

|                                                        |                                                                                    |    |           |
|--------------------------------------------------------|------------------------------------------------------------------------------------|----|-----------|
| Product designation                                    | Rotary cam switches                                                                |    |           |
| Product type designation                               | 7GN40                                                                              |    |           |
| General characteristics                                |                                                                                    |    |           |
| Switching diagram                                      | 25 - 1-phase motor reversing switch with spring return                             |    |           |
| N° of elements                                         | 2                                                                                  |    |           |
| Mounting form                                          | U65 - Front mounting with red/yellow handle padlockable in 0 and protection covers |    |           |
| Contact characteristics                                |                                                                                    |    |           |
| Rated insulation voltage Ui                            | IEC/EN                                                                             | V  | 690       |
|                                                        | UL/CSA                                                                             | V  | 600       |
| Rated impulse withstand voltage Uimp                   |                                                                                    | kV | 6         |
| Conventional free air thermal current Ith              | IEC/EN                                                                             | A  | 40        |
|                                                        | UL/CSA                                                                             | A  | 50        |
| Rated operational voltage                              |                                                                                    | V  | 480       |
| Rated operational impulse voltage                      |                                                                                    | kV | 4         |
| Maximum fuse size for short-circuit protection In (gG) | 10kA                                                                               | A  | 40        |
|                                                        | 15kA                                                                               | A  | 40        |
|                                                        | 25kA                                                                               | A  | 40        |
|                                                        | 50kA                                                                               | A  | 40        |
|                                                        | 63kA                                                                               | A  | 40        |
| Rated short time current Icw                           | 1s                                                                                 | kA | 1000      |
| Conductivity                                           |                                                                                    |    | 10/5 mA/V |
| Operational current Ie IEC/EN                          |                                                                                    |    |           |
| AC1/AC21A                                              |                                                                                    | A  | 40        |
| AC15                                                   | 110V                                                                               | A  | 25        |
|                                                        | 220/230V                                                                           | A  | 22        |
|                                                        | 380/400V                                                                           | A  | 12        |
|                                                        | 660/690V                                                                           | A  | 2         |
| Rated operational power in AC                          |                                                                                    |    |           |
| Three-phase AC-3                                       | 220/230V                                                                           | kW | 8         |
|                                                        | 380/440V                                                                           | kW | 15        |
|                                                        | 500/690V                                                                           | kW | 15        |
| Single-phase AC-3                                      | 110V                                                                               | kW | 3         |
|                                                        | 220/230V                                                                           | kW | 6.5       |
|                                                        | 380/440V                                                                           | kW | 8         |
| Three-phase AC23A                                      | 220/230V                                                                           | kW | 8         |
|                                                        | 380/440V                                                                           | kW | 18.5      |

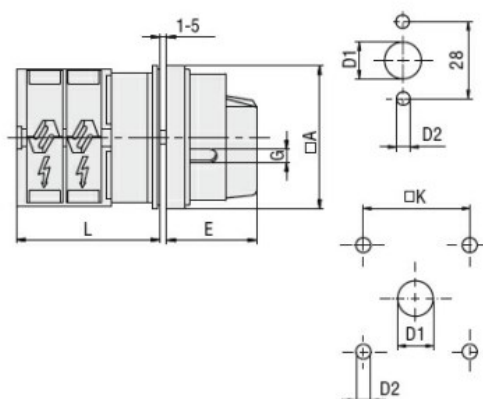
|                                        |          |                 |                   |
|----------------------------------------|----------|-----------------|-------------------|
|                                        | 500/690V | kW              | 22                |
| Single-phase AC23A                     |          |                 |                   |
|                                        | 110V     | kW              | 3                 |
|                                        | 220/230V | kW              | 6                 |
|                                        | 380/440V | kW              | 11                |
| Rated operational current in DC        |          |                 |                   |
| DC21A                                  |          |                 |                   |
|                                        | 48V      | A               | 40                |
|                                        | 60V      | A               | 40                |
|                                        | 110V     | A               | 6                 |
|                                        | 220V     | A               | 0.9               |
| DC23A (poles in series)                |          |                 |                   |
|                                        | 24V      | A               | 40 (1)            |
|                                        | 48V      | A               | 40 (2)            |
|                                        | 60V      | A               | 40 (3)            |
|                                        | 110V     | A               | 20 (3)            |
|                                        | 220V     | A               | 12 (4)            |
| DC13                                   |          |                 |                   |
|                                        | 24V      | A               | 40                |
|                                        | 48V      | A               | 32                |
|                                        | 60V      | A               | 16                |
|                                        | 110V     | A               | 3                 |
| Power dissipation                      |          | W               | 2.0               |
| <b>Mechanical features</b>             |          |                 |                   |
| Terminals screw                        |          |                 | M4                |
| Tightening torque for terminals max    |          | Nm              | 1.2               |
| Conductor size                         |          |                 |                   |
| AWG - Rigid cable                      |          |                 |                   |
|                                        | min      | AWG             | 16                |
|                                        | Max      | AWG             | 8                 |
| AWG - Flexible cable                   |          |                 |                   |
|                                        | min      | AWG             | 16                |
|                                        | Max      | AWG             | 10                |
| Conductor size (IEC) - Flexible cable  |          |                 |                   |
|                                        | min      | mm <sup>2</sup> | 1.5               |
|                                        | Max      | mm <sup>2</sup> | 6                 |
| Conductor size (IEC) - Rigid cable     |          |                 |                   |
|                                        | min      | mm <sup>2</sup> | 1.5               |
|                                        | Max      | mm <sup>2</sup> | 10                |
| Mechanical life                        |          | cycles          | 5x10 <sup>6</sup> |
| <b>UL technical data</b>               |          |                 |                   |
| Motor power for direct-on-line control |          |                 |                   |
| for three-phase motor                  |          |                 |                   |
|                                        | 120V     | HP              | 5                 |
|                                        | 240V     | HP              | 10                |
|                                        | 480V     | HP              | 20                |
|                                        | 600V     | HP              | 20                |
| for single-phase motor                 |          |                 |                   |
|                                        | 120V     | HP              | 2                 |
|                                        | 240V     | HP              | 5                 |
| <b>Ambient conditions</b>              |          |                 |                   |
| Temperature                            |          |                 |                   |
| Operating temperature                  |          |                 |                   |
|                                        | min      | °C              | -25               |

|                     |     |    |     |
|---------------------|-----|----|-----|
|                     | max | °C | +55 |
| Storage temperature | min | °C | -40 |
|                     | max | °C | +70 |

#### Resistance & Protection

|                     |      |
|---------------------|------|
| Frontal IP degree   | IP40 |
| Terminals IP degree | IP00 |

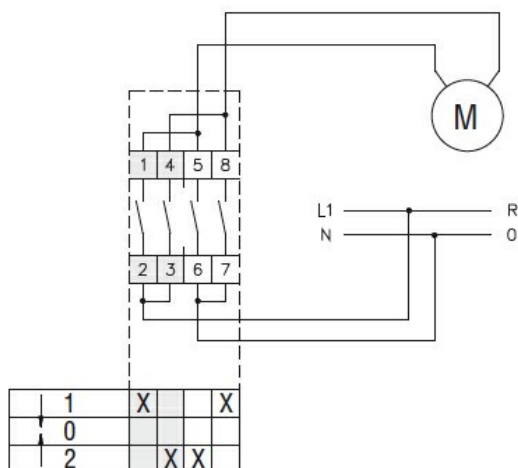
#### Dimensions



Standard drillings for 7GN125.  
Drillings on request for 4 screws fixing (4V version).

| Series | Dimensions |    |    |      |   |    | L    |      |          |       |
|--------|------------|----|----|------|---|----|------|------|----------|-------|
|        | □A         | D1 | D2 | E    | G | □K | 1    | 2    | 3.....12 |       |
| 7GN12  | 65         | 12 | 5  | 34.2 | 5 | 36 | 36.1 | 45.8 | 55.5     | 142.8 |
| 7GN20  | 65         | 12 | 5  | 34.2 | 5 | 36 | 36.1 | 45.8 | 55.5     | 142.8 |
| 7GN25  | 65         | 12 | 5  | 34.2 | 5 | 36 | 40.5 | 54.1 | 67.7     | 190.1 |
| 7GN32  | 65         | 14 | 5  | 38   | 6 | 48 | 46.5 | 61.6 | 76.7     | 212.6 |
| 7GN40  | 65         | 14 | 5  | 38   | 6 | 48 | 46.5 | 61.6 | 76.7     | 212.6 |
| 7GN63  | 65         | 14 | 5  | 38   | 6 | 48 | 50.3 | 68.4 | 86.5     | 249.4 |
| 7GN125 | 90         | 16 | 6  | 49   | 7 | 68 | 67.3 | 96.4 | 125.5    | 394.9 |

#### Wiring diagrams



#### Certifications and compliance

##### Compliance

CSA C22.2 n° 14  
IEC/EN/BS 60947-1  
IEC/EN/BS 60947-3  
IEC/EN/BS 60947-5-1  
UL60947-4-1

##### Certificates

cCSAus  
EAC  
UL

#### ETIM classification

ETIM 8.0

EC001029 -  
Selector switch,  
complete