

## TRIP RELAYS (I)

Applications  Interded for tripping applications where high denanding requirements in operating amonythin tripping some from sins to a may and beavancy capacity size meeted, which tripping some from sins to a may and beavancy capacity size meeted. The size of the contributed breakings are meeted, which tripping some from sins to a may and beavancy capacity size meeted. The size of the contributed breakings are meeted, which tripping some from sins to a may and beavancy capacity size meeted. The size of the contributed of the size of the contributed of the co	TRIF RELATS					
### Display the properties from from 10 a 10 and blook to 10 properties from from 10 and 10 and 10 to	Model		RD-2R	RD-2XR	RF-4R	RF-4XR
### Display the properties from from 10 a 10 and blook to 10 properties from from 10 and 10 and 10 to			4 6 ·	15		
Contacts no.         2 Changeover         4 Changeover           Connections         4 Changeover         4 Changeover           Weight (g)         125         250           Dimensions (mm)         22,5 x 50.4 x 72         42,5 x 50.4 x 72 (F short Type)           Coll characteristics         24,48,10,125, 20,20, 24,48,10,125, 20, 20, 24,48,10,125, 20, 20, 20, 44,81,10,125, 20, 20, 20, 44,81,10,125, 20, 20, 20, 44,81,10,125, 20, 20, 20, 44,81,10,125, 20, 20, 20, 44,81,10,125, 20, 20, 20, 44,81,10,125, 20, 20, 44,81,10,125, 20, 20, 44,81,10,125, 20, 20, 44,81,10,125, 20, 20, 42,81,10,125, 20, 20, 42,81,10,125, 20, 20, 44,81,10,125, 20, 20, 20, 44,81,10,125, 20, 20, 20, 44,81,10,125, 20, 20, 20, 20, 20, 20, 20, 20, 20, 20	Applications		(with tripping time from 8ms to 3 ms) and breaking capacity are needed,			
Contacts no.         2 Changeover         4 Changeover         4 Changeover           Connections         (-)   1	High burden configuration		not av	ailable	See page 15 for	technical details
Connections    Connections	Construction characteristics					
Connections    Connections	Contacts no.		2 Changeover		4 Changeover	
Weight (g)   125   250   25	Connections		(-) 1 3 (+) 2	7 5 8 4	(-) 1 4 _ (+) 2 5 _ 6 _	7 12 18 13 9 14
Dimensions (mm)   22,5 x 50,4 x 72   42,5 x 50,4 x 72 (F short Type)	Options		With OP options • LED included • Diode in parallel with the coil included			
Coil characteristics         24, 48, 110, 125, 220, 250, 40 ker, 710, 127, 230 vac (50-60 Hz)         24, 48, 110, 125, 220, 250 ker / 100, 127, 230 vac (50-60 Hz)         24, 48, 110, 125, 220, 250 ker / 100, 127, 230 vac (50-60 Hz)         24, 48, 110, 125, 220, 250 ker / 100, 127, 230 vac (50-60 Hz)         24, 48, 110, 125, 220, 250 ker / 100, 127, 230 ker (50-60 Hz)         24, 48, 110, 125, 220, 250 ker / 100, 127, 230 ker (50-60 Hz)         24, 48, 110, 125, 220, 250 ker / 100, 127, 230 ker (50-60 Hz)         24, 48, 110, 125, 220, 250 ker / 100, 127, 230 ker (50-60 Hz)         24, 48, 110, 125, 220, 250 ker / 100, 127, 230 ker (50-60 Hz)         24, 48, 110, 125, 220, 250 ker / 100, 127, 230 ker (50-60 Hz)         24, 48, 110, 125, 220, 250 ker / 100, 127, 230 ker (50-60 Hz)         24, 48, 110, 125, 220, 20, 200 ker / 100, 127, 200 ker / 100 k	Weight (g)		125		250	
24, 48, 110, 125, 220, 250 °° Vdc / 110, 127, 20 ° 24, 48, 110, 125, 220, 250 °° Vdc / 110, 127, 20 ° Vdc ° Vd			22,5 × 50,4 × 72		42,5 x 50,4 x 72 (F short Type)	
250	Coil characteristics					
See pick-up/release voltage   See pick-up/release voltage-temperature curves   No.95 W	Standard voltages <sup>(1)</sup>		250 (4) Vdc /110, 127,		250 <sup>(4)</sup> Vdc / 110, 127,	24, 48, 110, 125, 220, 250 <sup>(4)</sup> Vdc
See pick-up/release voltage   Consumptions   Peak • \$96 Vdc   Q,95 W   1 W   1 W   Peak • \$96 Vdc   Peak • \$96 Vdc   Q,3 A / 20 ms   2,5 A / 20 ms   Q,8 A	Voltage range			+10%	-20% U <sub>N</sub>	
Consumptions	Pick-up voltage					
Peak • ≤96 Vdc   Peak • >96 Vdc   Peak • Pe	Release voltage		See pick-up/release voltage-temperature curves			
Peak • \$96 Vdc         0,8 A / 20 ms         2,5 A / 20 ms         0,8 A / 20 ms         2,5 A / 20 ms           Operating time         0,3 A / 20 ms         0,8 A / 20 ms <td rowspan="2">Consumptions</td> <td>In permanence (U)</td> <td colspan="2">0,95 W</td> <td colspan="2">1 W</td>	Consumptions	In permanence (U)	0,95 W		1 W	
Operating time         <8 ms (<10 ms Vac)         <5,5 ms         <8 ms (<10 ms Vac)         <5,5 ms           Drop-out time         Vdc: <40 ms Vac: <50 ms		Peak • ≤96 Vdc	0,8 A / 20 ms	2,5 A / 20 ms	0,8 A / 20 ms	2,5 A / 20 ms
See breaking capacity   See breaking capacity   See value for 50.000 operations   Vac. 400		Peak • >96 Vdc	0,3 A / 20 ms	0,8 A / 20 ms	0,3 A / 20 ms	0,8 A / 20 ms
Drop-out time       Vdc: <40 ms Vdc:	Operating time					
Vac: <50 ms       Vac: <50 ms       Vac: <50 ms       Contacts       Contact material     AgNi       Contacts resistance <sup>(2)</sup> \$30 mΩ       Distance between contacts     1,2 mm       Permanent current     10 A       Instantaneous current     30 A during 1 s / 80 A during 200 ms / 200 A during 10 ms       Max. making capacity     See breaking capacity curves (Contact configuration type B)       Max. breaking capacity     See value for 50.000 operations       U <sub>max</sub> opened contact     250 Vdc / 400 Vac       Perfomance data     10² operations       Mechanical endurance     10² operations       Operating temperature     -25°C +70°C       Storage temperature     -30°C +70°C       Max. operating humidity     93% / +40°C       Operating altitude <sup>(3)</sup> <2000 m	Pick-up time			-		
Contact material       AgNi         Contacts resistance <sup>(2)</sup> ≤30 mΩ         Distance between contacts       1,2 mm         Permanent current       10 A         Instantaneous current       30 A during 1 s / 80 A during 200 ms / 200 A during 10 ms         Max. making capacity       40 A / 0,5 s / 110 Vdc         Breaking capacity       See breaking capacity curves (Contact configuration type B)         Max. breaking capacity       See value for 50.000 operations         U <sub>max</sub> opened contact       250 Vdc / 400 Vac         Perfomance data       107 operations         Mechanical endurance       107 operations         Operating temperature       -25°C +70°C         Storage temperature       -30°C +70°C         Max. operating humidity       93% / +40°C         Operating altitude <sup>(5)</sup> <2000 m	Drop-out time			Vdc: <40 ms		Vdc: <40 ms
Contacts resistance <sup>(2)</sup> ≤30 mΩ           Distance between contacts         1,2 mm           Permanent current         10 A           Instantaneous current         30 A during 1 s / 80 A during 200 ms / 200 A during 10 ms           Max. making capacity         40 A / 0,5 s / 110 Vdc           Breaking capacity         See breaking capacity curves (Contact configuration type B)           Max. breaking capacity         See value for 50.000 operations           U <sub>max</sub> opened contact         250 Vdc / 400 Vac           Perfomance data         107 operations           Mechanical endurance         107 operations           Operating temperature         -25°C +70°C           Storage temperature         -30°C +70°C           Max. operating humidity         93% / +40°C           Operating altitude <sup>(3)</sup> <2000 m	Contacts					
Distance between contacts  Permanent current  10 A  Instantaneous current  30 A during 1 s / 80 A during 200 ms / 200 A during 10 ms  Max. making capacity  40 A / 0,5 s / 110 Vdc  Breaking capacity  See breaking capacity curves (Contact configuration type B)  Max. breaking capacity  See value for 50.000 operations  U <sub>max</sub> opened contact  250 Vdc / 400 Vac  Perfomance data  Mechanical endurance  Operating temperature  107 operations  Operating temperature  30°C +70°C  Storage temperature  42000 m	Contact material		AgNi			
Permanent current  Instantaneous comment comment comment comment configuration in stype B  Instantaneous contact configuration type B  Instantaneous current  Instantaneous current  Instantaneous comment comment comment configuration in speed B  Instantaneous current  Instantaneous configuration type B  Insta	Contacts resistance <sup>(2)</sup>					
Instantaneous current  Max. making capacity  Breaking capacity  Max. breaking capacity  Max. breaking capacity  See breaking capacity curves (Contact configuration type B)  Max. breaking capacity  See value for 50.000 operations  Umax opened contact  250 Vdc / 400 Vac  Perfomance data  Mechanical endurance  Operating temperature  Tor operations  Operating temperature  Tor operations	Distance between contacts					
Max. making capacity  Breaking capacity  See breaking capacity curves (Contact configuration type B)  Max. breaking capacity  See value for 50.000 operations  U <sub>max</sub> opened contact  250 Vdc / 400 Vac  Perfomance data  Mechanical endurance  Operating temperature  107 operations  Operating temperature  -25°C +70°C  Storage temperature  Max. operating humidity  93% / +40°C  Operating altitude(5) <a #page-2000.pm"="" href="mailto:sold-number-style-like-style-style-lik&lt;/td&gt;&lt;td&gt;Permanent current&lt;/td&gt;&lt;td&gt;&lt;/td&gt;&lt;td colspan=4&gt;&lt;/td&gt;&lt;/tr&gt;&lt;tr&gt;&lt;td&gt;Breaking capacity  Max. breaking capacity  U&lt;sub&gt;max&lt;/sub&gt; opened contact  Perfomance data  Mechanical endurance  Operating temperature  Max. operating humidity  Operating altitude&lt;sup&gt;(3)&lt;/sup&gt;  See breaking capacity curves (Contact configuration type B)  See value for 50.000 operations  250 Vdc / 400 Vac  107 operations  107 operations  -25°C +70°C  -30°C +70°C  93% / +40°C  &lt;a href="><a #page-2000"="" href="#page-2000.pm&lt;/a&gt;  Operating altitude&lt;sup&gt;(3)&lt;/sup&gt;  See breaking capacity curves (Contact configuration type B)  See value for 50.000 operations  250 Vdc / 400 Vac  250 Vdc / 40&lt;/td&gt;&lt;td&gt;Instantaneous current&lt;/td&gt;&lt;td&gt;&lt;/td&gt;&lt;td colspan=4&gt;&lt;/td&gt;&lt;/tr&gt;&lt;tr&gt;&lt;td&gt;Max. breaking capacity  U&lt;sub&gt;max&lt;/sub&gt; opened contact  Perfomance data  Mechanical endurance  Operating temperature  Storage temperature  Max. operating humidity  Operating altitude&lt;sup&gt;(3)&lt;/sup&gt;  See value for 50.000 operations  250 Vdc / 400 Vac  107 operations  107 operations  -25°C +70°C  30°C +70°C  93% / +40°C  &lt;a href="></a>  Capacitage temperature  -2000 m</a>	Max. making capacity					
U <sub>max</sub> opened contact         250 Vdc / 400 Vac           Perfomance data         107 operations           Mechanical endurance         107 operations           Operating temperature         -25°C +70°C           Storage temperature         -30°C +70°C           Max. operating humidity         93% / +40°C           Operating altitude <sup>(3)</sup> <2000 m	Breaking capacity					
Perfomance data         107 operations           Mechanical endurance         107 operations           Operating temperature         -25°C +70°C           Storage temperature         -30°C +70°C           Max. operating humidity         93% / +40°C           Operating altitude <sup>(3)</sup> <2000 m	Max. breaking capacity		<u>'</u>			
Mechanical endurance 10 <sup>7</sup> operations  Operating temperature -25°C +70°C  Storage temperature -30°C +70°C  Max. operating humidity 93% / +40°C  Operating altitude <sup>(3)</sup> <2000 m	U <sub>max</sub> opened contact			250 Vdc	/ 400 Vac	
Operating temperature -25°C +70°C  Storage temperature -30°C +70°C  Max. operating humidity 93% / +40°C  Operating altitude <sup>(3)</sup> <2000 m	Perfomance data					
Storage temperature -30°C +70°C  Max. operating humidity 93% / +40°C  Operating altitude <sup>(3)</sup> <2000 m	Mechanical endurance					
Max. operating humidity 93% / +40°C  Operating altitude <sup>(5)</sup> <2000 m	Operating temperature					
Operating altitude <sup>(3)</sup> <2000 m	Storage temperature					
	Max. operating humidity					
	Operating altitude(3)			<20		



<sup>(1)</sup> Other voltage upon request (2) Guarantee data for relays just manufactured

<sup>(3)</sup> Ask for higher altitudes (4) Voltage not recognized by UL