



Product designation

Product type designation

Auxiliary  
contactor  
BF00

### Contact characteristics

|                                                     |                                  |                          |
|-----------------------------------------------------|----------------------------------|--------------------------|
| Number of poles                                     | Nr.                              | 4                        |
| Rated insulation voltage $U_i$ IEC/EN               | V                                | 690                      |
| Rated impulse withstand voltage $U_{imp}$           | kV                               | 6                        |
| Operational frequency                               | min                              | Hz 25                    |
|                                                     | max                              | Hz 400                   |
| IEC Conventional free air thermal current $I_{th}$  | A                                | 10                       |
| Operational current $I_e$                           | AC-1 ( $\leq 55^\circ\text{C}$ ) | A 0                      |
| Protection fuse                                     | gG (IEC)                         | A 25                     |
| Tightening torque for terminals                     | min                              | Nm 1.5                   |
|                                                     | max                              | Nm 1.8                   |
|                                                     | min                              | lbin 1.1                 |
|                                                     | max                              | lbin 1.5                 |
| Tightening torque for coil terminal                 | min                              | Nm 0.8                   |
|                                                     | max                              | Nm 1                     |
|                                                     | min                              | lbin 0.8                 |
|                                                     | max                              | lbin 0.74                |
| Max number of wires simultaneously connectable      | Nr.                              | 2                        |
| Conductor section                                   | AWG/Kcmil                        |                          |
|                                                     | max                              | 10                       |
| Flexible w/o lug conductor section                  | min                              | mm <sup>2</sup> 1        |
|                                                     | max                              | mm <sup>2</sup> 6        |
| Flexible c/w lug conductor section                  | min                              | mm <sup>2</sup> 1        |
|                                                     | max                              | mm <sup>2</sup> 4        |
| Flexible with insulated spade lug conductor section | min                              | mm <sup>2</sup> 1        |
|                                                     | max                              | mm <sup>2</sup> 4        |
| Power terminal protection according to IEC/EN 60529 |                                  | IP20 when properly wired |

### Mechanical features

Operating position

normal  
allowable

Vertical plan  
 $\pm 30^\circ$

|                                                    |                          |          |          |
|----------------------------------------------------|--------------------------|----------|----------|
| Fixing                                             | Screw / DIN rail<br>35mm |          |          |
| Weight                                             | g                        | 368      |          |
| Auxiliary contact characteristics                  |                          |          |          |
| Thermal current I <sub>th</sub>                    | A                        | 10       |          |
| IEC/EN 60947-5-1 designation                       | A600 - P600              |          |          |
| Operating current AC15                             | 230V                     | A        | 3        |
|                                                    | 400V                     | A        | 1.9      |
|                                                    | 500V                     | A        | 1.4      |
|                                                    |                          |          |          |
| Operating current DC12                             | 110V                     | A        | 5.7      |
|                                                    |                          |          |          |
| Operating current DC13                             | 24V                      | A        | 5.7      |
|                                                    | 48V                      | A        | 2.9      |
|                                                    | 60V                      | A        | 2.3      |
|                                                    | 110V                     | A        | 1.25     |
|                                                    | 125V                     | A        | 1.1      |
|                                                    | 220V                     | A        | 0.55     |
|                                                    | 600V                     | A        | 0.2      |
|                                                    |                          |          |          |
| Operations                                         |                          |          |          |
| Mechanical life                                    | cycles                   | 20000000 |          |
| Safety related data                                |                          |          |          |
| Performance level B10d according to EN/ISO 13489-1 |                          |          |          |
|                                                    | mechanical load          | cycles   | 20000000 |
| EMC compatibility                                  | yes                      |          |          |
| AC coil operating                                  |                          |          |          |
| Rated AC voltage at 60Hz                           | V                        | 460      |          |
| AC operating voltage                               |                          |          |          |
| of 60Hz coil powered at 60Hz                       |                          |          |          |
|                                                    | pick-up                  | min      | %Us 80   |
|                                                    |                          | max      | %Us 110  |
| drop-out                                           |                          |          |          |
|                                                    |                          | min      | %Us 20   |
|                                                    |                          | max      | %Us 55   |
| AC average coil consumption at 20°C                |                          |          |          |
| of 60Hz coil powered at 60Hz                       |                          |          |          |
|                                                    | in-rush                  | VA       | 75       |
|                                                    | holding                  | VA       | 9        |
| Dissipation at holding ≤20°C 50Hz                  | W                        | 2.5      |          |
| Max cycles frequency                               |                          |          |          |
| Mechanical operation                               | cycles/h                 | 3600     |          |
| Operating times                                    |                          |          |          |
| Average time for U <sub>s</sub> control            |                          |          |          |
| in AC                                              |                          |          |          |
| Closing NO                                         |                          |          |          |
|                                                    | min                      | ms       | 8        |
|                                                    | max                      | ms       | 24       |
| Opening NO                                         |                          |          |          |
|                                                    | min                      | ms       | 10       |
|                                                    | max                      | ms       | 20       |
| Closing NC                                         |                          |          |          |
|                                                    | min                      | ms       | 17       |

Opening NC

max ms 30

min ms 7

max ms 18

#### UL technical data

Rated operational voltage AC (UL) V 600

General USE

Auxiliary contacts

AC current A 10

Contact rating of auxiliary contacts according to UL A600 - P600

#### Ambient conditions

Temperature

Operating temperature

min °C -50

max °C 70

Storage temperature

min °C -60

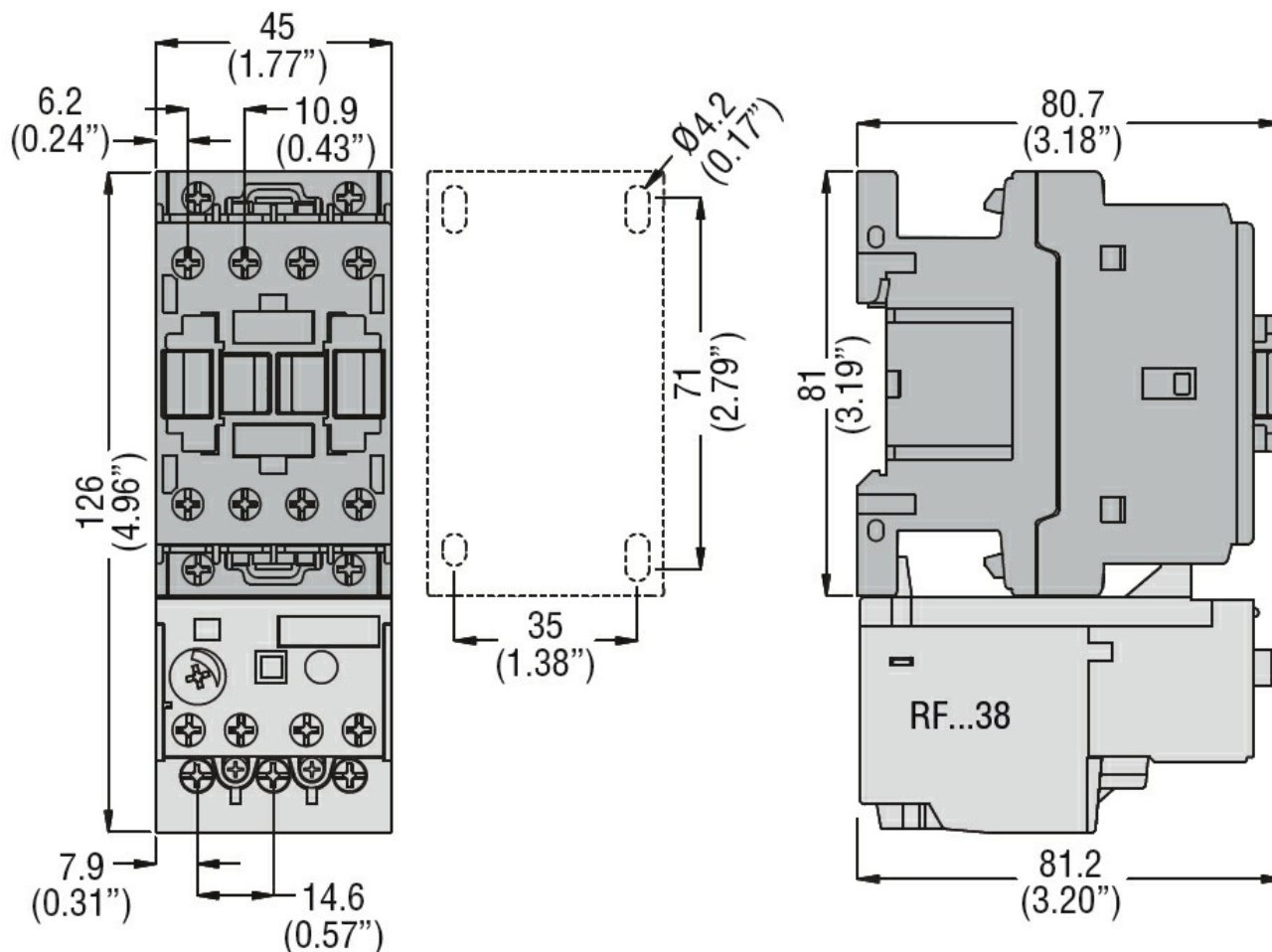
max °C 80

Max altitude m 3000

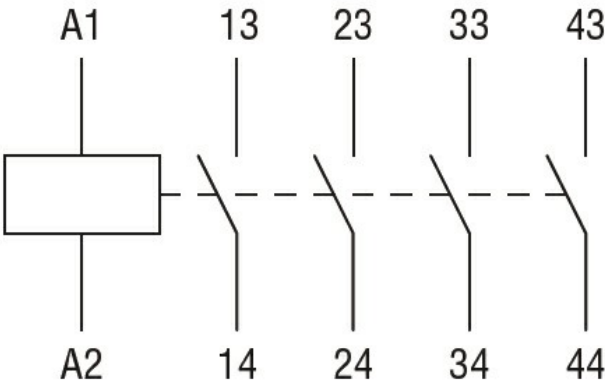
#### Resistance & Protection

Pollution degree 3

#### Dimensions



#### Wiring diagrams



Certifications and compliance

Compliance

|                        |
|------------------------|
| CSA C22.2 n° 60947-1   |
| CSA C22.2 n° 60947-5-1 |
| IEC/EN 60947-1         |
| IEC/EN 60947-5-1       |
| UL 60947-1             |
| UL 60947-5-1           |

Certificates

|       |
|-------|
| CCC   |
| cULus |
| EAC   |

ETIM classification

ETIM 8.0

EC000196 -  
Contactor relay