



SENTRON, Fuse switch disconnector 3NP1, 3-pole, NH00, 160 A, for Busbar system 8US 60 mm, Box terminal, Fuse monitoring: electronic EFM10, Cover level 32/70 mm

Model	
product designation	Fuse switch disconnector
busbar design	busbar thickness 5 or 10 mm
design of the safety monitoring	electronic EFM 10
design of the load switch strip form	No
type of the driving mechanism motor drive	No
General technical data	
number of poles	3
type of device	For 60 mm 8US busbar system
size of disconnecting link	00 and 000
size of fuse link	NH000, NH00
let-through current with closed switch maximum	23 kA
mechanical service life (operating cycles) typical	2 000
I _{2t} value with closed switch maximum	223 kA2.s
power factor	
• at AC-22 B	0.65
• at AC-23 B	0.45
• with capacitive load	-0.25
fuse system	LV HRC fuse
degree of pollution	2
Voltage	
insulation voltage	
• rated value	690 V
• with degree of pollution 3 at AC rated value	690 V
• with degree of pollution 2 at AC rated value	1 000 V
power factor at AC-21 B	0.95
surge voltage resistance rated value	8 kV
operational current	
• at 35 °C rated value	160 A
• at 40 °C rated value	155 A
• at 45 °C rated value	145 A
• at 50 °C rated value	140 A
• at 55 °C rated value	133 A
• at AC-21 B at 240 V rated value	160 A
• at AC-21 B at 400 V rated value	160 A
• at AC-21 B at 500 V rated value	160 A
• at AC-21 B at 690 V rated value	160 A
• at AC-22 B at 240 V rated value	160 A
• at AC-22 B at 400 V rated value	160 A
• at AC-22 B at 500 V rated value	160 A

• at AC-22 B at 690 V rated value	125 A
• at AC-23 B at 690 V rated value	35 A
• at AC-23 B at 500 V rated value	63 A
• at AC-23 B at 400 V rated value	160 A
• at AC-23 B at 240 V rated value	160 A
let-through current with high-speed activation maximum permissible	15 kA
operating voltage	
• at AC rated value minimum	230 V
• at AC rated value maximum	690 V
Protection class	
protection class IP	
• with closed switch with cover or cable lug cover	IP40
• with closed switch without cover or cable lug cover	IP30
• open	IP20
Dissipation	
power loss [W]	
• with conventional rated thermal current without fuse per pole	5 W
• with conventional rated thermal current without fuse per device	15 W
• for rated value of the current at AC in hot operating state per pole	17 W
• of the fuse per fuse maximum	12 W
Main circuit	
operational current	
• rated value	160 A
• with capacitive load at 400 V rated value	72 A
• with capacitive load at 500 V rated value	55 A
Auxiliary circuit	
number of CO contacts for auxiliary contacts	0
number of NC contacts for auxiliary contacts	0
number of NO contacts for auxiliary contacts	0
Suitability	
suitability for use main switch	No
suitability for use switch disconnector	Yes
suitability for use EMERGENCY OFF switch	No
suitability for use safety switch	Yes
suitability for use maintenance/repair switch	Yes
Product details	
product function phase failure monitoring	No
product component	
• undervoltage release	No
• undervoltage release with leading contact	No
product feature sealable	Yes
product extension auxiliary switch	Yes
product extension optional	
• locking capability	Yes
• phase failure monitoring	Yes
• voltage trigger	No
• overvoltage protection monitoring	Yes
Product function	
product function overvoltage protection monitoring	No
Short circuit	
conditional short-circuit current (I_q)	
• at AC at 240 V with high-speed activation rated value	80 kA
• at AC at 500 V with high-speed activation rated value	80 kA
• at AC at 690 V with high-speed activation rated value	50 kA
• with closed switch at AC at 240 V rated value	120 kA
• with closed switch at AC at 500 V rated value	120 kA
• with closed switch at AC at 690 V rated value	100 kA

Connections	
arrangement of electrical connectors for main current circuit	other
connectable conductor cross-section for main contacts	
• solid or stranded minimum	6 mm ²
• solid or stranded maximum	70 mm ²
• finely stranded with core end processing minimum	6 mm ²
• finely stranded with core end processing maximum	50 mm ²
• stranded minimum	6 mm ²
• stranded maximum	70 mm ²
tightening torque with screw-type terminals	
• minimum	10 N·m
• maximum	10 N·m
type of connectable conductor cross-sections of the laminated conductors maximum	9 x 12 mm
type of connection technology	Box terminal
Mechanical Design	
height	206.2 mm
width	105.8 mm
width of the busbar	
• minimum	12 mm
• maximum	30 mm
depth	177.2 mm
fastening method	busbar
fastening method	
• floor mounting	No
• rail mounting	Yes
mounting position	horizontal/vertical
busbar center-to-center spacing	60 mm
net weight	1.12 kg
Environmental conditions	
ambient temperature during operation	
• minimum	-25 °C
• maximum	55 °C
ambient temperature during storage	
• minimum	-50 °C
• maximum	80 °C
Certificates	
reference code according to IEC 81346-2	Q
Approvals Certificates	
General Product Approval	



[Confirmation](#)



EMV	For use in hazardous locations	Functional Safety	Test Certificates	other	Railway
		Type Examination Certificate	Type Test Certificates/Test Report	Confirmation	Special Test Certificate
RCM	ATEX				

Environment
Environmental Confirmations

Further information

Information on the packaging

<https://support.industry.siemens.com/cs/ww/en/view/109813875>

Information- and Downloadcenter (Catalogs, Brochures,...)

<http://www.siemens.com/lowvoltage/catalogs>

Industry Mall (Online ordering system)

<https://mall.industry.siemens.com/mall/en/en/Catalog/product?mlfb=3NP1133-1BC22>

Service&Support (Manuals, Certificates, Characteristics, FAQs,...)

<https://support.industry.siemens.com/cs/ww/en/ps/3NP1133-1BC22>

Image database (product images, 2D dimension drawings, 3D models, device circuit diagrams, ...)

http://www.automation.siemens.com/bilddb/cax_en.aspx?mlfb=3NP1133-1BC22

CAx-Online-Generator

<http://www.siemens.com/cax>

Tender specifications

<http://www.siemens.com/specifications>





