



Wall enclosure with mounting plate, HxWxD=500x400x250mm

Part no. CS-54/250
Catalog No. 111690

EL-Nummer 2466114
(Norway)

Delivery program

Product range			Wall-mounting housing CS
Product function			Wall-mounting housing with mounting plate
Degree of Protection			IP66 IP23 (with ventilating plates)
Description			Foamed polyurethane sealing throughout. Impact resistance category IK09 to EN 62262. Sheet steel mounting plate Bottom plate with foamed gasket. Single door, door stop on the right, door opening angle 120° Door hinge pins with quick change technology. Standardized locking system with sash fastener. Powder coating RAL 7035 inside and outside
Material			Steel plate
Dimensions			
Width		mm	400
Height		mm	500
Depth		mm	250
Locks	Number		2
Hinges	Number		2
Door profile molding	Number		2
Flange plates	Width x Depth	mm	172 x 332
Max. F3A flanges	Number		1
Mounting plates			
Height		mm	470
Width		mm	350
Weight		kg	11.9
Information about equipment supplied			Lock, 3 mm double ward key Including M6 threaded welded studs for earth conductor connections in the door

Technical data

General

Standards			IEC/EN 62208
RoHS			in accordance with Directive 2015/863/EU of the European Parliament and Council
RoHS (in accordance with Directive 2002/95/EC of the European Parliament and Council)			yes
Climatic proofing			Damp heat, constant, to IEC 60068-2-78; Damp heat, cyclical, to IEC 60068-2-30
Ambient temperature		°C	-25 - +40
Degree of Protection			IP66 IP23 (with ventilating plates)
Installation conditions			Indoor installation
Power loss			
			Power loss P_v [W] for fully enclosed sheet steel enclosure CS without internal partitions for wall mounting. Example: max. ambient temperature 35°C; Overtemperature $\Delta T = 20$ K; Relative humidity = 75%.
Max. heat dissipation			
Individual enclosure for wall mounting	P_v	W	39
Starting enclosure for wall mounting	P_v	W	36
Middle enclosure for wall mounting	P_v	W	33

Material characteristics

Material			Steel plate
Surface treatment			Structured powder spray polyester based paint finish

Surface finish			Semi-textured
Colour			light gray (RAL 7035)
Finish			Gloss
Material thickness		mm	
Body		mm	1.2
Mounting plate		mm	2
Door		mm	1.2
Bottom plate		mm	2

Material properties

Mechanical			
Impact resistance			IK09 according to EN 62262
max. assembly weights			
Total of Weight of fitted components		kg	225
Mounting plate		kg	200
Door		kg	25
			500 kg payload, when brackets fitted in all four enclosure corners (vertically or horizontally) and the weights are symmetrically distributed within the enclosure.

Description/standard features

Construction			Canted and seam welded, including two M6 threaded bolts for earth conductor connections inside the enclosure.
Back plate			9 mm drilling dimensions for wall mounting
Side plates			Without apertures
Top plate			Without apertures
Bottom plate			Enclosed, foamed gasket, can be unscrewed for F3A-... flanges or for assembly by user
Mounting plate, material			Sheet steel, hot-galvanized
Door, Engineering			Including M6 threaded welded studs for earth conductor connections in the door:
Information about equipment supplied			Lock, 3 mm double ward key Including M6 threaded welded studs for earth conductor connections in the door
			If electrical apparatus is to be installed in the door, a continuous, permanent protective ground contactor connection must be established with a protective ground cable. The threaded welded studs on the door and on the cabinet side wall must be used as connecting points for the ground leads.
Door hinges			On the right, can be converted by user
Type Door			Door hinges right can be converted by user
door opening angle			120°
Door interlock			Standard closure 3 mm double-ward key
Locks	Number		2

Design verification as per IEC/EN 61439

Technical data for design verification			
Heat dissipation, at an ambient temperature of 35°C, delta T: 20 degrees in top of the enclosure, calculated as per IEC 60890			
Individual enclosure for wall mounting	P _V	W	39
Starting enclosure for wall mounting	P _V	W	36
Middle enclosure for wall mounting	P _V	W	33
Heat dissipation, at an ambient temperature of 35°C, delta T: 35 degrees in top of the enclosure, calculated as per IEC 60890			
Individual enclosure for wall mounting	P _V	W	80
Starting enclosure for wall mounting	P _V	W	74
Middle enclosure for wall mounting	P _V	W	69
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 to enclosures without lifting aids.
10.2.6 Mechanical impact		IK09
10.2.7 Inscriptions		Meets the product standard's requirements.
10.3 Degree of protection of ASSEMBLIES		IP66
10.4 Clearances and creepage distances		Is the panel builder's responsibility.
10.5 Protection against electric shock		< 0.1 Ω; meets the product standard's requirements.
10.6 Incorporation of switching devices and components		Is the panel builder's responsibility.
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		$U_i = 1000 \text{ V AC}$
10.9.3 Impulse withstand voltage		Does not apply to basic enclosures as defined in EN 62208.
10.9.4 Testing of enclosures made of insulating material		Does not apply to metal enclosures.
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.
10.12 Electromagnetic compatibility		Is the panel builder's responsibility.
10.13 Mechanical function		Meets the product standard's requirements.

Technical data ETIM 7.0

Cabinet enclosures (EG000011) / Enclosure/switchgear cabinet (empty) (EC000261)			
Electric engineering, automation, process control engineering / Electrical cabinet, housing, rack / Electrical cabinet (empty) / Electrical cabinet (ecl@ss10.0.1-27-18-01-01 [AGZ056016])			
Width	mm	400	
Height	mm	500	
Depth	mm	250	
Material		Steel	
Material quality		Other	
Surface finishing		Powder coating	
Colour		Grey	
RAL-number		7035	
With mounting plate		Yes	
Mounting plate depth-adjustable		No	
Number of locks		2	
Floor installation possible		Yes	
Wall fastening possible		Yes	
Wall build in		Yes	
Pole fastening		Yes	
Tackable		No	
Number of doors		1	
Suitable for metrical mounting		Yes	
Suitable for outdoor set-up		No	
Pitched roof		No	
EMC-version		No	
With glazed door		No	
With ventilation door		No	
With backside door		No	
Impact strength		IK09	
Degree of protection (IP)		IP66	
Degree of protection (NEMA)		12	

Approvals

Product Standards		UL 508A; CSA-C22.2 No.14; IEC/EN 62208; CE marking
UL File No.		E336299
UL Category Control No.		NITW
CSA File No.		—

CSA Class No.		-
North America Certification		Request filed for CSA
Conditions of Acceptability		Series CS may be provided with metal sub-panel. No back mounted components are allowed between sub-panel and the back sheet metal enclosure
Specially designed for North America		No
Suitable for		Industrial Control Panels
Degree of Protection		IEC: IP66, indoor; UL/CSA Types 1, 12, indoor only.

Dimensions

