

DIL CONTACTORS  
239937



Overview



Specifications



Resources

How to

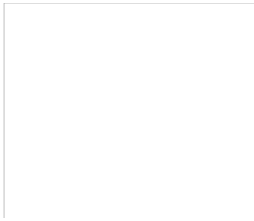
## 239937

Eaton Moeller® series SDAINL Star-delta contactor  
45 kW, 230 V 50 Hz, 240 V 60 Hz, AC operation



[WIN-WIN with Push-in Terminals](#)

[How to improve wiring](#)



## Designed to work together

Discover other Eaton products and accessories built to enhance this product.

### 281206

Eaton Moeller® series DILM RC suppressor circuit, 110 - 240 AC V, For use with: DILM40 - DILM95, DILK33 - DILK50, DILMP63 - DILMP200

### 083094

Eaton Moeller® series Amplifier module, for separate mounting

### 136504

Eaton Moeller® series ZEB Overload relay, Direct mounting, Earth-fault protection: none, I<sub>r</sub>= 20 - 100 A, 1 N/O, 1 N/C ZEB65-100

### 281218

Eaton Moeller® series DILM Va suppressor circuit, 130 - 240 AC V, For use with: DILM40 - DILM95, DILK33 - DILK50, DILMP63 - DILMP200 XSPV240

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## GENERAL SPECIFICATIONS

General specifications



**PRODUCT NAME** Eaton Moeller® series SDAINL contactor combination

**CATALOG NUMBER** 239937

Product specifications



**MODEL CODE** SDAINLM90(230V50HZ,240V60HZ)

**EAN** 4015082399375

**PRODUCT LENGTH/DEPTH** 147 mm

**PRODUCT HEIGHT** 115 mm

**PRODUCT WIDTH** 188 mm

**PRODUCT WEIGHT** 2.935 kg

**CERTIFICATIONS**

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## PRODUCT SPECIFICATIONS

<b>RATED OPERATIONAL CURRENT FOR SPECIFIED HEAT DISSIPATION (IN)</b>	90 A
<b>10.11 SHORT-CIRCUIT RATING</b>	Is the panel builder's responsibility. The specifications must be observed.
<b>RATED OPERATIONAL POWER AT AC-3, 380/400 V, 50 HZ</b>	45 kW
<b>OPERATING VOLTAGE AT AC, 50 HZ - MAX</b>	690 V
<b>RATED CONTROL SUPPLY VOLTAGE (US) AT AC, 50 HZ - MIN</b>	230 V
<b>10.4 CLEARANCES AND CREEPAGE DISTANCES</b>	Meets the product standard's requirements.
<b>10.12 ELECTROMAGNETIC COMPATIBILITY</b>	Is the panel builder's responsibility. The specifications must be observed.
<b>NUMBER OF CONTACTS (NORMALLY CLOSED) AS MAIN CONTACT</b>	0
<b>10.2.5 LIFTING</b>	Does not apply, since the entire switchgear needs to be lifted.
<b>RATED OPERATIONAL POWER (NEMA)</b>	0 kW
<b>OPERATING VOLTAGE AT DC - MAX</b>	0 V
<b>10.2.3.1 VERIFICATION OF THERMAL STABILITY OF ENCLOSURES</b>	Meets the product standard's requirements.
<b>RATED CONTROL SUPPLY VOLTAGE (US) AT DC - MIN</b>	0 V
<b>RATED CONTROL SUPPLY VOLTAGE (US) AT AC, 50 HZ - MAX</b>	230 V
<b>FREQUENCY RATING</b>	50-60 Hz
<b>10.8 CONNECTIONS FOR EXTERNAL CONDUCTORS</b>	Is the panel builder's responsibility.
<b>NUMBER OF MAIN CONTACTS (NORMALLY OPEN CONTACT)</b>	9
<b>CHANGEOVER TIME</b>	20 s, max.
<b>OPERATING VOLTAGE AT DC - MIN</b>	0 V
<b>AMBIENT OPERATING TEMPERATURE - MAX</b>	60 °C
<b>STATIC HEAT DISSIPATION, NON-CURRENT-DEPENDENT PVS</b>	10.2 W
<b>ELECTRICAL CONNECTION TYPE FOR AUXILIARY- AND CONTROL-CURRENT CIRCUIT</b>	Screw connection
<b>ELECTRICAL CONNECTION TYPE OF MAIN CIRCUIT</b>	Screw connection

<b>RATED CONTROL SUPPLY VOLTAGE(US) AT DC - MAX</b>	0 V
<b>10.9.3 IMPULSE WITHSTAND VOLTAGE</b>	Is the panel builder's responsibility.
<b>UTILIZATION CATEGORY</b>	AC-3: Normal AC induction motors: starting, swit
<b>AMBIENT OPERATING TEMPERATURE- MIN</b>	-25 °C
<b>10.6 INCORPORATION OF SWITCHING DEVICES AND COMPONENTS</b>	Does not apply, since the entire switchgear needs to
<b>10.5 PROTECTION AGAINST ELECTRIC SHOCK</b>	Does not apply, since the entire switchgear needs to
<b>USED WITH</b>	ETR4-51
<b>OPERATING VOLTAGE AT AC, 50 HZ - MIN</b>	230 V
<b>10.13 MECHANICAL FUNCTION</b>	The device meets the requirements, provided the in instruction leaflet (IL) is observed.
<b>10.2.6 MECHANICAL IMPACT</b>	Does not apply, since the entire switchgear needs to
<b>10.9.4 TESTING OF ENCLOSURES MADE OF INSULATING MATERIAL</b>	Is the panel builder's responsibility.
<b>10.3 DEGREE OF PROTECTION OF ASSEMBLIES</b>	Does not apply, since the entire switchgear needs to
<b>HEAT DISSIPATION PER POLE, CURRENT-DEPENDENT PVID</b>	10.7 W
<b>APPLICATION</b>	Star-delta motor starting for contactor combinations
<b>ACTUATING VOLTAGE</b>	230 V 50 Hz, 240 V 60 Hz
<b>VOLTAGE TYPE</b>	AC
<b>PRODUCT CATEGORY</b>	Contactor combinations
<b>RATED OPERATIONAL POWER AT AC-3, 690 V, 50 HZ</b>	45 kW
<b>EQUIPMENT HEAT DISSIPATION, CURRENT-DEPENDENT PVID</b>	32.1 W
<b>HEAT DISSIPATION CAPACITY PDISS</b>	0 W
<b>SUITABLE FOR</b>	Also motors with efficiency class IE3
<b>NUMBER OF AUXILIARY CONTACTS (NORMALLY CLOSED CONTACTS)</b>	1
<b>10.2.3.2 VERIFICATION OF RESISTANCE OF INSULATING MATERIALS TO NORMAL HEAT</b>	Meets the product standard's requirements.
<b>10.2.3.3 RESIST. OF INSUL. MAT. TO ABNORMAL HEAT/FIRE BY INTERNAL ELECT. EFFECTS</b>	Meets the product standard's requirements.
<b>OPERATING VOLTAGE AT AC, 60 HZ - MAX</b>	690 V
<b>10.9.2 POWER-FREQUENCY ELECTRIC STRENGTH</b>	Is the panel builder's responsibility.
<b>DEGREE OF PROTECTION</b>	IP00 NEMA Other

<b>NUMBER OF AUXILIARY CONTACTS (CHANGE-OVER CONTACTS)</b>	0
<b>VOLTAGE TYPE OF OPERATING VOLTAGE</b>	AC
<b>RATED CONTROL SUPPLY VOLTAGE (US) AT AC, 60 HZ - MIN</b>	240 V
<b>RATED OPERATIONAL CURRENT (IE) AT AC-1, 380 V, 400 V, 415 V</b>	90 A
<b>10.7 INTERNAL ELECTRICAL CIRCUITS AND CONNECTIONS</b>	Is the panel builder's responsibility.
<b>10.10 TEMPERATURE RISE</b>	The panel builder is responsible for the temperature Eaton will provide heat dissipation data for the devi
<b>FUNCTIONS</b>	Star-delta contactor
<b>OPERATING VOLTAGE AT AC, 60 HZ - MIN</b>	230 V
<b>DUTY FACTOR</b>	100 %
<b>10.2.2 CORROSION RESISTANCE</b>	Meets the product standard's requirements.
<b>10.2.4 RESISTANCE TO ULTRA-VIOLET (UV) RADIATION</b>	Meets the product standard's requirements.
<b>10.2.7 INSCRIPTIONS</b>	Meets the product standard's requirements.
<b>RATED CONTROL SUPPLY VOLTAGE (US) AT AC, 60 HZ - MAX</b>	240 V
<b>RATED OPERATIONAL CURRENT (IE) AT AC-3, 380 V, 400 V, 415 V</b>	90 A
<b>NUMBER OF AUXILIARY CONTACTS (NORMALLY OPEN CONTACTS)</b>	1
<b>RATED OPERATIONAL POWER AT AC-3, 500 V, 50 HZ</b>	55 kW

Catalogs

Certification reports

Declarations of conformity

Drawings

eCAD model

Installation instructions

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Installation videos

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mCAD model

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System overview

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Wiring diagrams

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239937



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