SIEMENS

Data sheet 3LD3148-0TL51



Load disconnector 3LD3, Iu 25 A Main switch 3-pole + N Rated operating capacity at AC-23 A at 400V 9.0kW floor mounting Basic switch with door coupling Central hole mounting 22.5mm Rotating drive black 66 x 66 mm

Model			
product brand name	SENTRON		
product designation	3LD Switch disconnector		
design of the product	Main switch		
display version / for switch position indicator manual operation	1 ON - 0 OFF		
type of switch	Floor mounting with door coupling		
design of the actuating element	Short rotary knob		
color / of the actuating element	black		
design of handle	rotary operating mechanism, black		
type of the driving mechanism / motor drive	No		
General technical data			
number of poles	4		
number of poles / note	4		
mechanical service life (switching cycles) / typical	100 000		
electrical endurance (switching cycles)			
• at AC-23 A / at 690 V	6 000		
operating frequency / maximum	50 1/h		
degree of pollution	3		
Voltage			
insulation voltage / rated value	690 V		
surge voltage resistance / rated value	6 kV		
operating voltage			
at AC / rated value	690 V		
operating frequency / rated value			
• minimum	50 Hz		
• maximum	60 Hz		
Protection class			
protection class IP	IP65		
degree of protection NEMA rating	1, 3R, 4X, 12		
protection class IP / on the front	IP65		
Dissipation			
power loss [W] / for rated value of the current / at AC / in hot operating state / per pole	1.1 W		
Current			
operational current / rated value	25 A		
operational current			
 at 40 °C / rated value 	25 A		
 at 45 °C / rated value 	25 A		

at 50 °C / rated value	25 A
 at 50 °C / rated value at 55 °C / rated value 	25 A 25 A
at AC / rated value	25 A 25 A
	2071
Main circuit	
operational current	25 A
• at AC-21 / at 690 V / rated value	25 A
 at AC-21 A / at 240 V / rated value 	25 A
 at AC-21 A / at 400 V / rated value 	25 A
• at AC-21 A / at 440 V / rated value	25 A
at AC-23 A / at 400 V / rated value	20 A
operating power	4 134/
 at AC-23 A / at 240 V / rated value 	4 kW
 at AC-23 A / at 400 V / rated value 	10 kW
• at AC-23 A / at 440 V / rated value	9 kW
• at AC-23 A / at 690 V / rated value	9 kW
• at AC-3 / at 240 V / rated value	4 kW
• at AC-3 / at 400 V / rated value	8 kW
at AC-3 / at 690 V / rated value	7.5 kW
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
operating voltage / of auxiliary contacts / at AC / maximum	500 V
continuous current / of the auxiliary contact / rated value	10 A
insulation voltage / of the auxiliary switch / rated value	500 V
Suitability	
suitability for use	V
• main switch	Yes
switch disconnector	Yes
EMERGENCY OFF switch	No
safety switch	Yes
maintenance/repair switch	Yes
Product details	
	Can be locked in zero position
special product feature	Can be locked in zero position
product feature / can be locked into OFF position	Yes
product feature / can be locked into OFF position accessories	
product feature / can be locked into OFF position accessories product extension / optional	Yes
product feature / can be locked into OFF position accessories product extension / optional • motor drive	Yes No
product feature / can be locked into OFF position accessories product extension / optional motor drive voltage trigger	Yes No No
product feature / can be locked into OFF position accessories product extension / optional • motor drive • voltage trigger number of connectable NC contacts / for auxiliary contacts / attachable / maximum	Yes No
product feature / can be locked into OFF position accessories product extension / optional	Yes No No
product feature / can be locked into OFF position accessories product extension / optional • motor drive • voltage trigger number of connectable NC contacts / for auxiliary contacts / attachable / maximum number of connectable NO contacts / for auxiliary contacts	No No 2
product feature / can be locked into OFF position accessories product extension / optional	No No 2
product feature / can be locked into OFF position accessories product extension / optional	No No 2 4 0
product feature / can be locked into OFF position accessories product extension / optional • motor drive • voltage trigger number of connectable NC contacts / for auxiliary contacts / attachable / maximum number of connectable NO contacts / for auxiliary contacts / attachable / maximum number of connectable CO contacts / for auxiliary contacts / attachable / maximum number of bracket locks / maximum	No No 2 4 0 3
product feature / can be locked into OFF position accessories product extension / optional • motor drive • voltage trigger number of connectable NC contacts / for auxiliary contacts / attachable / maximum number of connectable NO contacts / for auxiliary contacts / attachable / maximum number of connectable CO contacts / for auxiliary contacts / attachable / maximum number of bracket locks / maximum number of bracket locks / maximum hasp thickness / of the bracket locks	No No 2 4 0 3
product feature / can be locked into OFF position accessories product extension / optional	No No 2 4 0 3
product feature / can be locked into OFF position accessories product extension / optional • motor drive • voltage trigger number of connectable NC contacts / for auxiliary contacts / attachable / maximum number of connectable NO contacts / for auxiliary contacts / attachable / maximum number of connectable CO contacts / for auxiliary contacts / attachable / maximum number of bracket locks / maximum number of bracket locks / maximum hasp thickness / of the bracket locks Short circuit conditional short-circuit current / with line-side fuse protection	No No No 2 4 0 3 4 8 mm
product feature / can be locked into OFF position accessories product extension / optional • motor drive • voltage trigger number of connectable NC contacts / for auxiliary contacts / attachable / maximum number of connectable NO contacts / for auxiliary contacts / attachable / maximum number of connectable CO contacts / for auxiliary contacts / attachable / maximum number of bracket locks / maximum number of bracket locks / maximum hasp thickness / of the bracket locks Short circuit conditional short-circuit current / with line-side fuse protection • at 440 V / by gG fuse / rated value	No No 2 4 0 3 4 8 mm
product feature / can be locked into OFF position accessories product extension / optional • motor drive • voltage trigger number of connectable NC contacts / for auxiliary contacts / attachable / maximum number of connectable NO contacts / for auxiliary contacts / attachable / maximum number of connectable CO contacts / for auxiliary contacts / attachable / maximum number of bracket locks / maximum number of bracket locks / maximum hasp thickness / of the bracket locks Short circuit conditional short-circuit current / with line-side fuse protection • at 440 V / by gG fuse / rated value • at 690 V / by gG fuse / rated value	No No 2 4 0 3 4 8 mm
product feature / can be locked into OFF position accessories product extension / optional • motor drive • voltage trigger number of connectable NC contacts / for auxiliary contacts / attachable / maximum number of connectable NO contacts / for auxiliary contacts / attachable / maximum number of connectable CO contacts / for auxiliary contacts / attachable / maximum number of bracket locks / maximum number of bracket locks / maximum hasp thickness / of the bracket locks Short circuit conditional short-circuit current / with line-side fuse protection • at 440 V / by gG fuse / rated value • at 690 V / by gG fuse / rated value let-through current / with closed switch • at 240 V / for combination switch + gG fuse /	No No No 2 4 0 3 4 8 mm
product feature / can be locked into OFF position accessories product extension / optional • motor drive • voltage trigger number of connectable NC contacts / for auxiliary contacts / attachable / maximum number of connectable NO contacts / for auxiliary contacts / attachable / maximum number of connectable CO contacts / for auxiliary contacts / attachable / maximum number of bracket locks / maximum number of bracket locks / maximum hasp thickness / of the bracket locks Short circuit conditional short-circuit current / with line-side fuse protection • at 440 V / by gG fuse / rated value • at 690 V / for combination switch + gG fuse / maximum • at 440 V / for combination switch + gG fuse / maximum • at 690 V / for combination switch + gG fuse / maximum • at 690 V / for combination switch + gG fuse /	No No No 2 4 0 3 4 8 mm 10 kA 6 kA 3.5 kA
product feature / can be locked into OFF position accessories product extension / optional • motor drive • voltage trigger number of connectable NC contacts / for auxiliary contacts / attachable / maximum number of connectable NO contacts / for auxiliary contacts / attachable / maximum number of connectable CO contacts / for auxiliary contacts / attachable / maximum number of bracket locks / maximum number of bracket locks / maximum hasp thickness / of the bracket locks Short circuit conditional short-circuit current / with line-side fuse protection • at 440 V / by gG fuse / rated value let-through current / with closed switch • at 240 V / for combination switch + gG fuse / maximum • at 440 V / for combination switch + gG fuse / maximum	No No 2 4 0 3 4 8 mm 10 kA 6 kA 3.5 kA 3.5 kA
product feature / can be locked into OFF position accessories product extension / optional • motor drive • voltage trigger number of connectable NC contacts / for auxiliary contacts / attachable / maximum number of connectable NO contacts / for auxiliary contacts / attachable / maximum number of connectable CO contacts / for auxiliary contacts / attachable / maximum number of bracket locks / maximum number of bracket locks / maximum hasp thickness / of the bracket locks Short circuit conditional short-circuit current / with line-side fuse protection • at 440 V / by gG fuse / rated value let-through current / with closed switch • at 240 V / for combination switch + gG fuse / maximum • at 440 V / for combination switch + gG fuse / maximum • at 690 V / for combination switch + gG fuse / maximum permissible	No No 2 4 0 3 4 8 mm 10 kA 6 kA 3.5 kA 3.5 kA

maximum	4 14 4 0 0		
 at 440 V / for combination switch + gG fuse / maximum 	4 kA2.s		
• at 690 V / for combination switch + gG fuse /	4 kA2.s		
maximum			
design of the fuse link			
 for short-circuit protection of the main circuit / 	fuse gL/gG: 25 A		
required			
 for short-circuit protection of the auxiliary switch / required 	fuse gL/gG: 10 A		
operational current / of upstream fuse / rated value	25 A		
according UL			
operational current / at AC / according to UL 508/UL	25 A		
60947-4-1 / rated value			
operating voltage / at AC / at 50/60 Hz / according to UL 508/UL 60947-4-1 / rated value	600 V		
active power [hp] / at AC / at 480 V / according to UL 508/UL 60947-4-1 / rated value	10		
active power [hp] / at AC / at 600 V / according to UL 508/UL 60947-4-1 / rated value	15		
short-time withstand current (SCCR) / at 600 V / according to UL 508/UL 60947-4-1	5 kA		
continuous current / of upstream fuse / according to UL /	50 A		
rated value	DIVE		
type of fuse / according to UL Connections	RK5		
AWG number / as coded connectable conductor cross			
section / solid			
• maximum	6		
• minimum	14		
type of connectable conductor cross-sections / for copper			
conductor			
• solid	1x (2.5 to 16 mm²)		
finely stranded / with core end processing	1x (2.516 mm²)		
• stranded	1x (2.5 to 16 mm²)		
type of connectable conductor cross-sections / for auxiliary contacts			
• solid	2x (0.75 2.5 mm²), 1x 4 mm²		
 finely stranded / with core end processing 	2x (0.75 1.5 mm²), 1x 2.5 mm²		
• stranded	2x (0.75 2.5 mm²), 1x 4 mm²		
type of electrical connection			
for main current circuit	box terminal		
 for auxiliary contacts 	Box terminals		
Mechanical Design			
height	60 mm		
width	49 mm		
depth	380 mm		
type of device	fixed mounting		
fastening method	Built-in unit fixed-mounted version		
fastening method			
4-hole front mounting	No		
front mounting with central attachment	Yes		
• rail mounting		Yes	
net weight	300 g		
Environmental conditions			
ambient temperature / during operation	25 °C		
minimum maximum	-25 °C 55 °C		
maximum ambient temperature / during storage	33 C		
minimum	-25 °C		
• maximum	55 °C		
General Product Approval		Declaration of Conformity	
Constant Todast Approval		200 million of Comorning	











other

Miscellaneous

Further information

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=3LD3148-0TL51

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

https://support.industry.siemens.com/cs/ww/en/ps/3LD3148-0TL51

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

http://www.automation.siemens.com/bilddb/cax_en.aspx?mlfb=3LD3148-0TL51

CAx-Online-Generator

http://www.siemens.com/cax

Tender specifications

http://www.siemens.com/specifications









