

## DATASHEET - M22-DRL-R

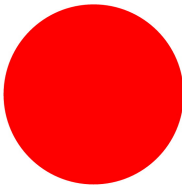


**Illuminated pushbutton actuator, RMQ-Titan, Flush, maintained, red,  
Blank, Bezel: titanium**

**Part no.** M22-DRL-R  
**Catalog No.** 216946  
**Alternate Catalog No.** M22-DRL-RQ  
**EL-Nummer (Norway)** 4355348

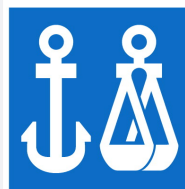


### Delivery program

|                            |   |    |                                                                                    |
|----------------------------|---|----|------------------------------------------------------------------------------------|
| Product range              |   |    | RMQ-Titan                                                                          |
| Basic function             |   |    | Illuminated pushbutton actuators                                                   |
| Mounting hole diameter     | Ø | mm | 22.5                                                                               |
| Single unit/Complete unit  |   |    | Single unit                                                                        |
| Design                     |   |    | Flush                                                                              |
|                            |   |    | maintained                                                                         |
| <b>Button plate</b>        |   |    |                                                                                    |
| button plate               |   |    | red                                                                                |
| Button plate               |   |    |  |
|                            |   |    | Blank                                                                              |
| Degree of Protection       |   |    | IP66, IP67, IP69                                                                   |
| Front ring                 |   |    | Bezel: titanium                                                                    |
| Connection to SmartWire-DT |   |    | yes<br>with SWD-RMQ connections                                                    |
| Front dimensions           |   |    | 29,7                                                                               |
| <b>Instructions</b>        |   |    | Stay-put/spring-return function can be changed on device                           |

### Technical data

|                             |              |                   |                                                                                |
|-----------------------------|--------------|-------------------|--------------------------------------------------------------------------------|
| <b>General</b>              |              |                   |                                                                                |
| Standards                   |              |                   | IEC/EN 60947<br>VDE 0660                                                       |
| Lifespan, mechanical        | Operations   | x 10 <sup>6</sup> | > 1                                                                            |
| Operating frequency         | Operations/h |                   | ≤ 1800                                                                         |
| Actuating force             |              | n                 | ≤ 5                                                                            |
| Climatic proofing           |              |                   | Damp heat, constant, to IEC 60068-2-78<br>Damp heat, cyclic, to IEC 60068-2-30 |
| Degree of Protection        |              |                   | IP66, IP67, IP69                                                               |
| Ambient temperature         |              |                   |                                                                                |
| Open                        |              | °C                | -25 - +70                                                                      |
| Mounting position           |              |                   | As required                                                                    |
| Mechanical shock resistance |              | g                 | 30<br>Shock duration 11 ms<br>Sinusoidal<br>according to IEC 60068-2-27        |
| shipping classification     |              |                   | DNV<br>GL<br>LR                                                                |

**DNV**

Germanischer Lloyd



## Design verification as per IEC/EN 61439

|                                                                                                                        |            |    |                                                                                                          |
|------------------------------------------------------------------------------------------------------------------------|------------|----|----------------------------------------------------------------------------------------------------------|
| Technical data for design verification                                                                                 |            |    |                                                                                                          |
| Rated operational current for specified heat dissipation                                                               | $I_n$      | A  | 0                                                                                                        |
| Heat dissipation per pole, current-dependent                                                                           | $P_{vid}$  | W  | 0                                                                                                        |
| Equipment heat dissipation, current-dependent                                                                          | $P_{vid}$  | W  | 0                                                                                                        |
| Static heat dissipation, non-current-dependent                                                                         | $P_{vs}$   | W  | 0                                                                                                        |
| Heat dissipation capacity                                                                                              | $P_{diss}$ | W  | 0                                                                                                        |
| Operating ambient temperature min.                                                                                     |            | °C | -25                                                                                                      |
| Operating ambient temperature max.                                                                                     |            | °C | 70                                                                                                       |
| IEC/EN 61439 design verification                                                                                       |            |    |                                                                                                          |
| 10.2 Strength of materials and parts                                                                                   |            |    |                                                                                                          |
| 10.2.2 Corrosion resistance                                                                                            |            |    | Meets the product standard's requirements.                                                               |
| 10.2.3.1 Verification of thermal stability of enclosures                                                               |            |    | Meets the product standard's requirements.                                                               |
| 10.2.3.2 Verification of resistance of insulating materials to normal heat                                             |            |    | Meets the product standard's requirements.                                                               |
| 10.2.3.3 Verification of resistance of insulating materials to abnormal heat and fire due to internal electric effects |            |    | Meets the product standard's requirements.                                                               |
| 10.2.4 Resistance to ultra-violet (UV) radiation                                                                       |            |    | Please enquire                                                                                           |
| 10.2.5 Lifting                                                                                                         |            |    | Does not apply, since the entire switchgear needs to be evaluated.                                       |
| 10.2.6 Mechanical impact                                                                                               |            |    | Does not apply, since the entire switchgear needs to be evaluated.                                       |
| 10.2.7 Inscriptions                                                                                                    |            |    | Meets the product standard's requirements.                                                               |
| 10.3 Degree of protection of ASSEMBLIES                                                                                |            |    | Does not apply, since the entire switchgear needs to be evaluated.                                       |
| 10.4 Clearances and creepage distances                                                                                 |            |    | Meets the product standard's requirements.                                                               |
| 10.5 Protection against electric shock                                                                                 |            |    | Does not apply, since the entire switchgear needs to be evaluated.                                       |
| 10.6 Incorporation of switching devices and components                                                                 |            |    | Does not apply, since the entire switchgear needs to be evaluated.                                       |
| 10.7 Internal electrical circuits and connections                                                                      |            |    | Is the panel builder's responsibility.                                                                   |
| 10.8 Connections for external conductors                                                                               |            |    | Is the panel builder's responsibility.                                                                   |
| 10.9 Insulation properties                                                                                             |            |    |                                                                                                          |
| 10.9.2 Power-frequency electric strength                                                                               |            |    | Is the panel builder's responsibility.                                                                   |
| 10.9.3 Impulse withstand voltage                                                                                       |            |    | Is the panel builder's responsibility.                                                                   |
| 10.9.4 Testing of enclosures made of insulating material                                                               |            |    | Is the panel builder's responsibility.                                                                   |
| 10.10 Temperature rise                                                                                                 |            |    | Not applicable.                                                                                          |
| 10.11 Short-circuit rating                                                                                             |            |    | Is the panel builder's responsibility. The specifications for the switchgear must be observed.           |
| 10.12 Electromagnetic compatibility                                                                                    |            |    | Is the panel builder's responsibility. The specifications for the switchgear must be observed.           |
| 10.13 Mechanical function                                                                                              |            |    | The device meets the requirements, provided the information in the instruction leaflet (IL) is observed. |

## Technical data ETIM 7.0

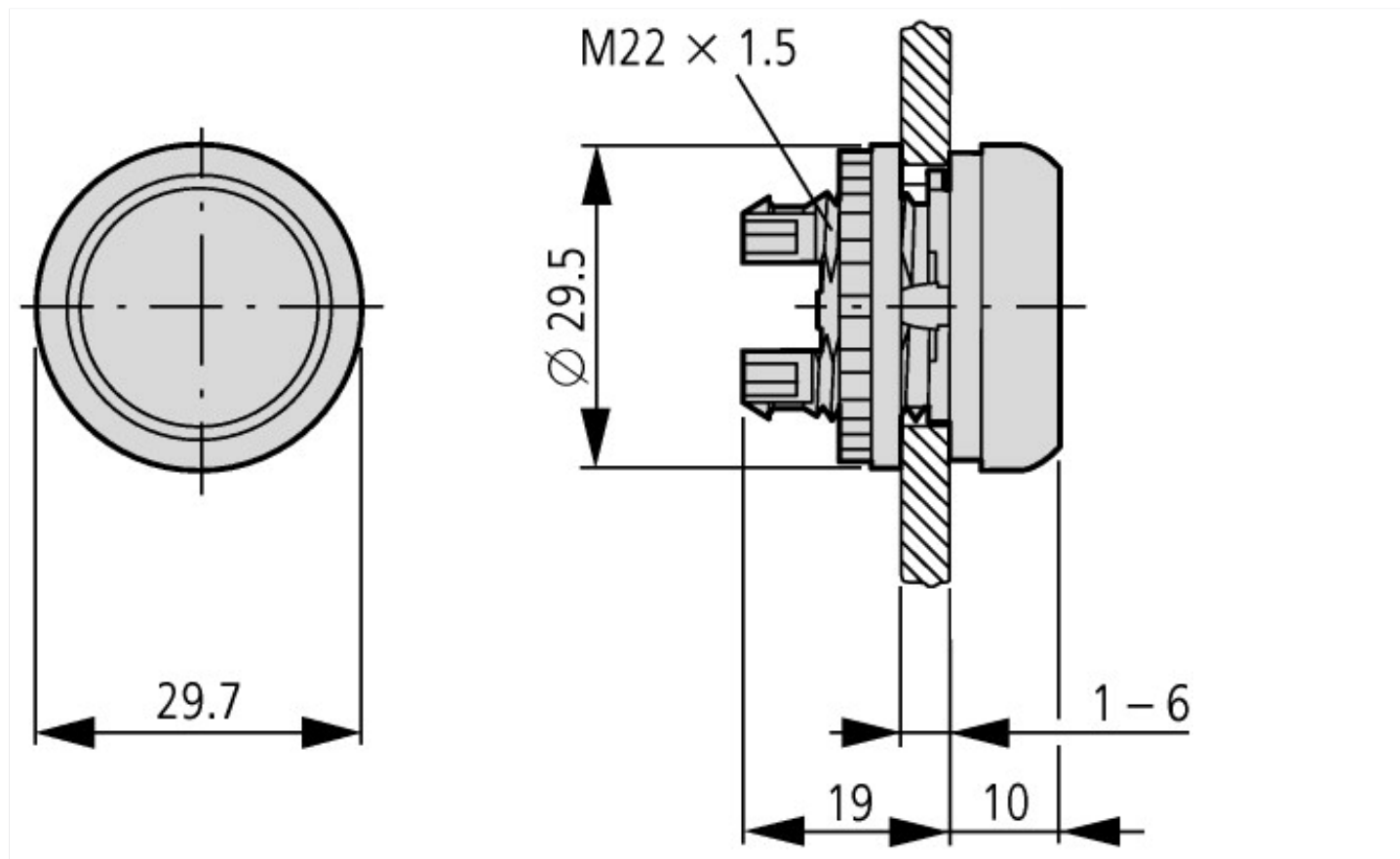
|                                                                                                                                                                                                              |  |    |       |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--|----|-------|
| Low-voltage industrial components (EG000017) / Front element for push button (EC000221)                                                                                                                      |  |    |       |
| Electric engineering, automation, process control engineering / Low-voltage switch technology / Command and alarm device / Front element for push-button actuators<br>(ec1@ss10.0.1-27-37-12-10 [AKF028014]) |  |    |       |
| Colour button                                                                                                                                                                                                |  |    | Red   |
| Number of command positions                                                                                                                                                                                  |  |    | 1     |
| Construction type lens                                                                                                                                                                                       |  |    | Round |
| Hole diameter                                                                                                                                                                                                |  | mm | 22.5  |
| Width opening                                                                                                                                                                                                |  | mm | 0     |
| Height opening                                                                                                                                                                                               |  | mm | 0     |

|                                         |  |            |
|-----------------------------------------|--|------------|
| Type of button                          |  | Flat       |
| Suitable for illumination               |  | Yes        |
| With protective cover                   |  | No         |
| Labelled                                |  | No         |
| Switching function latching             |  | Yes        |
| Spring-return                           |  | Yes        |
| With front ring                         |  | Yes        |
| Material front ring                     |  | Plastic    |
| Colour front ring                       |  | Chrome     |
| Degree of protection (IP), front side   |  | IP67/IP69K |
| Degree of protection (NEMA), front side |  | 4X         |

## Approvals

|                             |  |                                                                              |
|-----------------------------|--|------------------------------------------------------------------------------|
| Product Standards           |  | IEC/EN 60947-5; UL 508; CSA-C22.2 No. 14-05; CSA-C22.2 No. 94-91; CE marking |
| UL File No.                 |  | E29184                                                                       |
| UL Category Control No.     |  | NKCR                                                                         |
| CSA File No.                |  | 012528                                                                       |
| CSA Class No.               |  | 3211-03                                                                      |
| North America Certification |  | UL listed, CSA certified                                                     |
| Degree of Protection        |  | UL/CSA Type 3R, 4X, 12, 13                                                   |

## Dimensions



## Additional product information (links)

### IL04716002Z (AWA1160-1745) RMQ-Titan System

IL04716002Z (AWA1160-1745) RMQ-Titan System

[https://es-assets.eaton.com/DOCUMENTATION/AWA\\_INSTRUCTIONS/IL04716002Z2020\\_09.pdf](https://es-assets.eaton.com/DOCUMENTATION/AWA_INSTRUCTIONS/IL04716002Z2020_09.pdf)