

Transient Protection: Built-in Varistor

Status Indicator: LED

Mounting Type: Panel Mount

Weight: 0.10 kg

Certifications: CE, UL, CSA, CCC, EAC, UKCA

RM1A40A50 Applications

Primary applications include integration into industrial heating control panels, plastic injection molding machines, and HVAC thermal management systems. Deployed within CNC spindle cooling units, commercial packaging machinery, and automated lighting control cabinets requiring high-frequency zero-cross switching. Utilized in semiconductor manufacturing equipment and food processing ovens to provide precise, transient-protected load regulation.

Supplemental Images

