DATASHEET - DMV-250/4/M4/P-R



Switch-disconnector, 4 pole, 250 A, With red rotary handle and yellow locking ring, rear mounting, with 400 mm metal shaft



DMV-250/4/M4/P-R Part no. 6094970 Catalog No.

EL-Nummer (Norway)

0001417207

Delivery program			
Product range			Switch-disconnector Main switch maintenance switch
Part group reference			DMV
Stop Function			Emergency switching off function
			With red rotary handle and yellow locking ring
Information about equipment supplied			auxiliary contact fitted by user.
Notes			With metal shaft for a control panel depth of 400 mm
Number of poles			4 pole
Auxiliary contacts			
· ·		N/0	0
7		N/C	0
Notes			1 padlock, # 5 mm
Locking facility			Lockable in the 0 (Off) position
Degree of Protection			Front IP65
Design			rear mounting
Contact sequence			0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0
Switching angle		0	90
Function			O OFF
Motor rating AC-23A, 50 - 60 Hz			
400 V	P	kW	147
Rated uninterrupted current	I _u	Α	250
Note on rated uninterrupted current $\mathbf{I}_{\mathbf{u}}$			Rated uninterrupted current $\mathbf{I}_{\mathbf{u}}$ is specified for max. cross-section.
Connection technique			9 mm connection hole

Technical data General

Constan	
Standards	IEC/EN 60947, VDE 0660, IEC/EN 60204 Switch-disconnector according to IEC/EN 60947-3
Certifications	CE, RoHs, KEMA, EAC, Lloyds
Ambient temperature	

Operation	θ	°C	-25 - +55
Storage	9	°C	-30 - +80
Overvoltage category/pollution degree	-	-	III/3
Rated impulse withstand voltage	U _{imp}	kV	8
Rated insulation voltage	Ui	V	1000
	O _I	V	
Mounting position Contacts			As required
Mechanical variables			
Number of poles			4 pole
Auxiliary contacts			
,		N/O	0
		N/C	0
Electrical characteristics			
Rated operational voltage	U _e	V AC	690
Rated uninterrupted current	Iu	Α	250
Note on rated uninterrupted current !u	u		Rated uninterrupted current $I_{\rm u}$ is specified for max. cross-section.
Short-circuit rating			The second control of
fuse			500/250
Rated conditional short-circuit current	Iq	kA	July 290 In = 500: 50
nacea contataonal short-off cult cult cult	14	IV-1	In = 300: 30 In = 250: 100
Breaking current		kA	In = 500: 40 In = 250: 33
max. let-through energy		kA ² s	In = 500: 1700 In = 250: 380
Rated short-time withstand current (1 s current)	I _{cw}	A _{rms}	12000
Note on rated short-time withstand current lcw			Current for a time of 0.3 seconds
Heat dissipation per pole, current-dependent	P_{vid}	W	3.75
Switching capacity			
Rated breaking capacity cos φ to IEC 60947-3		Α	
400/415 V		Α	2000
500 V		Α	1760
690 V		Α	1120
Safe isolation to EN 61140			
Current heat loss per contact at I _e		W	3.75
Lifespan, mechanical	Operations		10000
AC			
AC-21A			
Rated operational current switch			
400 V 415 V	l _e	Α	250
500 V	l _e	Α	250
690 V	l _e	Α	250
AC-22A			
Rated operational current switch			
400 V 415 V	l _e	Α	250
500 V	l _e	Α	250
690 V	I _e	Α	250
AC-23A			
Rated operational current switch			
400 V 415 V	I _e	Α	250
500 V	I _e	Α	220
690 V	I _e	Α	140
Motor rating AC-23A, 50 - 60 Hz	P	kW	
400 V 415 V	P	kW	147
500 V	P	kW	160
690 V	P	kW	132

Terminal capacities

Flat conductor connection with busbars	mm^2	120
Terminal screw		M8 x 20
Tightening torque for terminal screw	Nm	14
Technical safety parameters:		
Notes		B10 _d values as per EN ISO 13849-1, table C1

Design verification as per IEC/EN 61439

Design verification as per IEG/EN 01439			
Technical data for design verification			
Rated operational current for specified heat dissipation	In	Α	250
Heat dissipation per pole, current-dependent	P _{vid}	W	3.75
Equipment heat dissipation, current-dependent	P _{vid}	W	0
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 7.0

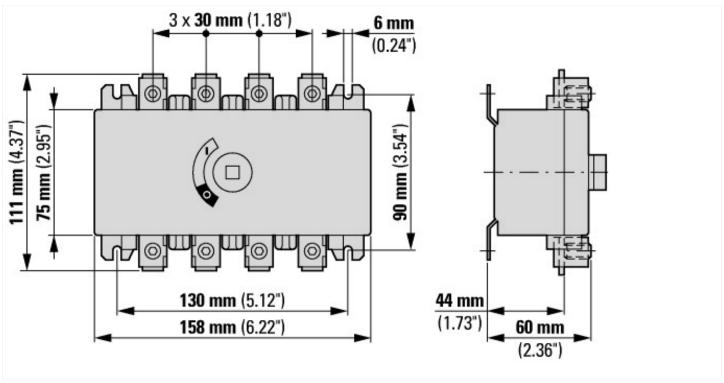
Low-voltage industrial components (EG000017) / Switch disconnector (EC000216)

Electric engineering, automation, process control engineering / Low-voltage switch technology / Off-load switch, circuit breaker, control switch / Switch disconnector (ecl@ss10.0.1-27-37-14-03 [AKF060013])

[AKF000013])			
Version as main switch		,	Yes
Version as maintenance-/service switch		,	Yes
Version as safety switch		,	Yes
Version as emergency stop installation		,	Yes
Version as reversing switch		ı	No
Number of switches		•	1
Max. rated operation voltage Ue AC	١	V	690

Rated operating voltage	V	690 - 690
Rated permanent current lu	Α	250
Rated permanent current at AC-23, 400 V	А	250
Rated permanent current at AC-21, 400 V	А	250
Rated operation power at AC-3, 400 V	kW	0
Rated short-time withstand current lcw	kA	12
Rated operation power at AC-23, 400 V	kW	250
Switching power at 400 V	kW	250
Conditioned rated short-circuit current Iq	kA	50
Number of poles		4
Number of auxiliary contacts as normally closed contact		0
Number of auxiliary contacts as normally open contact		0
Number of auxiliary contacts as change-over contact		0
Motor drive optional		No
Motor drive integrated		No
Voltage release optional		No
Device construction		Built-in device fixed built-in technique
Suitable for ground mounting		Yes
Suitable for front mounting 4-hole		No
Suitable for front mounting centre		No
Suitable for distribution board installation		No
Suitable for intermediate mounting		Yes
Colour control element		Red
Type of control element		Toggle
Interlockable		Yes
Type of electrical connection of main circuit		Screw connection
Degree of protection (IP), front side		IP20
Degree of protection (NEMA)		Other

Dimensions



Assets (links)

Declaration of CE Conformity

00003044

Instruction Leaflets

IL008008ZU2018_05