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Eaton 197449

Eaton Moeller® series T0 T0, 20 A, surface mounting, 3 contact unit(s), 90 °, maintained, 0-1, in steel enclosure, Design number 15683

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| PRODUCT NAME | Eaton Moeller® series T0 On-off switch |
| CATALOG NUMBER | 197449 |
| PRODUCT LENGTH/DEPTH | 200 mm |
| PRODUCT HEIGHT | 127 mm |
| PRODUCT WIDTH | 150 mm |
| PRODUCT WEIGHT | 1.59 kg |
| CERTIFICATIONS | IEC/EN 60947-3 IEC/EN 60204 IEC/EN 60947 VDE 0660 |



| PRODUCT CATEGORY | On-Off switch |
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| ACTUATOR COLOR | Black |
| ACTUATOR FUNCTION | Maintained |
| 10.10 TEMPERATURE RISE | The panel builder is responsible for the temperature rise calculation. Eaton will provide heat dissipation data for the devices. |
| 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. |
| 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 RESIST. OF INSUL. MAT. TO ABNORMAL HEAT/FIRE BY INTERNAL ELECT. EFFECTS | Meets the product standard's requirements. |
| 10.2.4 RESISTANCE TO ULTRA-VIOLET (UV) RADIATION | UV resistance only in connection with protective shield. |
| 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. |

| DECLARATIONS OF CONFORMITY | eaton-step-switch- declaration-of-conformity- uk251327en.pdf |
|----------------------------|--|
| 00000 | <u>IL008054ZU</u> |
| 000 | eaton-rotary-switches- switch-t0-main-switch- wiring-diagram-002.eps |
| | eaton-rotary-switches-t0- main-switch-dimensions- 003.eps |
| 00 | eaton-rotary-switches- front-plate-t0-on-off- switch-symbol-002.eps |
| | eaton-rotary-switches-t0- changeover-switch-3d- drawing.eps |

| 10.4 CLEARANCES AND CREEPAGE DISTANCES | Meets the product standard's requirements. |
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| 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 | ls the panel builder's responsibility. |
| 10.8 CONNECTIONS FOR EXTERNAL CONDUCTORS | ls the panel builder's responsibility. |
| 10.9.2 POWER- FREQUENCY ELECTRIC STRENGTH | ls the panel builder's responsibility. |
| 10.9.3 IMPULSE WITHSTAND VOLTAGE | ls the panel builder's responsibility. |
| 10.9.4 TESTING OF ENCLOSURES MADE OF INSULATING MATERIAL | ls the panel builder's responsibility. |
| FITTED WITH: | Black thumb grip and front plate |
| OPERATING FREQUENCY | 1200 Operations/h |
| POLLUTION DEGREE | 3 |
| RATED IMPULSE WITHSTAND VOLTAGE (UIMP) | 6000 V AC |
| RATED OPERATIONAL POWER STAR-DELTA AT 500 V, 50 HZ | 7.5 kW |
| RATED OPERATIONAL POWER STAR-DELTA AT 690 V, 50 HZ | 5.5 kW |
| RATED PERMANENT CURRENT AT AC-21, 400 V | 20 A |
| RATED PERMANENT CURRENT AT AC-23, 400 V | 13.3 A |
| RATED UNINTERRUPTED CURRENT (IU) | 20 A |
| SWITCHING ANGLE | 90 ° |
| SWITCHING POWER AT 400 V | 5.5 kW |
| VOLTAGE PER CONTACT PAIR IN SERIES | 60 V |
| DEVICE CONSTRUCTION | Complete device in housing |
| RATED SHORT-TIME WITHSTAND CURRENT (ICW) | 320 A, Contacts, 1 second 0.32 kA |
| ELECTRICAL | Screw connection |
| | |

| CONNECTION TYPE OF MAIN CIRCUIT | |
|---|---|
| MOUNTING POSITION | As required |
| ACTUATOR TYPE | Short thumb-grip |
| AMBIENT OPERATING TEMPERATURE (ENCLOSED) - MAX | 40 °C |
| AMBIENT OPERATING TEMPERATURE (ENCLOSED) - MIN | -25 °C |
| NUMBER OF AUXILIARY CONTACTS (CHANGE-OVER CONTACTS) | 0 |
| NUMBER OF AUXILIARY CONTACTS (NORMALLY CLOSED CONTACTS) | 1 |
| RATED CONDITIONAL SHORT-CIRCUIT CURRENT (IQ) | 6 kA |
| OVERVOLTAGE CATEGORY | III |
| CONTROL CIRCUIT RELIABILITY | 1 failure per 100,000 switching operations statistically determined, at 24 V DC, 10 mA) |
| DEGREE OF PROTECTION (FRONT SIDE) | IP65 |
| NUMBER OF POLES | Three-pole |
| MOUNTING METHOD | Surface mounting |
| DEGREE OF PROTECTION | NEMA 12 |
| SUITABLE FOR | Ground mounting |
| NUMBER OF SWITCHES | 1 |
| SAFE ISOLATION | 440 V AC, Between the contacts, According to EN 61140 |
| SCREW SIZE | M3.5, Terminal screw |
| INSCRIPTION | 0-1 |
| SHOCK RESISTANCE | 15 g, Mechanical, According to IEC/EN 60068-2-27, Half- sinusoidal shock 20 ms |
| LIFESPAN, MECHANICAL | 400,000 Operations |
| LOAD RATING | $1.3 \times l_e$ (with intermittent operation class 12, 60 % duty factor) $2 \times l_e$ (with intermittent operation class 12, 25 % duty factor) $1.6 \times l_e$ (with intermittent operation class 12, 40 % duty factor) |

| TERMINAL CAPACITY | 2 x (0.75 - 2.5) mm², flexible with ferrules to DIN 46228 1 x (1 - 2.5) mm², solid or stranded 2 x (1 - 2.5) mm², solid or stranded 1 x (0.75 - 2.5) mm², flexible with ferrules to DIN 46228 |
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| SAFETY PARAMETER (EN ISO 13849-1) | B10d values as per EN ISO 13849-1, table C.1 |
| NUMBER OF AUXILIARY CONTACTS (NORMALLY OPEN CONTACTS) | 2 |
| NUMBER OF CONTACT UNITS | 3 |
| NUMBER OF CONTACTS IN SERIES AT DC-21A, 240 V | 1 |
| NUMBER OF CONTACTS IN SERIES AT DC-23A, 120 V | 3 |
| NUMBER OF CONTACTS IN SERIES AT DC-23A, 24 V | 1 |
| NUMBER OF CONTACTS IN SERIES AT DC-23A, 240 V | 5 |
| NUMBER OF CONTACTS IN SERIES AT DC-23A, 48 V | 2 |
| NUMBER OF CONTACTS IN SERIES AT DC-23A, 60 V | 3 |
| RATED BREAKING CAPACITY AT 220/230 V (COS PHI TO IEC 60947-3) | 100 A |
| RATED BREAKING CAPACITY AT 400/415 V (COS PHI TO IEC 60947-3) | 110 A |
| RATED BREAKING CAPACITY AT 500 V (COS PHI TO IEC 60947-3) | 80 A |
| RATED BREAKING CAPACITY AT 660/690 V (COS PHI TO IEC 60947-3) | 60 A |
| RATED MAKING CAPACITY UP TO 690 V (COS PHI TO IEC/EN 60947-3) | 130 A |
| RATED OPERATING VOLTAGE (UE) - MAX | 690 V |
| RATED OPERATING VOLTAGE (UE) - MIN | 690 V |
| RATED OPERATIONAL | 690 V |

| VOLTAGE (UE) AT AC - MAX | |
|---|----------------------------|
| SHORT-CIRCUIT PROTECTION RATING | 20 A gG/gL, Fuse, Contacts |
| RATED OPERATIONAL CURRENT (IE) AT AC-21, 440 V | 20 A |
| RATED OPERATIONAL CURRENT (IE) AT AC-23A, 230 V | 13.3 A |
| RATED OPERATIONAL CURRENT (IE) AT AC-23A, 400 V, 415 V | 13.3 A |
| RATED OPERATIONAL CURRENT (IE) AT AC-23A, 500 V | 13.3 A |
| RATED OPERATIONAL CURRENT (IE) AT AC-23A, 690 V | 7.6 A |
| RATED OPERATIONAL CURRENT (IE) AT AC-3, 220 V, 230 V, 240 V | 11.5 A |
| RATED OPERATIONAL CURRENT (IE) AT AC-3, 380 V, 400 V, 415 V | 11.5 A |
| RATED OPERATIONAL CURRENT (IE) AT AC-3, 500 V | 9 A |
| RATED OPERATIONAL CURRENT (IE) AT AC-3, 660 V, 690 V | 4.9 A |
| RATED OPERATIONAL CURRENT (IE) AT DC-1, LOAD-BREAK SWITCHES L/R = 1 MS | 10 A |
| RATED OPERATIONAL CURRENT (IE) AT DC-13, CONTROL SWITCHES L/R = 50 MS | 10 A |
| RATED OPERATIONAL CURRENT (IE) AT DC-21, 240 V | 1 A |
| RATED OPERATIONAL CURRENT (IE) AT DC-23A, 120 V | 5 A |
| RATED OPERATIONAL CURRENT (IE) AT DC-23A, 24 V | 10 A |
| RATED OPERATIONAL CURRENT (IE) AT DC-23A, 240 V | 5 A |
| RATED OPERATIONAL CURRENT (IE) AT DC-23A, | 10 A |

| 48 V | |
|---|---|
| RATED OPERATIONAL CURRENT (IE) AT DC-23A, 60 V | 10 A |
| RATED OPERATIONAL CURRENT (IE) STAR- DELTA AT AC-3, 220/230 V | 20 A |
| RATED OPERATIONAL CURRENT (IE) STAR- DELTA AT AC-3, 380/400 V | 20 A |
| RATED OPERATIONAL CURRENT (IE) STAR- DELTA AT AC-3, 500 V | 15.6 A |
| RATED OPERATIONAL CURRENT (IE) STAR- DELTA AT AC-3, 690 V | 8.5 A |
| RATED OPERATIONAL POWER AT AC-23A, 220/230 V, 50 HZ | 3 kW |
| RATED OPERATIONAL POWER AT AC-23A, 400 V, 50 HZ | 5.5 kW |
| RATED OPERATIONAL POWER AT AC-23A, 500 V, 50 HZ | 7.5 kW |
| RATED OPERATIONAL POWER AT AC-23A, 690 V, 50 HZ | 5.5 kW |
| RATED OPERATIONAL POWER AT AC-3, 380/400 V, 50 HZ | 5.5 kW |
| RATED OPERATIONAL POWER AT AC-3, 415 V, 50 HZ | 5.5 kW |
| RATED OPERATIONAL POWER AT AC-3, 690 V, 50 HZ | 4 kW |
| RATED OPERATIONAL POWER STAR-DELTA AT 220/230 V, 50 HZ | 5.5 kW |
| RATED OPERATIONAL POWER STAR-DELTA AT 380/400 V, 50 HZ | 7.5 kW |
| TIGHTENING TORQUE | 8.8 lb-in, Screw terminals 1 Nm, Screw terminals |
| UNINTERRUPTED CURRENT | Rated uninterrupted current lu is specified for max. cross-section. |
| HOUSING MATERIAL | Plastic |

| PROJECT NAME: | |
|-----------------|--|
| PROJECT NUMBER: | |
| PREPARED BY: | |
| ПП: | |



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