

Overload relay, 24-32A, 1N/O+1N/C

Part no. ZB32-32 Article no. 278454 Catalog No. XTOB032CC1



Delivery program

Contact sequence Contact sequence Auxiliary contacts N/0 = Normally open N/C = Normally closed For use with I N/O DILM17, DILM25, DILM38, DILM81, DILM81, DILM81, DILM81, DILM81, DILM81, DILM81, DILM82, DILM82	Delivery program			
Accessories Frame size Phase-failure sensitivity Description Mounting type Contact sequence N/C = Normally closed N/C = Normally closed For use with Type 1 = coordination Type 2 = State	Product range			Overload relay ZB up to 150 A
Frame size Phase/failure sensitivity Description Mounting type Ly A 2 24 32 Contact sequence Auxiliary contacts N/O = Normally closed N/O = Normally closed For use with To great with To great with To great with N/O = Normally closed For use with Type 1"1" coordination Type 1"1" co	Product range			Accessories
Phase-failure sensitivity Description Bescription Mounting type Contact sequence NO - Normally open NC - Normally closed NO - Normally closed For use with True and bescription NO - Normally closed For use with True and bescription NO - Normally closed For use with NO - Normally closed NORMAN Closed NO	Accessories			Overload relays
Description Mounting type Line Contact sequence Auxiliary contacts N/O - Normally closed For use with N/O - Normally closed N/O - Normally closed For use with N/O - Normally closed For	Frame size			ZB32
Mounting type Image: Passe pushbut manual/auto Fin-free release Direct mounting	Phase-failure sensitivity			IEC/EN 60947, VDE 0660 Part 102
Contact sequence Auxiliary contacts N/O = Normally open N/C = Normally closed For use with The state of	Description			Reset pushbutton manual/auto
Contact sequence Auxiliary contacts N/O = Normally open N/C = Normally closed For use with Type "1" coordination Type "1" coordinat	Mounting type			Direct mounting
Auxiliary contacts N/O = Normally open N/C = Normally closed For use with Short-circuit protection Type "1" coordination Type "1" coordination Politics of the service of the servic	中	I _r	Α	24 - 32
N/C = Normally open N/C = Normally closed For use with N/C = Normally closed I N/C DILM17, DILM25, DILM32, DILM8, DILMF11, DILMF14, DILMF17, DILMF25, DILMF25, DILMF25, DILMF27, DILMM22, DILMM22, DILMM232, DILMM232, DILMM232, DILMM25, DILMM26, DILMM26	Contact sequence			2 4 6 98 96 14/
N/C = Normally closed For use with For use with For use with For use with I N/C DILM17, DILM25, DILM32, DILM61, DILMF14, DILMF17, DILMF17, DILMF25, DILM725, DILM726, DILM726, DILM726, DILM726, DILM726, DILM726, DILM726, DILM726, DILM726, DILM717, DILMF14, DI	Auxiliary contacts			
For use with DILM17, DILM25, DILM38, DILM58, DILM611, DILM617, DILM617, DILM617, DILM617, DILM617, DILM617, DILM618, DILM617, DILM625, DILM625, DILM625, DILM625, DILM625, DILM625, DILM627,	N/O = Normally open			1 N/O
Short-circuit protection Type "1" coordination gG/gL A DILM32, DILM83, DILMF14, DILMF14, DILMF14, DILMF15, DILMF25, DILMF32, DIULM17, DIULM25, DIULM32, SDAINLM30, SDAINLM30, SDAINLM45, SDAINLM55 DS7-34SX032 125	N/C = Normally closed			1 N/C
Type "1" coordination gG/gL A 125	For use with			DILM32, DILM78, DILMF11, DILMF11, DILMF14, DILMF17, DILMF25, DILMF32, DIULM17, DIULM25, DIULM32, SDAINLM30, SDAINLM45, SDAINLM45,
ф	Short-circuit protection			
Type "2" coordination gG/gL A 63	Type "1" coordination	gG/gL	A	125
	Type "2" coordination	gG/gL	A	63

Notes

Overload release: tripping class 10 A

short-circuit protective device: Observe the maximum permissible fuse of the contactor with direct device mounting.

Suitable for protection of EEx°e-motors.

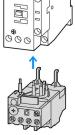


II(2)G [Ex d] [Ex e] [Ex px], II(2)D [Ex p] [Ex t]

PTB 04 ATEX 3022

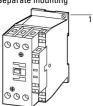
Observe manual AWB2300-1527D/GB.

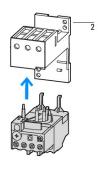
Notes Fitted directly to the contactor



1 Contactor 2 Bases

Separate mounting





Technical data General

delieral		
Standards		IEC/EN 60947, VDE 0660, UL, CSA
Climatic proofing		Damp heat, constant, to IEC 60068-2-78 Damp heat, cyclic, to IEC 60068-2-30
Ambient temperature		
		Operating range to IEC/EN 60947 PTB: -5 °C - +55 °C
Open	°C	-25 - +55
Enclosed	°C	- 25 - 40
Temperature compensation		Continuous
Weight	kg	0.15
Mechanical shock resistance	g	10 Sinusoidal Shock duration 10 ms
Degree of Protection		IP20
Protection against direct contact when actuated from front (EN 50274)		Finger and back-of-hand proof

Protection against direct contact when actuated from front (EN 50274)			Finger and back-of-hand proof
Main conducting paths			
Rated impulse withstand voltage	U_{imp}	V AC	6000
Overvoltage category/pollution degree			III/3
Rated insulation voltage	Ui	V	690
Rated operational voltage	U _e	V AC	690
Safe isolation to EN 61140			
Between auxiliary contacts and main contacts		V AC	440
Between main circuits		V AC	440
Temperatur compensation residual error > 40 °C			≦ _{0.25 %/K}
Current heat loss (3 conductors)			
Lower value of the setting range		W	3.4
Maximum setting		W	6
Terminal capacities		mm^2	
Solid		mm^2	2 x (1 - 6)
Flexible with ferrule		mm ²	2 x (1 - 4) With ferrules to DIN 46228
Solid or stranded		AWG	18 - 8
Terminal screw			M4
Tightening torque		Nm	1.8
Tools			
Pozidriv screwdriver		Size	2
Standard screwdriver		mm	1 x 6

Auxiliary and control circuits			
Rated impulse withstand voltage	U_{imp}	V	4000
Overvoltage category/pollution degree			III/3
Terminal capacities		mm^2	
Solid		mm ²	2 x (0.75 - 4)
Flexible with ferrule		mm^2	2 x (0.75 - 2.5)
Solid or stranded		AWG	2 x (18 - 14)
Terminal screw			M3.5
Tightening torque		Nm	0.8 - 1.2
Tools			
Pozidriv screwdriver		Size	2
Standard screwdriver		mm	1 x 6
Rated insulation voltage	Ui	V AC	500
Rated operational voltage	U _e	V AC	500
Safe isolation to EN 61140			
between the auxiliary contacts		V AC	240
Conventional thermal current	I _{th}	Α	6
Rated operational current	I _e	Α	
AC-15			
Make contact			
120 V	I _e	Α	1.5
220 V 230 V 240 V	I _e	Α	1.5
380 V 400 V 415 V	I _e	Α	0.5
500 V	I _e	Α	0.5
Break contact			
120 V	I _e	Α	1.5
220 V 230 V 240 V	I _e	Α	1.5
380 V 400 V 415 V	l _e	Α	0.9
500 V	l _e	Α	0.8
DC-13 L/R - 15 ms			
24 V	I _e	Α	0.9
60 V	l _e	Α	0.75
110 V	l _e	Α	0.4
220 V	l _e	Α	0.2
Notes			Rated operational current DC-13, 60 V: N/O auxiliary contact 0.6 A
Short-circuit rating without welding			
max. fuse		A gG/gL	6

Design verification as per IEC/EN 61439

boolgii voimoution do por 120/214 or 100			
Technical data for design verification			
Rated operational current for specified heat dissipation	In	Α	32
Heat dissipation per pole, current-dependent	P_{vid}	W	2
Equipment heat dissipation, current-dependent	P_{vid}	W	6
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	55
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	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.
10.8 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	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.

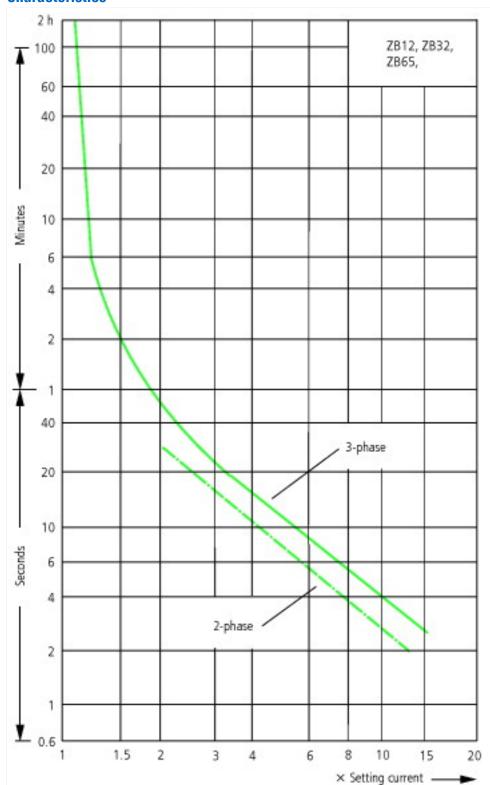
Technical data ETIM 6.0

Low-voltage industrial components (EG000017) / Thermal overload relay (EC000106)			
Electric engineering, automation, process control engineering / Low-voltage switch technology / Overload protection device / Thermal overload relay (ecl@ss8.1-27-37-15-01 [AKF075011])			
Adjustable current range	А		24 - 32
Max. rated operation voltage Ue	V		690
Mounting method			Direct attachment
Type of electrical connection of main circuit			Screw connection
Number of auxiliary contacts as normally closed contact			1
Number of auxiliary contacts as normally open contact			1
Number of auxiliary contacts as change-over contact			0
Release class			CLASS 10

Approvals

Product Standards	UL 508; CSA-C22.2 No. 14; IEC/EN 60947-4-1; IEC/EN 60947-5-1; CE marking
UL File No.	E29184
UL Category Control No.	NKCR
CSA File No.	12528
CSA Class No.	3211-03
North America Certification	UL listed, CSA certified
Specially designed for North America	No
Suitable for	Branch circuits
Max. Voltage Rating	600 V AC
Degree of Protection	IEC: IP20, UL/CSA Type: -

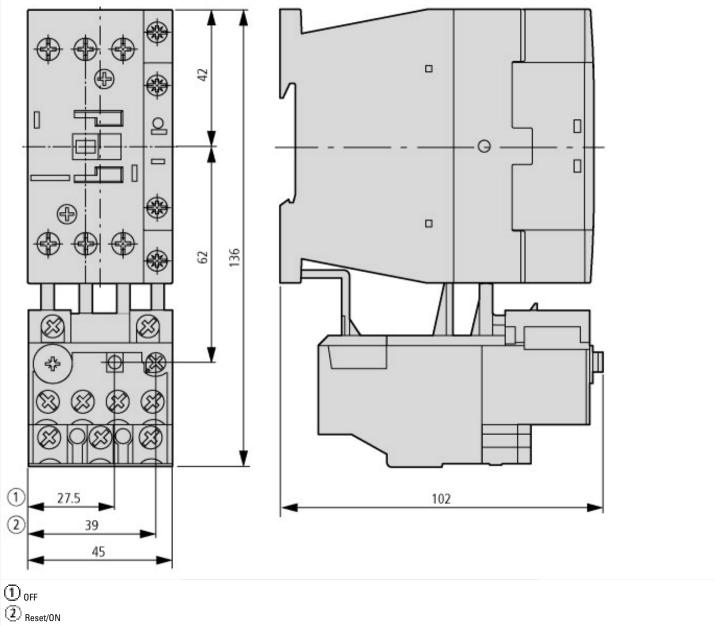
Characteristics

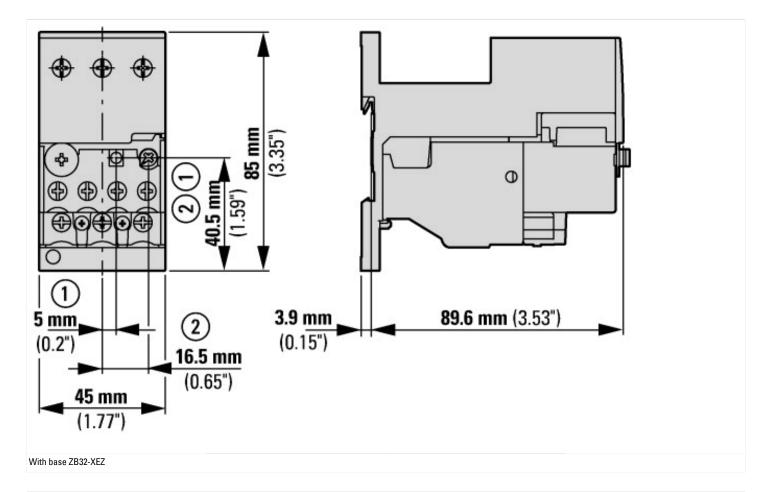


These tripping characteristics are mean values of the spread at 20 °C ambient temperature in a cold state. Tripping time depends on response current.

On devices at operating temperature the tripping time of the overload relay drops to approx. 25 % of the read value. Specific characteristics for each individual setting range can be found in the manual.

Dimensions





Additional product information	Additional product information (links)		
IL03407015Z (AWA2300-2114) Overload relay			
IL03407015Z (AWA2300-2114) Overload relay	ftp://ftp.moeller.net/DOCUMENTATION/AWA_INSTRUCTIONS/IL03407015Z2014_08.pdf		
IL03407195Z Sealable shroud			
IL03407195Z Sealable shroud	ftp://ftp.moeller.net/DOCUMENTATION/AWA_INSTRUCTIONS/IL03407195Z2011_06.pdf		
MN03407004Z (AWB2300-1527D/GB) ZB12/XT0BBC1 and ZB32/XT0BCC1 overload relays, overload monitoring of Ex e motors			
MN03407004Z (AWB2300-1527D/GB) ZB12/ XTOBBC1 and ZB32/XTOBCC1 overload relays, overload monitoring of Ex e motors - Deutsch / English	ftp://ftp.moeller.net/D0CUMENTATION/AWB_MANUALS/MN03407004Z_DE_EN.pdf		