



| Product designation                  |                         |      | 11RF9                  |
|--------------------------------------|-------------------------|------|------------------------|
| Product type designation             |                         |      | Motor protection relay |
| General characteristics              |                         |      |                        |
| Number of poles                      |                         | Nr.  | 3                      |
| Overvoltage category                 |                         |      |                        |
| Pollution degree                     |                         |      | 3                      |
| Frontal IP degree                    |                         |      | IP20                   |
| Type of release                      |                         |      | Thermal                |
| Protection fuse                      |                         |      |                        |
|                                      | gG (IEC)                | А    | 20                     |
|                                      | aM (IEC)                | А    | 8                      |
|                                      | RK5 (UL)                | А    | 25                     |
| Phase failure detection              |                         |      | yes                    |
| Reset mode                           |                         |      | Manual                 |
| Power circuit characteristics        |                         |      |                        |
| Rated insulation voltage Ui IEC/EN   |                         | V    | 690                    |
| Rated impulse withstand voltage Uimp |                         | kV   | 8                      |
| Rated operational voltage            |                         | V    | 690                    |
| Operational frequency                |                         |      |                        |
|                                      | min                     | Hz   | 0                      |
|                                      | max                     | Hz   | 400                    |
| Operational current le               |                         |      |                        |
|                                      | Operational current min | А    | 4.5                    |
|                                      | Operational current max | А    | 7.5                    |
| Tripping class                       |                         |      | 10A                    |
| Test Button                          |                         |      | yes                    |
| Trip indicator                       |                         |      | yes                    |
| Terminals                            |                         |      |                        |
|                                      | tupo                    |      | screw and              |
|                                      | type                    |      | washer                 |
|                                      | screw                   |      | M4                     |
|                                      | width                   | mm   | 9.8                    |
|                                      | tool                    |      | Phillips 2             |
| Tightening torque for terminals      |                         |      |                        |
|                                      | min                     | Nm   | 2.3                    |
|                                      | max                     | Nm   | 2.3                    |
|                                      | min                     | lbin | 1.7                    |
|                                      | max                     | lbin | 1.7                    |
| Conductor section                    |                         |      |                        |
|                                      | AWG/kcmil max           |      | 10                     |
| Auxiliary circuit characteristics    |                         |      |                        |
| Auxiliary contacts                   |                         |      |                        |
|                                      | NO                      | Nr.  | 1                      |
|                                      | NC                      | Nr.  | 1                      |



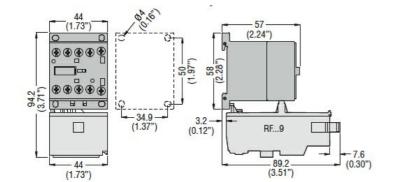
11RF975

| Auxiliary Rated insulation voltage Ui IEC/EN                |  | V           | 690  |
|---|--|-------------|--|
| Auxiliary Rated impulse withstand voltage Uimp              |  | kV          | 6  |
| Auxiliary Rated operational voltage                         |  | V           | 690  |
| Operating current AC15                                      |  |             |  |
|   | 24V                                    | А           | 3  |
|   | 120V                                   | A           | 3  |
|   | 240V                                   | A           | 1.5  |
|   | 380V                                   | А           | 0.95   |
|   | 480V                                   | А           | 0.75   |
|   | 500V                                   | А           | 0.72   |
|   | 600V                                   | А           | 0.6  |
| Operating current DC13                                      |  |             |  |
|   | 125V                                   | А           | 0.11   |
|   | 600V                                   | А           | 0.22   |
| IEC Conventional free air thermal current Ith               |  | Α           | 10   |
| Terminals   |  |             |  |
|   |  |             | screw and  |
|   | Auxiliary circuit type                 |             | washer   |
|   | Auxiliary circuit screw                |             | M3,5   |
|   | Auxiliary circuit width                | mm          | 8  |
|   | Auxiliary circuit tool                 |             | Phillips 1   |
| Conductor section   | •                                      |             | <i></i>  |
|   | Auxiliary circuit Flexible w/o lug max | mm²         | 2.5  |
|   | Auxiliary circut Flexible c/w lug max  | mm²         | 2.5  |
| Tightening torque for terminals                             |  |             |  |
|   | Auxiliary circuit min                  | Nm          | 1  |
|   | Auxiliary circuit max                  | Nm          | 1  |
|   | Auxiliary circuit min                  | Ibin        | 0.74   |
|   | Auxiliary circuit max                  | lbin        | 0.74   |
| UL/CSA and IEC/EN 60947-5-1 designation                     |  |             | B600-P600  |
| Ambient conditions  |  |             |  |
| Operating temperature                                       |  |             |  |
|   | min                                    | °C          | -20  |
|   | max                                    | °C          | 55   |
| Storage temperature   |  |             |  |
|   | min                                    | °C          | -55  |
|   | max                                    | °C          | 70   |
| Compensation temperature                                    |  |             |  |
|   | min                                    | °C          | -15  |
|   | max                                    | °C          | 55   |
| Max altitude  |  | m           | 3000   |
| Mechanical features   |  |             |  |
|   |  |             |  |
| Operating position  |  |             |  |
|   | normal                                 |             | Vertical plan  |
|   | normal<br>allowable                    |             | Vertical plan<br>±30°                                  |
|   |  |             | -  |
|   |  |             | ±30°<br>Direct mounting<br>on BG06                     |
| Operating position  |  | a           | ±30°<br>Direct mounting<br>on BG06<br>BG09 BG12        |
| Operating position<br>Fixing<br>Weight                      |  | g           | ±30°<br>Direct mounting<br>on BG06                     |
| Operating position<br>Fixing<br>Weight<br>UL technical data |  | g           | ±30°<br>Direct mounting<br>on BG06<br>BG09 BG12        |
| Operating position<br>Fixing<br>Weight                      | allowable                              |             | ±30°<br>Direct mounting<br>on BG06<br>BG09 BG12<br>116 |
| Operating position Fixing Weight UL technical data          |  | g<br>A<br>A | ±30°<br>Direct mounting<br>on BG06<br>BG09 BG12        |

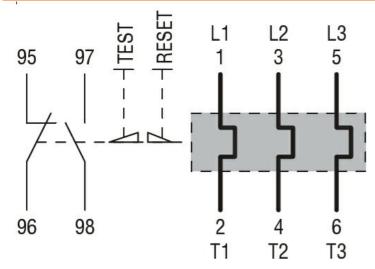
The characteristics described in this document are subject to updates or modifications at any time. The descriptions, technical and functional information, illustrations and instructions in this brochure are purely illustrative, and are consequently not contractually binding



11RF975 MOTORSCHUTZRELAIS RF9 4.5-7.5A



## Wiring diagrams



## Certifications and compliance

Compliance

| Compliance          |                  |
|---------------------|------------------|
|                     | CSA C22.2 n° 14  |
|                     | IEC/EN 60947-1   |
|                     | IEC/EN 60947-4-1 |
|                     | UL508            |
| Certifications      |                  |
|                     | CCC              |
|                     | CSA              |
|                     | cULus            |
|                     | EAC              |
| ETIM classification |                  |

**ETIM 8.0** 

EC000106 -Thermal overload relay