Specifications



Photo is representative

Eaton 259503

Eaton Moeller series NZM Undervoltage release, 480-525VAC, for NZM2/3

General specification	าร
PRODUCT NAME	Eaton Moeller series NZM Undervoltage release
CATALOG NUMBER	259503
MODEL CODE	NZM2/3-XU480-525AC
EAN	4015082595036
PRODUCT LENGTH/DEPTH	42 mm
PRODUCT HEIGHT	90 mm
PRODUCT WIDTH	30 mm
PRODUCT WEIGHT	0.064 kg
COMPLIANCES	IEC UL/CSA RoHS conform
CERTIFICATIONS	CE marking CSA certified CSA (Class No. 1437-01) UL489 CSA-C22.2 No. 5-09 IEC60947 UL listed CSA (File No. 22086) UL (File No. E140305) UL (Category Control Number DIHS)
GLOBAL CATALOG	259503



Product specification	S
USED WITH	NZM3(-4), N(S)3(-4) NZM2(-4), N(S)2(-4)
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	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	Does not apply, since the

Resources	
BROCHURES	eaton-digital-nzm- brochure-br013003en-en- us.pdf eaton-feerum-the-whole- grain-solution-success- story-en-us.pdf
CATALOGS	eaton-digital-nzm-catalog- ca013003en-en-us.pdf
ECAD MODEL	<u>DA-CE-ETN.NZM2_3-</u> XU480-525AC
INSTALLATION INSTRUCTIONS	eaton-circuit-breaker- voltage-release-nzm2-3- il012141zu.pdf
INSTALLATION VIDEOS	The new digital NZM Range Introduction of the new digital circuit breaker NZM
TECHNICAL DATA SHEETS	eaton-nzm-technical- information-sheet

PROTECTION OF ASSEMBLIES	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	ls the panel builder's responsibility.
ELECTRIC CONNECTION TYPE	Screw connection
FRAME	NZM2/3
MINIMUM COMMAND TIME - MAX	15 ms
MINIMUM COMMAND TIME - MIN	10 ms
NUMBER OF CONTACTS (NORMALLY OPEN CONTACTS)	0
REACTION TIME	19 ms
PICK-UP POWER CONSUMPTION AT AC (UNDERVOLTAGE RELEASE)	1.5 VA
PICK-UP POWER CONSUMPTION AT DC (UNDERVOLTAGE RELEASE)	0.8 W
VOLTAGE TOLERANCE - MAX	1.1
VOLTAGE TOLERANCE - MIN	.85
RATED CONTROL SUPPLY VOLTAGE	480 - 525 V 50/60 Hz

RATED CONTROL SUPPLY VOLTAGE (US) AT AC, 50 HZ - MAX	525 V
RATED CONTROL SUPPLY VOLTAGE (US) AT AC, 50 HZ - MIN	480 V
RATED CONTROL SUPPLY VOLTAGE (US) AT AC, 60 HZ - MAX	525 V
RATED CONTROL SUPPLY VOLTAGE (US) AT AC, 60 HZ - MIN	480 V
SUITABLE FOR	Off-load switch
CONNECTION TYPE	With bolt connection
VOLTAGE TYPE	AC
DROP-OUT VOLTAGE OF UNDERVOLTAGE RELEASE AC/DC - MAX	0.7 x Us
DROP-OUT VOLTAGE OF UNDERVOLTAGE RELEASE AC/DC - MIN	0.35 x Us
TERMINAL CAPACITY (SOLID/FLEXIBLE CONDUCTOR)	0.75 mm² - 2.5 mm² (2x) at shunt release with ferrule 0.75 mm² - 2.5 mm² (2x) for undervoltage releases, off-delayed with ferrule 0.75 mm² - 2.5 mm² (1x) at shunt release with ferrule 18 - 14 AWG (1x) for undervoltage releases, off-delayed 0.75 mm² - 2.5 mm² (1x) for undervoltage releases, off-delayed with ferrule 18 - 14 AWG (1x) at shunt release 18 - 14 AWG (2x) at shunt release 18 - 14 AWG (2x) for undervoltage releases, off-delayed
ТҮРЕ	Accessory Undervoltage release
SPECIAL FEATURES	Non-delayed disconnection of NZM circuit-breaker or N switch-disconnector when the control voltage sinks below 35 – 70% US. For use with emergency-stop devices in connection with an emergency-stop

button. When the undervoltage trip is switched off, accidental contact with the circuit breaker's primary contacts is prevented when switched on. Undervoltage releases cannot be installed simultaneously with NZM...-XHIV... early-make auxiliary contact or NZM...-XA... shunt release.

POWER CONSUMPTION

0.8 W (sealing DC) 1.5 VA (sealing AC)

RATED CONTROL SUPPLY VOLTAGE (US) AT DC-

0 V

MAX

RATED CONTROL SUPPLY

VOLTAGE (US) AT DC-

MIN

0 V

NUMBER OF CONTACTS (NORMALLY CLOSED

0

CONTACTS)

CONTACTS)

NUMBER OF CONTACTS

(CHANGE-OVER

0

UNDELAYED SHORT-

0 A **CIRCUIT RELEASE - MIN**

UNDELAYED SHORT-

CIRCUIT RELEASE - MAX

0 A

RATED CONTROL VOLTAGE (RELAY CONTACTS)

480 V AC 525 V AC

PROJECT NAME:

PROJECT NUMBER:

PREPARED BY:

DATE:



Eaton Corporation plc

Eaton House 30 Pembroke Road Dublin 4, Ireland Eaton.com

© 2025 Eaton. All Rights Reserved.

Follow us on social media to get the latest product and support information.









