



Main

Range of product	Zelio Relay
Series name	Miniature
Product or component type	Plug-in relay
Device short name	RXM
Contacts type and composition	4 C/O
Control circuit voltage	110 V DC
[Ithe] conventional enclosed thermal current	3 A at -40...55 °C
Status LED	Without
Control type	Lockable test button
Utilisation coefficient	20 %

Complementary

Shape of pin	Flat
[Ui] rated insulation voltage	300 V conforming to UL 300 V conforming to CSA 250 V conforming to IEC
[Uimp] rated impulse withstand voltage	2.5 kV for 1.2/50 µs
Contacts material	Gold plated bifurcated silver
[Ie] rated operational current	3 A at 277 V AC conforming to UL 3 A at 28 V DC conforming to UL 1 A at 250 V AC (NC) conforming to IEC 1 A at 28 V DC (NC) conforming to IEC 2 A at 250 V AC (NO) conforming to IEC 2 A at 28 V DC (NO) conforming to IEC
Maximum switching voltage	250 V conforming to IEC
Resistive rated load	3 A at 28 V DC 3 A at 250 V AC
Maximum switching capacity	750 VA/84 W
Minimum switching capacity	15 mW at 3 mA, 5 V
Operating rate	<= 18000 cycles/hour no-load <= 1200 cycles/hour under load
Mechanical durability	10000000 cycles
Electrical durability	100000 cycles for resistive load depending on mounting position and working environment
Average coil consumption in W	0.9 W
Drop-out voltage threshold	>= 0.1 Uc
Operate time	20 ms
Release time	20 ms
Average coil resistance	13440 Ohm at 20 °C +/- 10 %
Rated operational voltage limits	88...121 V DC
Protection category	RT I
Operating position	Any position
Product weight	0.037 kg

Environment

Dielectric strength	2000 V AC between poles with basic insulation 2000 V AC between coil and contact with reinforced insulation 1300 V AC between contacts with micro disconnection insulation
Product certifications	CE CSA GOST RoHS UL REACH Lloyd's
Standards	EN/IEC 61810-1 UL 508 CSA C22.2 No 14
Ambient air temperature for storage	-40...85 °C
Ambient air temperature for operation	-40...55 °C
Vibration resistance	5 gn (f = 10...150 Hz), amplitude +/- 1 mm (on 5 cycles not operating) 3 gn (f = 10...150 Hz), amplitude +/- 1 mm (on 5 cycles in operation)
IP degree of protection	IP40 conforming to EN/IEC 60529
Shock resistance	30 gn not operating 10 gn in operation
Pollution degree	2

Technical drawing of the 1000 Series 1/2" component. The drawing shows a side view and a top view. Dimensions are provided in both millimeters (mm) and inches (in.).

Side View Dimensions:

- Overall length: 7.7 mm (0.30 in.)
- Distance from front face to first hole: 40 mm (1.57 in.)
- Distance between first and second hole: 6 mm (0.23 in.)
- Distance between second and third hole: 6.3 mm (0.24 in.)
- Distance between third and fourth hole: 6.3 mm (0.24 in.)
- Distance between fourth and fifth hole: 6.3 mm (0.24 in.)
- Distance between fifth and sixth hole: 6.3 mm (0.24 in.)
- Distance between sixth and seventh hole: 6.3 mm (0.24 in.)
- Distance between seventh and eighth hole: 6.3 mm (0.24 in.)
- Distance between eighth and ninth hole: 6.3 mm (0.24 in.)
- Distance between ninth and tenth hole: 6.3 mm (0.24 in.)
- Distance between tenth and eleventh hole: 6.3 mm (0.24 in.)
- Distance between eleventh and twelfth hole: 6.3 mm (0.24 in.)
- Distance between twelfth and thirteenth hole: 6.3 mm (0.24 in.)
- Distance between thirteenth and fourteenth hole: 6.3 mm (0.24 in.)
- Distance between fourteenth and fifteenth hole: 6.3 mm (0.24 in.)
- Distance between fifteenth and sixteenth hole: 6.3 mm (0.24 in.)
- Distance between sixteenth and seventeenth hole: 6.3 mm (0.24 in.)
- Distance between seventeenth and eighteenth hole: 6.3 mm (0.24 in.)
- Distance between eighteenth and nineteenth hole: 6.3 mm (0.24 in.)
- Distance between nineteenth and twentieth hole: 6.3 mm (0.24 in.)
- Distance between twentieth and twenty-first hole: 6.3 mm (0.24 in.)
- Distance between twenty-first and twenty-second hole: 6.3 mm (0.24 in.)
- Distance between twenty-second and twenty-third hole: 6.3 mm (0.24 in.)
- Distance between twenty-third and twenty-fourth hole: 6.3 mm (0.24 in.)
- Distance between twenty-fourth and twenty-fifth hole: 6.3 mm (0.24 in.)
- Distance between twenty-fifth and twenty-sixth hole: 6.3 mm (0.24 in.)
- Distance between twenty-sixth and twenty-seventh hole: 6.3 mm (0.24 in.)
- Distance between twenty-seventh and twenty-eighth hole: 6.3 mm (0.24 in.)
- Distance between twenty-eighth and twenty-ninth hole: 6.3 mm (0.24 in.)
- Distance between twenty-ninth and thirtieth hole: 6.3 mm (0.24 in.)
- Distance between thirtieth and thirty-first hole: 6.3 mm (0.24 in.)
- Distance between thirty-first and thirty-second hole: 6.3 mm (0.24 in.)
- Distance between thirty-second and thirty-third hole: 6.3 mm (0.24 in.)
- Distance between thirty-third and thirty-fourth hole: 6.3 mm (0.24 in.)
- Distance between thirty-fourth and thirty-fifth hole: 6.3 mm (0.24 in.)
- Distance between thirty-fifth and thirty-sixth hole: 6.3 mm (0.24 in.)
- Distance between thirty-sixth and thirty-seventh hole: 6.3 mm (0.24 in.)
- Distance between thirty-seventh and thirty-eighth hole: 6.3 mm (0.24 in.)
- Distance between thirty-eighth and thirty-ninth hole: 6.3 mm (0.24 in.)
- Distance between thirty-ninth and fortieth hole: 6.3 mm (0.24 in.)
- Distance between fortieth and forty-first hole: 6.3 mm (0.24 in.)
- Distance between forty-first and forty-second hole: 6.3 mm (0.24 in.)
- Distance between forty-second and forty-third hole: 6.3 mm (0.24 in.)
- Distance between forty-third and forty-fourth hole: 6.3 mm (0.24 in.)
- Distance between forty-fourth and forty-fifth hole: 6.3 mm (0.24 in.)
- Distance between forty-fifth and forty-sixth hole: 6.3 mm (0.24 in.)
- Distance between forty-sixth and forty-seventh hole: 6.3 mm (0.24 in.)
- Distance between forty-seventh and forty-eighth hole: 6.3 mm (0.24 in.)
- Distance between forty-eighth and forty-ninth hole: 6.3 mm (0.24 in.)
- Distance between forty-ninth and fiftieth hole: 6.3 mm (0.24 in.)
- Distance between fiftieth and fifty-first hole: 6.3 mm (0.24 in.)
- Distance between fifty-first and fifty-second hole: 6.3 mm (0.24 in.)
- Distance between fifty-second and fifty-third hole: 6.3 mm (0.24 in.)
- Distance between fifty-third and fifty-fourth hole: 6.3 mm (0.24 in.)
- Distance between fifty-fourth and fifty-fifth hole: 6.3 mm (0.24 in.)
- Distance between fifty-fifth and fifty-sixth hole: 6.3 mm (0.24 in.)
- Distance between fifty-sixth and fifty-seventh hole: 6.3 mm (0.24 in.)
- Distance between fifty-seventh and fifty-eighth hole: 6.3 mm (0.24 in.)
- Distance between fifty-eighth and fifty-ninth hole: 6.3 mm (0.24 in.)
- Distance between fifty-ninth and sixtieth hole: 6.3 mm (0.24 in.)
- Distance between sixtieth and sixty-first hole: 6.3 mm (0.24 in.)
- Distance between sixty-first and sixty-second hole: 6.3 mm (0.24 in.)
- Distance between sixty-second and sixty-third hole: 6.3 mm (0.24 in.)
- Distance between sixty-third and sixty-fourth hole: 6.3 mm (0.24 in.)
- Distance between sixty-fourth and sixty-fifth hole: 6.3 mm (0.24 in.)
- Distance between sixty-fifth and sixty-sixth hole: 6.3 mm (0.24 in.)
- Distance between sixty-sixth and sixty-seventh hole: 6.3 mm (0.24 in.)
- Distance between sixty-seventh and sixty-eighth hole: 6.3 mm (0.24 in.)
- Distance between sixty-eighth and sixty-ninth hole: 6.3 mm (0.24 in.)
- Distance between sixty-ninth and seventieth hole: 6.3 mm (0.24 in.)
- Distance between seventieth and seventy-first hole: 6.3 mm (0.24 in.)
- Distance between seventy-first and seventy-second hole: 6.3 mm (0.24 in.)
- Distance between seventy-second and seventy-third hole: 6.3 mm (0.24 in.)
- Distance between seventy-third and seventy-fourth hole: 6.3 mm (0.24 in.)
- Distance between seventy-fourth and seventy-fifth hole: 6.3 mm (0.24 in.)
- Distance between seventy-fifth and seventy-sixth hole: 6.3 mm (0.24 in.)
- Distance between seventy-sixth and seventy-seventh hole: 6.3 mm (0.24 in.)
- Distance between seventy-seventh and seventy-eighth hole: 6.3 mm (0.24 in.)
- Distance between seventy-eighth and seventy-ninth hole: 6.3 mm (0.24 in.)
- Distance between seventy-ninth and eightieth hole: 6.3 mm (0.24 in.)
- Distance between eightieth and eighty-first hole: 6.3 mm (0.24 in.)
- Distance between eighty-first and eighty-second hole: 6.3 mm (0.24 in.)
- Distance between eighty-second and eighty-third hole: 6.3 mm (0.24 in.)
- Distance between eighty-third and eighty-fourth hole: 6.3 mm (0.24 in.)
- Distance between eighty-fourth and eighty-fifth hole: 6.3 mm (0.24 in.)
- Distance between eighty-fifth and eighty-sixth hole: 6.3 mm (0.24 in.)
- Distance between eighty-sixth and eighty-seventh hole: 6.3 mm (0.24 in.)
- Distance between eighty-seventh and eighty-eighth hole: 6.3 mm (0.24 in.)
- Distance between eighty-eighth and eighty-ninth hole: 6.3 mm (0.24 in.)
- Distance between eighty-ninth and ninetieth hole: 6.3 mm (0.24 in.)
- Distance between ninetieth and one hundred hole: 6.3 mm (0.24 in.)

Top View Dimensions:

- Overall width: 27 mm (1.06 in.)
- Distance from front face to first hole: 21 mm (0.82 in.)
- Distance between first and second hole: 6 mm (0.23 in.)
- Distance between second and third hole: 6 mm (0.23 in.)
- Distance between third and fourth hole: 6 mm (0.23 in.)
- Distance between fourth and fifth hole: 6 mm (0.23 in.)
- Distance between fifth and sixth hole: 6 mm (0.23 in.)
- Distance between sixth and seventh hole: 6 mm (0.23 in.)
- Distance between seventh and eighth hole: 6 mm (0.23 in.)
- Distance between eighth and ninth hole: 6 mm (0.23 in.)
- Distance between ninth and tenth hole: 6 mm (0.23 in.)
- Distance between tenth and eleventh hole: 6 mm (0.23 in.)
- Distance between eleventh and twelfth hole: 6 mm (0.23 in.)
- Distance between twelfth and thirteenth hole: 6 mm (0.23 in.)
- Distance between thirteenth and fourteenth hole: 6 mm (0.23 in.)
- Distance between fourteenth and fifteenth hole: 6 mm (0.23 in.)
- Distance between fifteenth and sixteenth hole: 6 mm (0.23 in.)
- Distance between sixteenth and seventeenth hole: 6 mm (0.23 in.)
- Distance between seventeenth and eighteenth hole: 6 mm (0.23 in.)
- Distance between eighteenth and nineteenth hole: 6 mm (0.23 in.)
- Distance between nineteenth and twentieth hole: 6 mm (0.23 in.)
- Distance between twentieth and twenty-first hole: 6 mm (0.23 in.)
- Distance between twenty-first and twenty-second hole: 6 mm (0.23 in.)
- Distance between twenty-second and twenty-third hole: 6 mm (0.23 in.)
- Distance between twenty-third and twenty-fourth hole: 6 mm (0.23 in.)
- Distance between twenty-fourth and twenty-fifth hole: 6 mm (0.23 in.)
- Distance between twenty-fifth and twenty-sixth hole: 6 mm (0.23 in.)
- Distance between twenty-sixth and twenty-seventh hole: 6 mm (0.23 in.)
- Distance between twenty-seventh and twenty-eighth hole: 6 mm (0.23 in.)
- Distance between twenty-eighth and twenty-ninth hole: 6 mm (0.23 in.)
- Distance between twenty-ninth and thirtieth hole: 6 mm (0.23 in.)
- Distance between thirtieth and thirty-first hole: 6 mm (0.23 in.)
- Distance between thirty-first and thirty-second hole: 6 mm (0.23 in.)
- Distance between thirty-second and thirty-third hole: 6 mm (0.23 in.)
- Distance between thirty-third and thirty-fourth hole: 6 mm (0.23 in.)
- Distance between thirty-fourth and thirty-fifth hole: 6 mm (0.23 in.)
- Distance between thirty-fifth and thirty-sixth hole: 6 mm (0.23 in.)
- Distance between thirty-sixth and thirty-seventh hole: 6 mm (0.23 in.)
- Distance between thirty-seventh and thirty-eighth hole: 6 mm (0.23 in.)
- Distance between thirty-eighth and thirty-ninth hole: 6 mm (0.23 in.)
- Distance between thirty-ninth and fortieth hole: 6 mm (0.23 in.)
- Distance between fortieth and forty-first hole: 6 mm (0.23 in.)
- Distance between forty-first and forty-second hole: 6 mm (0.23 in.)
- Distance between forty-second and forty-third hole: 6 mm (0.23 in.)
- Distance between forty-third and forty-fourth hole: 6 mm (0.23 in.)
- Distance between forty-fourth and forty-fifth hole: 6 mm (0.23 in.)
- Distance between forty-fifth and forty-sixth hole: 6 mm (0.23 in.)
- Distance between forty-sixth and forty-seventh hole: 6 mm (0.23 in.)
- Distance between forty-seventh and forty-eighth hole: 6 mm (0.23 in.)
- Distance between forty-eighth and forty-ninth hole: 6 mm (0.23 in.)
- Distance between forty-ninth and fiftieth hole: 6 mm (0.23 in.)
- Distance between fiftieth and fifty-first hole: 6 mm (0.23 in.)
- Distance between fifty-first and fifty-second hole: 6 mm (0.23 in.)
- Distance between fifty-second and fifty-third hole: 6 mm (0.23 in.)
- Distance between fifty-third and fifty-fourth hole: 6 mm (0.23 in.)
- Distance between fifty-fourth and fifty-fifth hole: 6 mm (0.23 in.)
-

Technical drawing of a mechanical part with dimensions in mm and in.

Top dimensions (mm): 44, 4.6, 4.4

Top dimensions (in): 0.17, 0.0, 0.17

Bottom dimensions (mm): 2.5, 4.4, 2.5

Bottom dimensions (in): 0.9, 0.17, 0.9

Bottom dimensions (mm): 13.2, 0.51

Wiring Diagram



Symbols shown in blue correspond to Nema marking.

Electrical Durability of Contacts

Durability (inductive load) = durability (resistive load) x reduction coefficient.

Resistive AC load



- X Switching capacity (kVA)
Y Durability (Number of operating cycles)
A RXM2AB...
B RXM3AB...
C RXM4AB...
D RXM4GB...

Reduction coefficient for inductive AC load (depending on power factor $\cos \phi$)



- Y Reduction coefficient (A)

Maximum switching capacity on resistive DC load



- X Voltage DC
Y Current DC
A RXM2AB...
B RXM3AB...
C RXM4AB...
D RXM4GB...

Note : These are typical curves, actual durability depends on load, environment, duty cycle, etc.