## Undervoltage release PKZ0(4), PKE, AC, 120 V 60 Hz, Screw terminals



Part no. U-PKZ0(120V60HZ) 073143

General specifications	
Product name	Eaton Moeller® series U-PKZO Accessory Undervoltage Release
Part no.	U-PKZ0(120V60HZ)
EAN	4015080731436
Product Length/Depth	68 millimetre
Product height	90 millimetre
Product width	24 millimetre
Product weight	0.129 kilogram
Certifications	UL Category Control No.: NLRV UL 508 CE CSA-C22.2 No. 14 UL IEC/EN 60947-4-1 CSA Class No.: 3211-05 UL File No.: E36332 CSA File No.: 165628 CSA
Product Tradename	U-PKZ0
Product Type	Accessory
Product Sub Type	Undervoltage Release
Catalog Notes  Features & Functions	Cannot be combined with A-PKZO shunt release Cannot be combined with shunt release A-PKZO
Electric connection type	Screw connection
General information	
Mounting position	Can be fitted to left side of the motor protection switch
Product category	Accessories
Suitable as	EMERGENCY STOP or EMERGENCY switching-off device in accordance with IEC/ EN 60204 when combined with circuit breaker
Suitable for	Motor safety switch
Used with	Motor protective circuit-breaker
Voltage type	AC
Climatic environmental conditions	
Ambient operating temperature - min	-25 °C
Ambient operating temperature - max	55 °C
Terminal capacities	
Terminal capacity (solid/flexible with ferrule)	2 x (0.75 - 2.5) mm <sup>2</sup> 1 x (0.75 - 2.5) mm <sup>2</sup>
Terminal capacity (solid/stranded AWG)	1 x (18 - 14) 2 x (18 - 14)
Electrical rating	
Rated operational voltage (Ue) at AC - min	42 V
Rated operational voltage (Ue) at AC - max	480 V
Rated operational voltage (Ue) at DC - min	24 V
Rated operational voltage (Ue) at DC - max	250 V
Magnet system	
Drop-out voltage	0,7- 0,35 x Uc
Pick-up voltage	0.85 - 1.1 V x Uc
Rated control supply voltage (Us) at AC, 50 Hz - min	0 V
Rated control supply voltage (Us) at AC, 50 Hz - max	0 V
Rated control supply voltage (Us) at AC, 60 Hz - min	120 V
Rated control supply voltage (Us) at AC, 60 Hz - max	120 V

Related cantrol supply voltage (Lb) at DC - max  Contacts  Number of contacts (change-over contacts)  Number of contacts (change-over contacts)  Number of contacts (many) open contacts)  Power consumption  Prover consumption, pick-up, 201 by  Prover consumption, 201		
Contacts Number of contacts (change-over contacts)  Power consumption  Power consumption  Power consumption, pick-up, 60 Hz  Power c	Rated control supply voltage (Us) at DC - min	0 V
Number of contacts (change-over contacts)  Number of contacts (change-over contacts)  Power consumption  Power consumption, pick-up, 50 Hz  Power degrated power	Rated control supply voltage (Us) at DC - max	0 V
Number of contacts (normally closed contacts)  Number of contacts (normally closed contacts)  Power consumption  Power consumption, pick-up, 50 Hz  Power consumption, sealing, 50 Hz  Power consumption, pick-up, 50 Hz  Power consumption of pick-up and pick-up an	Contacts	
Number of contacts (normally open contacts)  Power consumption  Power consumption, pick-up, 50 Hz  Power consumption, pick-up, 50 Hz  Power consumption, pick-up, 50 Hz  Power consumption, sealing, 50 Hz  Read dissipation capacity Poliss  OW  Heat dissipation per pole, current-dependent Pvid  Heat dissipation capacity Poliss  Read operational current for specified heat dissipation (Inl)  Read dissipation are product standard's requirements.  10.2.2 Corrosion resistance  Meats the product standard's requirements.  10.2.3.3 Verification of thermal stability of enclosures  Meats the product standard's requirements.  10.2.3.1 Verification of resistance of insulating materials to normal heat  10.2.2.3 Verification of resistance of insulating materials to normal heat  10.2.2 Surficial impact  Meats the product standard's requirements.  10.2.4 Resistance to ultra-violet [UV] radiation  Meats the product standard's requirements.  Meats the product standard's requirements.  10.2.2 Illing  Does not apply, since the entire switchpear needs to be evaluated.  Meats the product standard's requirements.  10.2.2 Illing  Does not apply, since the entire switchpear needs to be evaluated.  Meats the product standard's requirements.  10.2.2 Illing  10.2.2 Resistance to ultra-violet [uv] radiation  10.3 Degree of protection of assemblies  Does not apply, since the entire switchpear needs to be evaluated.  Meats the	Number of contacts (change-over contacts)	0
Power consumption Power consumption, pick-up, 50 Hz Power consumption, pick-up, 50 Hz Power consumption, pick-up, 50 Hz Power consumption, sealing, 50 Hz Power consumption, sealing, 50 Hz Power consumption, sealing, 60 Hz Power consumption, sealing, 60 Hz Power consumption, sealing, 60 Hz Power consumption, current-dependent Pvid Power consumption, current-dependent Pvid Petition of the sealing spation, current-dependent Pvid Petition of the sealing spation, current-dependent Pvid Petition of the sealing spation per pole, current-dependent Pvid Petition of the sealing spation per pole, current-dependent Pvid Petition of the sealing spation per pole, current-dependent Pvid Petition of the sealing spation per pole, current-dependent Pvid Petition of the sealing spation per pole, current-dependent Pvid Petition of the sealing spation per pole, current-dependent Pvid Petition of the sealing spation per pole, current-dependent Pvid Petition of the sealing spation per pole, current-dependent Pvid Petition of the sealing spation per pole, current-dependent Pvid Petition of the sealing spation per pole, current-dependent Pvid Petition of the sealing spation per pole, current-dependent Pvid Petition of the sealing spation per pole, current-dependent Pvid Petition of the sealing spation per pole, current-dependent Pvid Petition sealing sealin	Number of contacts (normally closed contacts)	0
Pewer consumption, pick-up, 50 Hz Pewer consumption, pick-up, 50 Hz Pewer consumption, pick-up, 60 Hz Pewer consumption, sealing, 50 Hz Pewer consumption, sealing, 50 Hz Pewer consumption, sealing, 50 Hz Power consumption Power consum	Number of contacts (normally open contacts)	0
Power consumption, pick-up, 60 Hz Power consumption, sealing, 50 Hz Power flication  Equipment heat dissipation, current-dependent Pvid  Heat dissipation, capacity Pdiss Heat dissipation, capacity Pdiss Heat dissipation, capacity Pdiss Heat dissipation, sealing, 50 Hz Heat dissipation, sealing, 50 Hz Heat dissipation, capacity Pdiss Heat dissipation, sealing, 50 Hz Heat dissipation, capacity Pdiss Heat dissipation, sealing, 50 Hz Heat dissipation, capacity Pdiss Heat dissipation, sealing, 50 Hz Heat dissipation, capacity Pdiss Heat dissipation, sealing, 50 Hz Heat dissipation, sealing, 50 Hz Heat dissipation, capacity Pdiss Heat dissipation, sealing, 50 Hz Heat dissipation, capacity Pdiss Heat dissipation, sealing, 50 Hz Heat dissipation, capacity Pdiss Heat dissipation, sealing, 50 Hz Heat dissipation, capacity Pdiss Heat dissipation, sealing, 50 Hz Heat dissipation, capacity Hz Heat dissipation, sealing, 50 Hz Heat dissipation, capacity Hz Heat dissipation, capacity Hz Heat dissipation, capacity Hz Heat dissipation of the sequence Hz Heat dissipation of the sequence Hz Heat dissipation of the dissipation Hz Heat dissipation dispation of the sequence Hz Heat dissipation dispation of the sequence Hz Heat dissipation dispation of the dispation Hz Heat dissipation dispation of the dispation Hz Heat dissipation dispation has not the switchgear meats to the substread.  Does not apply, since the entire switchgear needs to be evaluated.  Does not apply, since the entire switchgear needs to be evaluated.  Does not apply, since the entire switchgear ne	Power consumption	
Power consumption, sealing, 50 Hz Power consumption, sealing, 60 Hz Power consumption, sealing, 60 Hz Power consumption, sealing, 60 Hz  Equipment heat dissipation, current-dependent Pvid Petal dissipation per pole, current-dependent Pvid Reted dissipation data verification per pole developments Reted the product standard's requirements. Reted the product standard's requirements. Reted the product standard's requirement	Power consumption, pick-up, 50 Hz	5 VA, Pull-in power, Coil in a cold state and 1.0 x Us
Power consumption, sealing, 60 Hz  Design verification  Equipment heat dissipation, current-dependent Pvid  Heat dissipation capacity Plass  Heat dissipation capacity Plass  Heat dissipation per pole, current-dependent Pvid  Rated operational current for specified heat dissipation (in)  Static heat dissipation, non-current-dependent Pvs  10.2.2 Corrision resistance  10.2.3.1 Verification of thermal stability of enclosures  Meets the product standard's requirements.  10.2.3.2 Verification of trems at stability of enclosures  Meets the product standard's requirements.  10.2.3.2 Verification of trems at stability of enclosures  Meets the product standard's requirements.  10.2.3.2 Verification of trems at stability of enclosures  Meets the product standard's requirements.  Does not apply, since the entire switchpare needs to be evaluated.  Meets the product standard's requirements.  In Internal electric al circuits and connections  In Internal	Power consumption, pick-up, 60 Hz	5 VA, Pull-in power, Coil in a cold state and 1.0 x Us
Equipment heat dissipation, current-dependent Pvid 0W Heat dissipation capacity Pdiss 0W Rated operational current for specified heat dissipation (In) 0A Static heat dissipation, non-current-dependent Pvid 0.5 W 10.22 Corrosion resistance 0Meets the product standard's requirements. Meets the product standard's requirements. 10.23.1 Verification of thermal stability of enclosures 0Meets the product standard's requirements. 10.23.2 Verification of resistance of insulating materials to normal heat 10.23.3 Resist of insul. mat: to abnormal heat/fire by internal elect. effects 0Meets the product standard's requirements. 10.24.2 Resistance to ultra-violet (UV) radiation 0Meets the product standard's requirements. 10.25.2 Lifting 0Does not apply, since the entire switchgear needs to be evaluated. 10.25.1 Inscriptions 0Meets the product standard's requirements. 10.25.2 Lifting 0Does not apply, since the entire switchgear needs to be evaluated. 10.27.1 Inscriptions 0Meets the product standard's requirements. 10.3 Degree of protection of assemblies 0Does 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 0Does not apply, since the entire switchgear needs to be evaluated. 10.6 Connections for external conductors 1S the panel builder's responsibility. 10.9.2 Power-frequency electric strength 1S the panel builder's responsibility. 10.9.2 Power-frequency electric strength 1S the panel builder's responsibility. 10.9.3 Impulse withstand voltage 1S the panel builder's responsibility. 10.9.4 Testing of enclosures made of insulating material 1S the panel builder's responsibility. 10.9.4 Testing of enclosures made of insulating material 1S the panel builder's responsibility. 10.9.4 Testing of enclosures made of insulating material 1S the panel builder's responsibility. The specifications for the sw	Power consumption, sealing, 50 Hz	3 VA, Coil in a cold state and 1.0 x Us
Equipment heat dissipation, current-dependent Pvid Heat dissipation capacity Pdiss  Heat dissipation per pole, current-dependent Pvid  Rated operational current for specified heat dissipation (In)  O A  Static heat dissipation, non-current-dependent Pvid  Rated operational current for specified heat dissipation (In)  O S A  Static heat dissipation, non-current-dependent Pvs  O S W  Heat dissipation, non-current-dependent Pvs  O S W  Heat dissipation of thermal stability of enclosures  I 02.2.3 I Verification of thermal stability of enclosures  I 02.3.1 Verification of resistance of insulating materials to normal heat  I 02.3.2 Verification of resistance of insulating materials to normal heat  I 02.3.3 Resist of insul, mat to abnormal heat/fire by internal elect. effects  I 02.4 Resistance to ultra-violet (IUV) radiation  I 02.5 Lifting  O Does not apply, since the entire switchgear needs to be evaluated.  I 02.7 Inscriptions  I 0.8 Characters and creepage distances  O Does not apply, since the entire switchgear needs to be evaluated.  I 0.8 Locarporation of switching devices and components  I 0.8 Connections for external conductors  I 0.8 Connections for external conductors  I 0.9 Power-frequency electric strength  I 0.9 Power-frequency electric strength  I 0.9 Power-frequency electric strength  I 0.10 Timernal electric direction and contact in the surface of insulating material  I 0.10 Timernal electric responsibility.  I 0.9 Power-frequency electric strength  I 0.10 Timernal electric shock  I 0.10 Timernal electric shock  I 0.20 Power-frequency electric strength  I 0.10 Timernal electric shock  I 0.20 Power-frequency electric strength  I 0.10 Timernal electric shock  I 0.10 Timernal electric sho	Power consumption, sealing, 60 Hz	3 VA, Coil in a cold state and 1.0 x Us
Heat dissipation capacity Pdiss  Heat dissipation propole, current-dependent Pvid  Rated operational current for specified heat dissipation (In)  Static heat dissipation, non-current-dependent Pvs  0.5 W  10.22 Corrosion resistance  10.23.1 Verification of thermal stability of enclosures  10.23.2 Verification of thermal stability of enclosures  10.23.3 Resist. of insul. mat. to abnormal heat/fire by internal elect. effects  10.24.8 Resistance to ultra-violet (UV) radiation  10.25 Lifting  10.25 Lifting  10.26 Mechanical impact  10.27 Inscriptions  10.30 Degree of protection of assemblies  10.30 Degree of protection of assemblies  10.40 Clearances and creapage distances  10.45 Incorporation of switching devices and components  10.56 Incorporation of switching devices and components  10.7 Internal electric electric istrength  10.8 Connections for external conductors  10.9 Power-frequency electric strength  10.9 Testing of enclosures made of insulating material  10.10 Temperature rise  10.11 Short-circuit rating  10.12 Electromagnetic compatibility  10.13 Mechanical function  10.14 Mechanical function  10.15 Hopproprosposibility.  10.16 Incorporation of switching material  10.17 Internal electric electric strength  10.18 Lepanel builder's responsibility.  10.29 Power-frequency electric strength  10.19 Temperature rise  10.10 Temperature rise  10.11 Short-circuit rating  10.12 Electromagnetic compatibility  10.13 Mechanical function  10.14 Mechanical function  10.15 He panel builder's responsibility.  10.16 Incorporation for witching functions for the switchgear must be observed.  10.18 The panel builder's responsibility. The specifications for the switchgear must be observed.  10.19 Temperature rise  10.10 Temperature rise  10.11 Short-circuit rating  10.12 Electromagnetic compatibility  10.13 Mechanical function  10.14 Mechanical function  10.15 Mechanical function  10.16 Incorporation of witching function in the instruction of the observed.	Design verification	
Heat dissipation per pole, current-dependent Pvid  Rated operational current for specified heat dissipation (In)  Static heat dissipation, non-current-dependent Pvs  10.22 Corrosion resistance  10.2.3.1 Verification of thermal stability of enclosures  10.2.3.2 Verification of treatistance of insulating materials to normal heat  10.2.3.2 Resistance to ultra-violet (UV) radiation  10.2.4 Resistance to ultra-violet (UV) radiation  10.2.5 Lifting  10.2.5 Lifting  10.2.6 Mechanical impact  10.2.7 Inscriptions  10.3.0 Dees not apply, since the entire switchgear needs to be evaluated.  10.4.1 Dees not apply, since the entire switchgear needs to be evaluated.  10.5 Protection against electric shock  10.5 Protection against electric shock  10.6 Incorporation of switching devices and components  10.7 Internal electrical circuits and connections  10.8 Connections for external conductors  10.9 Power-frequency electric strength  10.9.3 Impulse withstand voltage  10.9.4 Testing of enclosures made of insulating material  10.9.1 Testing of enclosures made of insulating material  10.9.1 Testing of enclosures made of insulating material  10.9.1 Electromagnetic compatibility  10.9.2 Testing of enclosures made of insulating material  10.1 Short-circuit rating  10	Equipment heat dissipation, current-dependent Pvid	0 W
Rated operational current for specified heat dissipation (In)  Static heat dissipation, non-current-dependent Pvs  10.22 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 Nerification of resistance of insulating materials to normal heat  Meets the product standard's requirements.  10.2.3 Resists. 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  10.2.5 Lifting  Does not apply, since the entire switchgear needs to be evaluated.  10.2.1 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.  10.6 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.  10.9.2 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  10.10 Temperature rise  The panel builder's responsibility.  10.11 Short-circuit rating  Is the panel builder's responsibility.  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	Heat dissipation capacity Pdiss	0 W
Static heat dissipation, non-current-dependent Pvs  10.22 Corrosion resistance  10.23.1 Verification of thermal stability of enclosures  10.23.2 Verification of resistance of insulating materials to normal heat  10.23.2 Verification of resistance of insulating materials to normal heat  10.23.3 Resist of insul. mat. to abnormal heat/fire by internal elect. effects  10.24 Resistance to ultra-violat (UV) radiation  10.25 Lifting  10.26 Mechanical impact  10.27 Inscriptions  10.3 Degree of protection of assemblies  10.3 Degree of protection of assemblies  10.4 Clearances and creepage distances  10.5 Protection against electric shock  10.6 Incorporation of switching devices and components  10.7 Internal electrical circuits and connections  10.8 Connections for external conductors  10.9 Power-frequency electric strength  10.9.2 Texas and of insulating material  10.9.3 Impulse withstand voltage  10.10 Temperature rise  10.11 Short-circuit rating  10.12 Electromagnetic compatibility  10.13 Mechanical function  10.14 Clear companies the components of the surface of the switchgear needs to be evaluated.  10.5 Protection against electric shock  10.6 Incorporation of switching devices and components  10.7 Internal electrical circuits and connections  10.8 Legal of the entire switchgear needs to be evaluated.  10.9 The panel builder's responsibility.  10.9 The panel builder's responsibility.  10.9 The panel builder's responsibility.  10.10 Temperature rise  10.11 Short-circuit rating  10.12 Electromagnetic compatibility  10.13 Mechanical function  10.14 Mechanical function  10.15 Mechanical function  10.16 Mechanical function  10.17 Mechanical function  10.18 Mechanical function  10.19 Mechanical function  10.19 Mechanical function  10.10 Temperature rise of the switchgear must be observed.  10.10 Temperature rise of the switchgear must be observed.  10.11 Mechanical function	Heat dissipation per pole, current-dependent Pvid	0 W
10.2.2 Corrosion resistance  10.2.3.1 Verification of thermal stability of enclosures  10.2.3.2 Verification of thermal stability of enclosures  10.2.3.2 Verification of resistance of insulating materials to normal heat  10.2.3.3 Resist. of insul. mat. to abnormal heat/fire by internal elect. effects  10.2.4 Resistance to ultra-violet (UV) radiation  10.2.5 Lifting  10.2.5 Lifting  10.2.6 Mechanical impact  10.2.7 Inscriptions  10.3 Degree of protection of assemblies  10.4 Clearances and creepage distances  10.5 Protection against electric shock  10.6 Incorporation of switching devices and components  10.6 Incorporation of switching devices and components  10.7 Internal electrical circuits and connections  10.8 Connections for external conductors  10.9 Power-frequency electric strength  10.9.3 Impulse withstand voltage  10.9.4 Testing of enclosures made of insulating material  10.10 Temperature rise  10.10 Temperature rise  10.11 Short-circuit rating  10.12 Electromagnetic compatibility  10.13 Mechanical function  10.14 Edevice meets the product standard's requirements.  10.2 Meets the product standard's requirements.  10.2 Power-frequency electric strength  10.4 Clearances and creepage distances  10.5 Protection against electric shock  10.6 Incorporation of switching devices and components  10.7 Internal electrical circuits and connections  10.8 Connections for external conductors  10.9 The panel builder's responsibility.  10.9 Power-frequency electric strength  10.10 Temperature rise  10.10 Temperature rise  10.10 Temperature rise  10.11 Short-circuit rating  10.12 Electromagnetic compatibility  10.13 Mechanical function  10.14 Electromagnetic compatibility  10.15 The device meets the requirements, provided the information in the instruction	Rated operational current for specified heat dissipation (In)	0 A
10.2.3.1 Verification of thermal stability of enclosures  10.2.3.2 Verification of resistance of insulating materials to normal heat  10.2.3.3 Resist. of insul. mat. to abnormal heat/fire by internal elect. effects  10.2.4 Resistance to ultra-violet (UV) radiation  10.2.5 Lifting  10.2.6 Mechanical impact  10.2.7 Inscriptions  10.3 Degree of protection of assemblies  10.4 Clearances and creepage distances  10.5 Protection against electric shock  10.5 Protection against electric shock  10.6 Incorporation of switching devices and components  10.7 Internal electrical circuits and connections  10.8 Connections for external conductors  10.9 Power-frequency electric strength  10.9.3 Impulse withstand voltage  10.9.4 Testing of enclosures made of insulating material  10.10 Temperature rise  10.11 Short-circuit rating  10.12 Electromagnetic compatibility  10.13 Mechanical function  Meets the product standard's requirements.  Meets the product standard's requirements.  Meets the product standard's requirements.  Does not apply, since the entire switchgear needs to be evaluated.  Does not apply, since the entire switchgear needs to be evaluated.  Does not apply, since the entire switchgear needs to be evaluated.  Does not apply, since the entire switchgear needs to be evaluated.  Is the panel builder's responsibility.  10.8 Connections for external conductors  10.9 Power-frequency electric strength  10.9 Power-frequency electric strength  10.9 Independent of switchgear meets to be evaluated.  10.10 Temperature rise  10.11 Short-circuit rating  10.12 Electromagnetic compatibility  10.13 Hechanical function  The device meets the requirements, provided the information in the instruction	Static heat dissipation, non-current-dependent Pvs	0.5 W
10.2.3.2 Verification of resistance of insulating materials to normal heat 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 Meets the product standard's requirements. 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. 10.9.2 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 Incorporation of en	10.2.2 Corrosion resistance	Meets the product standard's requirements.
10.2.3.3 Resist of insul. mat. to abnormal heat/fire by internal elect. effects  10.2.4 Resistance to ultra-violet (UV) radiation  Meets the product standard's requirements.  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  10.8 Connections for external conductors  10.9 Power-frequency electric strength  10.9.2 Power-frequency electric strength  10.9.3 Impulse withstand voltage  10.9.4 Testing of enclosures made of insulating material  10.10 Temperature rise  10.11 Short-circuit rating  10.12 Electromagnetic compatibility  10.13 Hechanical function  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	10.2.3.1 Verification of thermal stability of enclosures	Meets the product standard's requirements.
10.2.4 Resistance to ultra-violet (UV) radiation  10.2.5 Lifting  10.2.6 Mechanical impact  10.2.7 Inscriptions  10.2.7 Inscriptions  10.3 Degree of protection of assemblies  10.4 Clearances and creepage distances  10.4 Clearances and creepage distances  10.5 Protection against electric shock  10.6 Incorporation of switching devices and components  10.7 Internal electrical circuits and connections  10.8 Connections for external conductors  10.9 Power-frequency electric strength  10.9.3 Impulse withstand voltage  10.9.4 Testing of enclosures made of insulating material  10.10 Temperature rise  10.11 Short-circuit rating  10.12 Electromagnetic compatibility  10.13 Mechanical function  Meets the product standard's requirements.  Does not apply, since the entire switchgear needs to be evaluated.  Does not apply, since the entire switchgear needs to be evaluated.  Does not apply, since the entire switchgear needs to be evaluated.  Does not apply, since the entire switchgear needs to be evaluated.  Does not apply, since the entire switchgear needs to be evaluated.  Does not apply, since the entire switchgear needs to be evaluated.  Does not apply, since the entire switchgear needs to be evaluated.  Does not apply, since the entire switchgear needs to be evaluated.  Does not apply, since the entire switchgear needs to be evaluated.  Does not apply, since the entire switchgear needs to be evaluated.  Does not apply, since the entire switchgear needs to be evaluated.  Does not apply, since the entire switchgear needs to be evaluated.  Does not apply, since the entire switchgear needs to be evaluated.  Does not apply, since the entire switchgear needs to be evaluated.  Does not apply, since the entire switchgear needs to be evaluated.  Does not apply, since the entire switchgear needs to be evaluated.  In the panel builder's responsibility.  In the panel builder's	10.2.3.2 Verification of resistance of insulating materials to normal heat	Meets the product standard's requirements.
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.  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  10.6 Incorporation of switching devices and components  10.7 Internal electrical circuits and connections  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.  10.9.2 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  10.10 Temperature rise  The panel builder's responsibility.  10.11 Short-circuit rating  Is the panel builder's responsibility.  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	10.2.3.3 Resist. of insul. mat. to abnormal heat/fire by internal elect. effects	Meets the product standard's requirements.
10.2.6 Mechanical impact 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. 10.9.2 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 The panel builder's responsibility. The specifications for the switchgear must be observed. 10.12 Electromagnetic compatibility 10.13 Mechanical function The device meets the requirements, provided the information in the instruction	10.2.4 Resistance to ultra-violet (UV) radiation	Meets the product standard's requirements.
10.27 Inscriptions  10.3 Degree of protection of assemblies  10.4 Clearances and creepage distances  Meets the product standard's requirements.  10.5 Protection against electric shock  10.6 Incorporation of switching devices and components  10.7 Internal electrical circuits and connections  10.8 Connections for external conductors  10.9 Power-frequency electric strength  10.9.3 Impulse withstand voltage  10.9.4 Testing of enclosures made of insulating material  10.10 Temperature rise  10.11 Short-circuit rating  10.12 Electromagnetic compatibility  10.13 Mechanical function  Meets the product standard's requirements.  Does not apply, since the entire switchgear needs to be evaluated.  Does not apply, since the entire switchgear needs to be evaluated.  Is the panel builder's responsibility.  Is the panel builder's responsibility.  Is the panel builder's responsibility.  In panel builder's responsibility. The specifications for the switchgear must be observed.  In the panel builder's responsibility. The specifications for the switchgear must be observed.	10.2.5 Lifting	Does not apply, since the entire switchgear needs to be evaluated.
10.3 Degree of protection of assemblies  10.4 Clearances and creepage distances  Meets the product standard's requirements.  10.5 Protection against electric shock  10.6 Incorporation of switching devices and components  10.7 Internal electrical circuits and connections  10.8 Connections for external conductors  10.9 Power-frequency electric strength  10.9.2 Power-frequency electric strength  10.9.4 Testing of enclosures made of insulating material  10.10 Temperature rise  10.10 Temperature rise  10.11 Short-circuit rating  10.12 Electromagnetic compatibility  10.13 Mechanical function  Does not apply, since the entire switchgear needs to be evaluated.  Does not apply, since the entire switchgear needs to be evaluated.  Is the panel builder's responsibility.  In provide heat dissipation data for the temperature rise calculation. Eaton will provide heat dissipation data for the devices.  Is the panel builder's responsibility. The specifications for the switchgear must be observed.  Is the panel builder's responsibility. The specifications for the switchgear must be observed.	10.2.6 Mechanical impact	Does not apply, since the entire switchgear needs to be evaluated.
10.4 Clearances and creepage distances  10.5 Protection against electric shock  10.6 Incorporation of switching devices and components  10.7 Internal electrical circuits and connections  10.8 Connections for external conductors  10.9 Power-frequency electric strength  10.9.3 Impulse withstand voltage  10.9.4 Testing of enclosures made of insulating material  10.10 Temperature rise  10.11 Short-circuit rating  10.12 Electromagnetic compatibility  10.12 Electromagnetic compatibility  10.13 Mechanical function  Meets the product standard's requirements.  Does not apply, since the entire switchgear needs to be evaluated.  Is the panel builder's responsibility.  The panel builder's responsibility.  Is the panel builder's responsibility.  Is the panel builder's responsibility.  Is the panel builder's responsibility.  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	10.2.7 Inscriptions	Meets the product standard's requirements.
10.5 Protection against electric shock 10.6 Incorporation of switching devices and components 10.7 Internal electrical circuits and connections 10.8 Connections for external conductors 10.9.2 Power-frequency electric strength 10.9.3 Impulse withstand voltage 10.9.4 Testing of enclosures made of insulating material 10.10 Temperature rise 10.11 Short-circuit rating 10.12 Electromagnetic compatibility 10.13 Mechanical function  Does not apply, since the entire switchgear needs to be evaluated.  Is the panel builder's responsibility.  The panel builder's responsibility. The specifications for the switchgear must be observed.  Is the panel builder's responsibility. The specifications for the switchgear must be observed.  The device meets the requirements, provided the information in the instruction	10.3 Degree of protection of assemblies	Does not apply, since the entire switchgear needs to be evaluated.
10.6 Incorporation of switching devices and components  10.7 Internal electrical circuits and connections  10.8 Connections for external conductors  10.9.2 Power-frequency electric strength  10.9.3 Impulse withstand voltage  10.9.4 Testing of enclosures made of insulating material  10.10 Temperature rise  10.11 Short-circuit rating  10.12 Electromagnetic compatibility  10.13 Mechanical function  10.13 Mechanical function  10.16 Incorporation of switching devices and components  Is the panel builder's responsibility.  Is the panel builder's responsibility.  Is the panel builder's responsibility.  1b the panel builder's responsibility.  1c the panel builder's responsibility. The specifications for the switchgear must be observed.  1c the panel builder's responsibility. The specifications for the switchgear must be observed.  1c the panel builder's responsibility. The specifications for the switchgear must be observed.  1c the panel builder's responsibility. The specifications for the switchgear must be observed.  1c the panel builder's responsibility. The specifications for the switchgear must be observed.	10.4 Clearances and creepage distances	Meets the product standard's requirements.
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.  10.9.2 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  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	10.5 Protection against electric shock	Does not apply, since the entire switchgear needs to be evaluated.
10.8 Connections for external conductors  10.9.2 Power-frequency electric strength  10.9.3 Impulse withstand voltage  10.9.4 Testing of enclosures made of insulating material  10.10 Temperature rise  10.11 Short-circuit rating  10.12 Electromagnetic compatibility  10.13 Mechanical function  Is the panel builder's responsibility.  Is the panel builder's responsibility.  The panel builder is responsibility for the temperature rise calculation. Eaton will provide heat dissipation data for the devices.  Is the panel builder's responsibility. The specifications for the switchgear must be observed.  In the panel builder's responsibility. The specifications for the switchgear must be observed.  The device meets the requirements, provided the information in the instruction	10.6 Incorporation of switching devices and components	Does not apply, since the entire switchgear needs to be evaluated.
10.9.2 Power-frequency electric strength 10.9.3 Impulse withstand voltage 10.9.4 Testing of enclosures made of insulating material 10.10 Temperature rise 10.11 Short-circuit rating 10.12 Electromagnetic compatibility 10.13 Mechanical function 10.13 Mechanical function  Is the panel builder's responsibility.  Is the panel builder is responsibility.  The panel builder is responsibility is responsibility. The specifications for the switchgear must be observed.  Is the panel builder's responsibility. The specifications for the switchgear must be observed.  The device meets the requirements, provided the information in the instruction	10.7 Internal electrical circuits and connections	Is the panel builder's responsibility.
10.9.3 Impulse withstand voltage  10.9.4 Testing of enclosures made of insulating material  10.10 Temperature rise  10.11 Short-circuit rating  10.12 Electromagnetic compatibility  10.13 Mechanical function  Is the panel builder's responsibility.  The panel builder is responsible for the temperature rise calculation. Eaton will provide heat dissipation data for the devices.  Is the panel builder's responsibility. The specifications for the switchgear must be observed.  10.12 Electromagnetic compatibility  The device meets the requirements, provided the information in the instruction	10.8 Connections for external conductors	Is the panel builder's responsibility.
10.9.4 Testing of enclosures made of insulating material  10.10 Temperature rise  The panel builder is responsibility.  The panel builder is responsibile for the temperature rise calculation. Eaton will provide heat dissipation data for the devices.  10.11 Short-circuit rating  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	10.9.2 Power-frequency electric strength	Is the panel builder's responsibility.
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	10.9.3 Impulse withstand voltage	Is the panel builder's responsibility.
provide heat dissipation data for the devices.  10.11 Short-circuit rating  10.12 Electromagnetic compatibility  10.13 Mechanical function  provide heat dissipation data for the devices.  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	10.9.4 Testing of enclosures made of insulating material	Is the panel builder's responsibility.
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	10.10 Temperature rise	
observed.  10.13 Mechanical function  The device meets the requirements, provided the information in the instruction	10.11 Short-circuit rating	
	10.12 Electromagnetic compatibility	, , , , , ,
	10.13 Mechanical function	

## **Technical data ETIM 9.0**

Low-voltage industrial components (EG000017) / Under voltage coil (EC001022)					
Electric engineering, automation, process control engineering / Low-voltage switch technology / Circuit breaker (LV < 1 kV) / Undervoltage trip (ecl@ss13-27-37-04-17 [AKF015018])					
Rated control supply voltage AC 50 Hz	V		0 - 0		
Rated control supply voltage AC 60 Hz	V		120 - 120		
Rated control supply voltage DC	V		0 - 0		
Voltage type for actuating			AC		
Type of electric connection			Screw connection		
Number of contacts as normally open contact			0		
Number of contacts as normally closed contact			0		
Number of contacts as change-over contact			0		
Delayed			No		
Suitable for power circuit breaker			No		

Suitable for off-load switch	No
Suitable for motor safety switch	Yes
Suitable for overload relay	No