## **SIEMENS**

Data sheet 3LD2514-0TK51



SENTRON, Switch disconnector 3LD, main switch, 3-pole, lu: 63 A, Operating power / at AC-23 A at 400 V: 22 kW, floor mounting with door coupling, rotary operating mechanism, black, 4-hole mounting of the handle

Model	
product brand name	SENTRON
product designation	3LD Switch disconnector
design of the product	Main switch
display version for switch position indicator manual	1 ON - 0 OFF
operation	
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	3
size of switch disconnector	3
mechanical service life (operating cycles) typical	100 000
electrical endurance (operating 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	4.5 W
Current	
operational current rated value	63 A
operational current	
<ul> <li>at 40 °C rated value</li> </ul>	63 A
<ul> <li>at 45 °C rated value</li> </ul>	63 A
<ul> <li>at 50 °C rated value</li> </ul>	63 A
<ul> <li>at 55 °C rated value</li> </ul>	63 A

<ul> <li>at AC rated value</li> </ul>	63 A
Main circuit	
operational current	
at AC-21 at 690 V rated value	63 A
• at AC-21 A at 240 V rated value	63 A
• at AC-21 A at 400 V rated value	63 A
<ul> <li>at AC-21 A at 440 V rated value</li> </ul>	63 A
<ul> <li>at AC-23 A at 400 V rated value</li> </ul>	43 A
operating power	
<ul><li>at AC-23 A at 240 V rated value</li></ul>	11 kW
<ul><li>at AC-23 A at 400 V rated value</li></ul>	22 kW
<ul><li>at AC-23 A at 440 V rated value</li></ul>	22 kW
<ul><li>at AC-23 A at 690 V rated value</li></ul>	19 kW
• at AC-3 at 240 V rated value	11 kW
• at AC-3 at 400 V rated value	19 kW
at AC-3 at 690 V rated value	15 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  • main switch	Yes
switch disconnector	Yes
EMERGENCY OFF switch	No
safety switch	Yes
maintenance/repair switch	Yes
Product details	
product feature can be locked into OFF position	Yes
accessories	165
product extension optional	No
product extension optional  • motor drive	No No
product extension optional  motor drive  voltage trigger	No
product extension optional  • motor drive	
product extension optional	No
product extension optional	No 3 5
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	No 3
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	No 3 5 0
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 3 5 0 3
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 hasp thickness of the bracket locks	No 3 5 0
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 hasp thickness of the bracket locks  Short circuit	No 3 5 0 3
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 hasp thickness of the bracket locks	No 3 5 0 3
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 hasp thickness of the bracket locks  Short circuit conditional short-circuit current with line-side fuse	No 3 5 0 3
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 hasp thickness of the bracket locks  Short circuit conditional short-circuit current with line-side fuse protection	No 3 5 0 3 4 8 mm
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 hasp thickness of the bracket locks  Short circuit  conditional short-circuit current with line-side fuse protection  • at 690 V by gG fuse rated value	No 3 5 0 3 4 8 mm
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 690 V by gG fuse rated value let-through current with closed switch	No 3 5 0 3 4 8 mm
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 690 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	No 3 5 0 0 3 4 8 mm 50 kA 6 kA
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 690 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 3 5 5 0 3 4 8 mm 50 kA 6 kA 6 kA
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 hasp thickness of the bracket locks  Short circuit  conditional short-circuit current with line-side fuse protection  • at 690 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  12t value with closed switch	No 3 5 0 3 4 8 mm  50 kA 6 kA 6 kA 6 kA
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 hasp thickness of the bracket locks  Short circuit  conditional short-circuit current with line-side fuse protection  • at 690 V by gG fuse rated value let-through current with closed switch  • at 240 V for combination switch + gG fuse maximum • at 690 V for combination switch + gG fuse maximum permissible  12t value with closed switch  • at 240 V for combination switch + gG fuse maximum	No 3 5 0 3 4 8 mm  50 kA 6 kA 6 kA 6 kA 6 kA
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 690 V by gG fuse rated value let-through current with closed switch  • at 240 V for combination switch + gG fuse maximum • at 690 V for combination switch + gG fuse maximum permissible  12t value with closed switch  • at 240 V for combination switch + gG fuse maximum • at 440 V for combination switch + gG fuse maximum • at 440 V for combination switch + gG fuse maximum	No 3 5 0 3 4 8 mm  50 kA 6 kA 6 kA 6 kA 21 kA2.s 21 kA2.s
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 690 V by gG fuse rated value  let-through current with closed switch  • at 240 V for combination switch + gG fuse maximum  • at 690 V for combination switch + gG fuse maximum permissible  l2t value with closed switch  • at 240 V for combination switch + gG fuse maximum  • at 440 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	No 3 5 0 3 4 8 mm  50 kA 6 kA 6 kA 6 kA 6 kA
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 690 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 permissible  I2t value 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  • at 690 V for combination switch + gG fuse maximum	No 3 5 0 3 4 8 mm  50 kA 6 kA 6 kA 6 kA 21 kA2.s 21 kA2.s 21 kA2.s
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 690 V by gG fuse rated value  let-through current with closed switch  • at 240 V for combination switch + gG fuse maximum  • at 690 V for combination switch + gG fuse maximum permissible  l2t value with closed switch  • at 240 V for combination switch + gG fuse maximum  • at 440 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	No 3 5 0 3 4 8 mm  50 kA 6 kA 6 kA 6 kA 6 kA 121 kA2.s 21 kA2.s
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 690 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 permissible  I2t value 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  • at 690 V for combination switch + gG fuse maximum  • at 690 V for combination switch + gG fuse maximum  • at 690 V for combination switch + gG fuse maximum  • at 690 V for combination switch + gG fuse maximum  • at 690 V for combination switch + gG fuse maximum  • at 690 V for combination switch + gG fuse maximum  • at 690 V for combination switch + gG fuse maximum	No 3 5 0 3 4 8 mm  50 kA 6 kA 6 kA 6 kA 21 kA2.s 21 kA2.s 21 kA2.s
product extension optional	No 3 5 0 3 4 8 mm  50 kA 6 kA 6 kA 6 kA 6 kA 21 kA2.s 21 kA2.s 21 kA2.s fuse gL/gG: 63 A fuse gL/gG: 10 A
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 690 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  permissible  12t value with closed switch  • at 240 V for combination switch + gG fuse maximum  • at 690 V for combination switch + gG fuse maximum  • at 690 V for combination switch + gG fuse maximum  • at 690 V for combination switch + gG fuse maximum  • at 690 V for combination switch + gG fuse maximum  • at 690 V for combination switch + gG fuse maximum  • at 690 V for combination switch + gG fuse maximum  • at 690 V for combination switch + gG fuse maximum  • at 690 V for combination switch + gG fuse maximum  • at 690 V for combination switch + gG fuse maximum  • at 690 V for combination switch + gG fuse maximum  • at 690 V for combination switch + gG fuse maximum  • at 690 V for combination switch + gG fuse maximum  • at 690 V for combination switch + gG fuse maximum  • at 690 V for combination switch + gG fuse maximum	No 3 5 0 3 4 8 mm  50 kA 6 kA 6 kA 6 kA 21 kA2.s 21 kA2.s 21 kA2.s 1 kA2.s

according UL	
operational current at AC according to UL 508/UL 60947-	63 A
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	40
active power [hp] at AC at 600 V according to UL 508/UL 60947-4-1 rated value	50
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 rated value	175 A
type of fuse according to UL	RK5
Connections	
AWG number as coded connectable conductor cross section solid	
• maximum	6
• minimum	14
type of connectable conductor cross-sections for copper conductor	
• solid	1x (2,535mm²)
<ul> <li>finely stranded with core end processing</li> </ul>	1x (2.516 mm²)
<ul><li>stranded</li></ul>	1x (2,535mm²)
type of connectable conductor cross-sections for auxiliary contacts	
• solid	lateral auxiliary switch 2x (0,75 2,5mm²), 1x 4mm²; front auxiliary switch 1x (0,75 2,5mm²)
<ul> <li>finely stranded with core end processing</li> </ul>	lateral auxiliary switch 2x (0,75 1,5mm²), 1x 2,5mm²; front auxiliary switch 1x 2,5mm²
• stranded	lateral auxiliary switch 2x (0,75 2,5mm²), 1x 4mm²; front auxiliary switch 1x (0,75 2,5mm²)
type of electrical connection	
<ul> <li>for main current circuit</li> </ul>	box terminal
<ul> <li>for auxiliary contacts</li> </ul>	connection terminals
Mechanical Design	
height	106 mm
width	90 mm
depth	468.5 mm
type of device	fixed mounting
fastening method	Built-in unit fixed-mounted version
fastening method	
<ul> <li>4-hole front mounting</li> </ul>	Yes
<ul> <li>front mounting with central attachment</li> </ul>	No
<ul><li>rail mounting</li></ul>	Yes
net weight	624 g
Environmental conditions	
ambient temperature during operation	
• minimum	-25 °C
• maximum	55 °C
ambient temperature during storage	05.00
• minimum	-25 °C
• maximum	55 °C
General Product Approval	



Confirmation







**Miscellaneous** 

General Product Approval  Declaration of Conformity Test Certificates Marine / Shipping	
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Special Test Certificate





other

Environmental Confirmations

**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=3LD2514-0TK51

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

https://support.industry.siemens.com/cs/ww/en/ps/3LD2514-0TK51

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

http://www.automation.siemens.com/bilddb/cax\_en.aspx?mlfb=3LD2514-0TK51

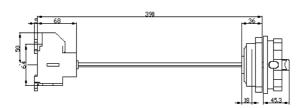
**CAx-Online-Generator** 

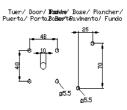
http://www.siemens.com/cax

**Tender specifications** 

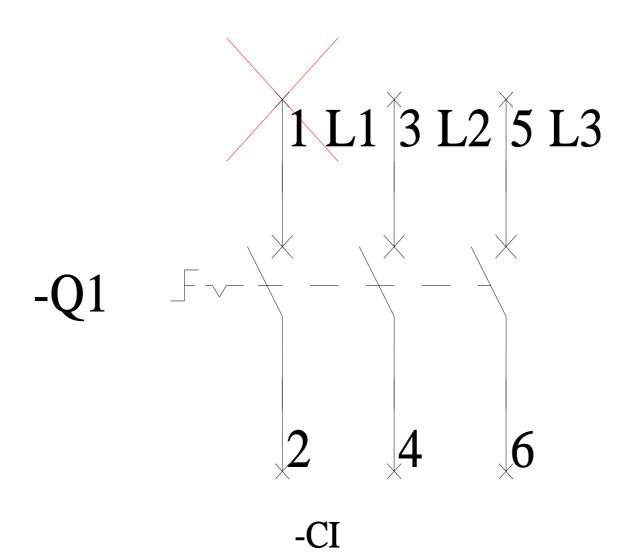
http://www.siemens.com/specifications

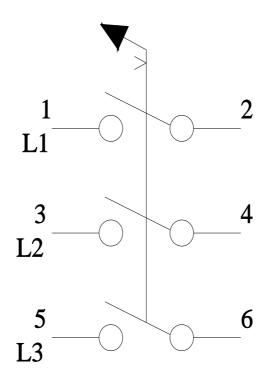












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