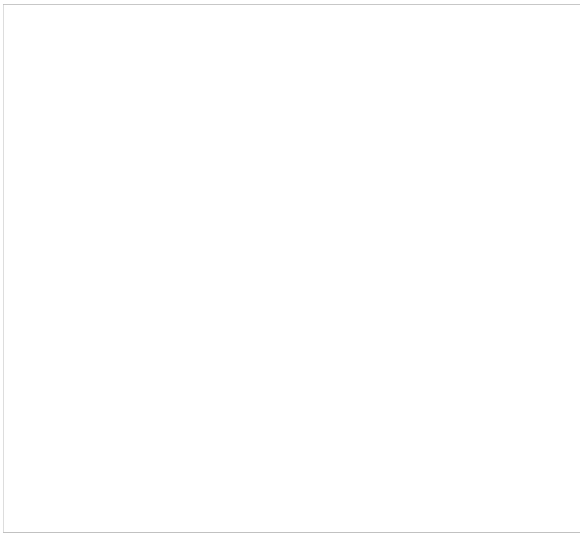
# PKE ELECTRONIC MOTOR PROTECTION CIRCUIT BREAKER

**138516**



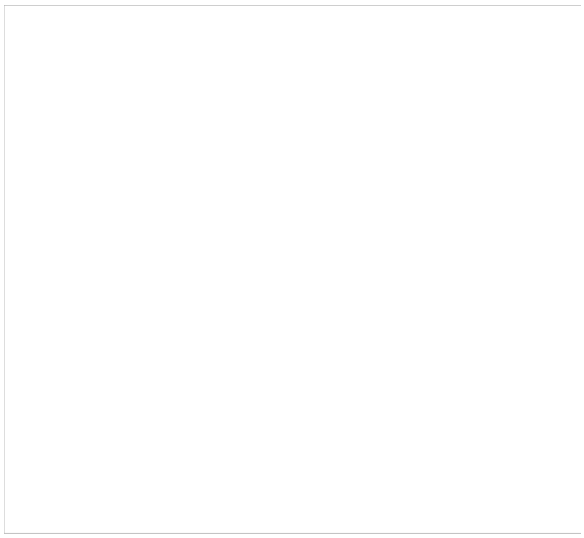




## 138516

Eaton Moeller® series PKE65 Motor-protective circ
device with standard knob, Electronic, 16 - 65 A, W

How to buy



General specifications ›

Product specifications ›

## GENERAL SPECIFICATIONS

| | |
|---|---|
| **PRODUCT NAME** | Eaton Moeller® series PKE System-protective circu |
| **CATALOG NUMBER** | 138516 |
| **MODEL CODE** | PKE65/XTU-65 |
| **EAN** | 4015081352951 |
| **PRODUCT LENGTH/DEPTH** | 187 mm |
| **PRODUCT HEIGHT** | 162 mm |
| **PRODUCT WIDTH** | 55 mm |
| **PRODUCT WEIGHT** | 1.469 kg |
| **CERTIFICATIONS** | CE<br>CSA-C22.2 No. 60947-4-1-14<br>CSA<br>UL Category Control No.: NLRV<br>UL File No.: E36332<br>CSA File No.: 165628<br>UL<br>UL 60947-4-1<br>VDE 0660<br>IEC/EN 60947<br>CSA Class No.: 3211-05<br>IEC/EN 60947-4-1 |

## PRODUCT SPECIFICATIONS

| | |
|---|---|
| **RATED OPERATIONAL CURRENT FOR SPECIFIED HEAT DISSIPATION (IN)** | 65 A |
| **TERMINAL CAPACITY (FLEXIBLE WITH FERRULE)** | 2 x (0.75 - 25) mm², ferrule to DIN 46228<br>1 x (0.75 - 35) mm², ferrule to DIN 46228 |
| **10.11 SHORT-CIRCUIT RATING** | Is the panel builder's responsibility. The specificatio must be observed. |
| **AMBIENT OPERATING TEMPERATURE (ENCLOSED) - MIN** | -25 °C |
| **RATED OPERATIONAL POWER AT AC-3, 380/400 V, 50 HZ** | 30 kW |
| **RATED SHORT-CIRCUIT BREAKING CAPACITY ICS AT 440 V AC** | 11 kA |
| **10.4 CLEARANCES AND CREEPAGE DISTANCES** | Meets the product standard's requirements. |
| **10.12 ELECTROMAGNETIC COMPATIBILITY** | Is the panel builder's responsibility. The specificatio must be observed. |
| **CUT-OUT PERIODS - MIN** | ≤ 500 ms, main conducting paths, AC-4 cycle opera |
| **10.2.5 LIFTING** | Does not apply, since the entire switchgear needs to |

| | |
|---|---|
| **SWITCHING CAPACITY** | 65 A, AC-3 up to 690 V<br>58 A, General use UL/CSA |
| **STRIPPING LENGTH (MAIN CABLE)** | 14 mm |
| **AMBIENT OPERATING TEMPERATURE (ENCLOSED) - MAX** | 40 °C |
| **RATED SHORT-CIRCUIT BREAKING CAPACITY ICU AT 400 V AC** | 50 kA |
| **10.2.3.1 VERIFICATION OF THERMAL STABILITY OF ENCLOSURES** | Meets the product standard's requirements. |
| **AMBIENT STORAGE TEMPERATURE - MIN** | -40 °C |
| **FITTED WITH:** | Standard knob |
| **CURRENT FLOW TIMES - MIN** | For all combinations with an SWD activation, you<br>the minimum current flow times and minimum cut-<br>900 (Class 15) AC-4 cycle operation, Main conduct<br>1000 (Class 20) AC-4 cycle operation, Main conduc<br>700 (Class 10) AC-4 cycle operation, Main conduct<br>500 (Class 5) AC-4 cycle operation, Main conductir<br>Note: Going below the minimum current flow time<br>of the load (motor). |
| **ADJUSTMENT RANGE UNDELAYED SHORT-CIRCUIT RELEASE - MAX** | 1008 A |
| **10.8 CONNECTIONS FOR EXTERNAL CONDUCTORS** | Is the panel builder's responsibility. |
| **ASSIGNED MOTOR POWER AT 575/600 V, 60 HZ, 3-PHASE** | 40 HP |
| **PROTECTION** | Finger and back-of-hand proof, Protection against di<br>actuated from front (EN 50274) |
| **ACTUATOR TYPE** | Turn button |
| **RATED OPERATIONAL POWER AT AC-3, 440 V, 50 HZ** | 37 kW |
| **AMBIENT OPERATING TEMPERATURE - MAX** | 55 °C |
| **RATED OPERATIONAL POWER AT AC-3, 220/230 V, 50 HZ** | 18.5 kW |
| **ASSIGNED MOTOR POWER AT 115/120 V, 60 HZ, 1-PHASE** | 3 HP |
| **CLIMATIC PROOFING** | Damp heat, constant, to IEC 60068-2-78<br>Damp heat, cyclic, to IEC 60068-2-30 |
| **DEVICE CONSTRUCTION** | Built-in device fixed built-in technique |
| **FEATURES** | Phase-failure sensitivity (according to IEC/EN 6094<br>Part 102) |
| **LIFESPAN, ELECTRICAL** | 50,000 operations (at 400V, AC-3) |
| **STATIC HEAT DISSIPATION, NON-CURRENT-DEPENDENT PVS** | 0 W |
| **ELECTRICAL CONNECTION TYPE OF MAIN CIRCUIT** | Screw connection |

| | |
|---|---|
| **10.9.3 IMPULSE WITHSTAND VOLTAGE** | Is the panel builder's responsibility. |
| **NUMBER OF POLES** | Three-pole |
| **RATED SHORT-CIRCUIT BREAKING CAPACITY ICU AT 690 V AC** | 5 kA |
| **AMBIENT OPERATING TEMPERATURE - MIN** | -25 °C |
| **10.6 INCORPORATION OF SWITCHING DEVICES AND COMPONENTS** | Does not apply, since the entire switchgear needs to |
| **10.5 PROTECTION AGAINST ELECTRIC SHOCK** | Does not apply, since the entire switchgear needs to |
| **RATED UNINTERRUPTED CURRENT (IU)** | 65 A |
| **SHORT-CIRCUIT RELEASE** | Trip block fixed 15.5 x Ir<br>± 20% tolerance, Trip blocks<br>Delayed approx. 60 ms, Trip blocks<br>Basic device fixed 15.5 x Iu, Trip Blocks |
| **10.13 MECHANICAL FUNCTION** | The device meets the requirements, provided the inf<br>instruction leaflet (IL) is observed. |
| **10.2.6 MECHANICAL IMPACT** | Does not apply, since the entire switchgear needs to |
| **10.9.4 TESTING OF ENCLOSURES MADE OF INSULATING MATERIAL** | Is the panel builder's responsibility. |
| **10.3 DEGREE OF PROTECTION OF ASSEMBLIES** | Does not apply, since the entire switchgear needs to |
| **HEAT DISSIPATION PER POLE, CURRENT-DEPENDENT PVID** | 7.2 W |
| **OPERATING FREQUENCY** | 60 Operations/h |
| **PRODUCT CATEGORY** | Motor protective circuit breaker |
| **SHORT-CIRCUIT CURRENT RATING (GROUP PROTECTION)** | 100 kA, 600 V High Fault, Fuse, SCCR (UL/CSA<br>200 A, Class J, 600 V High Fault, max. Fuse, SC |
| **OVERLOAD RELEASE CURRENT SETTING - MIN** | 16 A |
| **RATED OPERATIONAL POWER AT AC-3, 690 V, 50 HZ** | 55 kW |
| **RATED SHORT-CIRCUIT BREAKING CAPACITY ICS AT 400 V AC** | 12 kA |
| **RATED SHORT-CIRCUIT BREAKING CAPACITY ICU AT 440 V AC** | 45 kA |
| **EQUIPMENT HEAT DISSIPATION, CURRENT-DEPENDENT PVID** | 21.6 W |
| **HEAT DISSIPATION CAPACITY PDISS** | 0 W |
| **ASSIGNED MOTOR POWER AT 200/208 V, 60 HZ, 3-PHASE** | 15 HP |
| **RATED OPERATIONAL CURRENT (IE)** | 65 A |
| **ASSIGNED MOTOR POWER AT 460/480 V, 60 HZ, 3-** | 40 HP |

| | |
|---|---|
| **PHASE** | |
| **SUITABLE FOR** | Also motors with efficiency class IE3 |
| **TEMPERATURE COMPENSATION** | -5 - 40 °C to IEC/EN 60947, VDE 0660<br>-25 - 55 °C, Operating range |
| **TERMINAL CAPACITY (SOLID)** | 1 x (0.75 - 16) mm²<br>2 x (0.75 - 16) mm² |
| **RATED FREQUENCY - MIN** | 50 Hz |
| **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. |
| **LIFESPAN, MECHANICAL** | 30,000 Operations (Main conducting paths) |
| **TERMINAL CAPACITY (SOLID/STRANDED AWG)** | 14 - 2 |
| **OVERLOAD RELEASE CURRENT SETTING - MAX** | 65 A |
| **10.9.2 POWER-FREQUENCY ELECTRIC STRENGTH** | Is the panel builder's responsibility. |
| **RATED SHORT-CIRCUIT BREAKING CAPACITY ICS AT 500 V AC** | 3 kA |
| **OVERVOLTAGE CATEGORY** | III |
| **DEGREE OF PROTECTION** | IP20<br>Terminals: IP00 |
| **RATED FREQUENCY - MAX** | 60 Hz |
| **SWITCH OFF TECHNIQUE** | Electronic |
| **AMBIENT STORAGE TEMPERATURE - MAX** | 80 °C |
| **ADJUSTMENT RANGE UNDELAYED SHORT-CIRCUIT RELEASE - MIN** | 1008 A |
| **POLLUTION DEGREE** | 3 |
| **10.7 INTERNAL ELECTRICAL CIRCUITS AND CONNECTIONS** | Is the panel builder's responsibility. |
| **RATED IMPULSE WITHSTAND VOLTAGE (UIMP)** | 6000 V AC |
| **CONNECTION** | Screw terminals |
| **10.10 TEMPERATURE RISE** | The panel builder is responsible for the temperature<br>Eaton will provide heat dissipation data for the devi |
| **FUNCTIONS** | Motor protection for heavy starting duty<br>Overload release<br>Motor protection |
| **TIGHTENING TORQUE** | 3.3 Nm, Screw terminals, Main cable<br>1 Nm, Screw terminals, Control circuit cables |
| **RATED SHORT-CIRCUIT BREAKING CAPACITY ICU AT 500 V AC** | 15 kA |

| | |
|---|---|
| **RATED OPERATIONAL VOLTAGE (UE) - MIN** | 690 V |
| **ASSIGNED MOTOR POWER AT 230/240 V, 60 HZ, 1-PHASE** | 10 HP |
| **10.2.2 CORROSION RESISTANCE** | Meets the product standard's requirements. |
| **10.2.4 RESISTANCE TO ULTRA-VIOLET (UV) RADIATION** | Meets the product standard's requirements. |
| **10.2.7 INSCRIPTIONS** | Meets the product standard's requirements. |
| **RATED SHORT-CIRCUIT BREAKING CAPACITY ICS AT 690 V AC** | 1 kA |
| **RATED OPERATIONAL POWER AT AC-3, 500 V, 50 HZ** | 45 kW |
| **SHOCK RESISTANCE** | 15 g, Mechanical, According to IEC/EN 60068-2-27 shock 10 ms |
| **RATED OPERATIONAL VOLTAGE (UE) - MAX** | 690 V |
| **ASSIGNED MOTOR POWER AT 230/240 V, 60 HZ, 3-PHASE** | 15 HP |
| **ALTITUDE** | Max. 2000 m |

## Brochures

## Catalogs

## Certification reports

## Characteristic curve

## Declarations of conformity

## Drawings

## eCAD model

## Installation instructions

## Installation videos

# Manuals and user guides

# mCAD model

138516

Eaton is an intelligent power management company dedicated to improving the quality of life and protecting the environment for people everywhere. We are guided by our commitment to do business right, to operate sustainably and to help our customers manage power ─ today and well into the future. By capitalizing on the global growth trends of electrification and digitalization, we're accelerating the planet's transition to renewable energy and helping to solve the world's most urgent power management challenges.