Data sheet

3SE5242-0HC05-1CA0



position switch with increased corrosion protection plastic enclosure 50 mm, device connection 2 x (M20 x 1.5) 1 NO/1 NC integrated (not replaceable) quick-action contacts, rounded plunger

product function positive opening	product brand name	SIRIUS
suitability for use safety switch General technical data product function positive opening insulation voltage rated value degree of pollution class 3 surge voltage resistance rated value according to IEC 60068-2-27 30g / 11 ms vibration resistance according to IEC 61068-2-2 30g / 11 ms vibration resistance according to IEC 61068-2-2 30g / 11 ms vibration resistance according to IEC 61068-2-2 30g / 11 ms vibration resistance according to IEC 61068-2-2 30g / 11 ms vibration resistance according to IEC 61068-2-2 30g / 11 ms vibration resistance according to IEC 61068-2-2 30g / 11 ms vibration resistance according to IEC 61068-2-2 30g / 11 ms vibration resistance according to IEC 61068-2-2 30g / 11 ms vibration resistance accor	product designation	Mechanical position switches
product function positive opening Yes Insulation voltage rated value 400 V degree of pollution class 3 surge voltage resistance rated value 6 kV protection class IP IP66/IP67 shock resistance	product type designation	3SE5
product function positive opening Yes Insulation voltage rated value 400 V degree of pollution class 3 surge voltage resistance rated value 6kV protection class IP IP66/IP67 shock resistance a cacording to IEC 60068-2-27 30g / 11 ms vibration resistance a cacording to IEC 60068-2-27 30g / 11 ms vibration resistance a cacording to IEC 60068-2-6 0.35 mm/5g mechanical service IIfe (operating cycles) typical 15000 000 electrical endurance (operating cycles) at AC-15 at 230 V typical 15000 000 electrical endurance (operating cycles) at AC-15 at 230 V typical 15000 000 electrical endurance (operating cycles) at AC-15 at 230 V typical 25000 000 electrical endurance (operating cycles) at AC-15 at 230 V typical 25000 000 electrical endurance (operating cycles) at AC-15 at 230 V typical 25000 000 electrical endurance (operating cycles) at AC-15 at 230 V typical 25000 000 electrical endurance (operating cycles) at AC-15 at 230 V typical 25000 000 electrical endurance (operating cycles) at AC-15 at 230 V typical 25000 000 electrical endurance (operating cycles) at AC-15 at 230 V typical 25000 000 electrical endurance (operating cycles) at AC-15 at 230 V typical 25000 000 electrical endurance (operating cycles) at AC-15 at 230 V to AC-15 at 230 V typical 25000 000 electrical endurance (operating cycles) at AC-15 at 230 V to AC-15 at 230 V typical 25000 000 electrical endurance (operation 25000 000 000	suitability for use safety switch	Yes
Insulation voltage rated value degree of pollution class 3 surge voltage resistance rated value • according to IEC 60068-2-27 shock resistance • according to IEC 60068-2-27 vibration resistance • according to IEC 60068-2-6 mechanical service life (operating cycles) typical electrical endurance (operating cycles) at AC-15 at 230 V typical electrical endurance (operating cycles) at AC-15 at 230 V typical thermal current 10 A material of the enclosure of the switch head reference code according to IEC 81346-2 B continuous current of the C characteristic MCB continuous current of the quick DIAZED fuse link 10 A; for a short-circuit current smaller than 400 A continuous current of the DIAZED fuse link gG active principle mechanical repeat accuracy 0.05 mm Substance Prohibitance (Date) SVHC substance name Imidazolidine-2-thione (2-imidazoline-2-thiol) - 96-45-7 Weight noinnum actuating force in directions of actuation ength of the sensor width of the sensor so mm Anbient temperature during storage explosion protection category for dust none mechanical operating frequency rated value 50 60 Hz	General technical data	
degree of pollution class 3 surge voltage resistance rated value 6 kV protection class IP IP66/IP67 shock resistance	product function positive opening	Yes
surge voltage resistance rated value IP66/IP67 IP66/IP67 shock resistance according to IEC 60068-2-7 30g / 11 ms vibration resistance according to IEC 60068-2-6 0.35 mm/5g mechanical service life (operating cycles) typical 15 000 000 electrical endurance (operating cycles) at AC-15 at 230 V typical 100 000 thermal current 10 A material of the enclosure of the switch head plastic reference code according to IEC 81346-2 B continuous current of the C characteristic MCB 1 A; for a short-circuit current smaller than 400 A continuous current of the plaZED fuse link 10 A; for a short-circuit current smaller than 400 A continuous current of the plaZED fuse link 10 A; for a short-circuit current smaller than 400 A continuous current of the plaZED fuse link 10 A; for a short-circuit current smaller than 400 A continuous current of the plaZED fuse link 10 A; for a short-circuit current smaller than 400 A continuous current of the plaZED fuse link 10 A; for a short-circuit current smaller than 400 A continuous current of the plaZED fuse link 10 A; for a short-circuit current smaller than 400 A continuous current of the plaZED fuse link 10 A; for a short-circuit current smaller than 400 A continuous current of the plaZED fuse link 10 A; for a short-circuit current smaller than 400 A continuous current of the plaZED fuse link 10 A; for a short-circuit current smaller than 400 A continuous current of the plaZED fuse link 10 A; for a short-circuit current smaller than 400 A continuous current of the plaZED fuse link 10 A; for a short-circuit current smaller than 400 A continuous current of the plaZED fuse link 10 A; for a short-circuit current smaller than 400 A continuous current of the plaZED fuse link 10 A; for a short-circuit current smaller than 400 A continuous current of the plaZED fuse link 10 A; for a short-circuit current smaller than 400 A continuous current of the plaZED fuse link 10 A; for a short-circuit current sm	insulation voltage rated value	400 V
protection class IP shock resistance • according to IEC 60068-2-27 vibration resistance • according to IEC 60068-2-6	degree of pollution	class 3
shock resistance a according to IEC 60068-2-27 vibration resistance according to IEC 60068-2-6 Decenting to IEC 60068-2 Decenting to IEC 60068-2 Decenting to IEC 60068-2 Decenting to	surge voltage resistance rated value	6 kV
according to IEC 60068-2-27 vibration resistance according to IEC 60068-2-6 0.35 mm/5g mechanical service life (operating cycles) typical electrical endurance (operating cycles) at AC-15 at 230 V typical thermal current 10 A material of the enclosure of the switch head plastic reference code according to IEC 81346-2 B continuous current of the C characteristic MCB 11 A; for a short-circuit current smaller than 400 A continuous current of the quick DIAZED fuse link 10 A; for a short-circuit current smaller than 400 A continuous current of the DIAZED fuse link 10 A; for a short-circuit current smaller than 400 A continuous current of the DIAZED fuse link gG 6 A active principle mechanical repeat accuracy 0.05 mm Substance Prohibitance (Date) 7/01/2006 SVHC substance name Imidiazolidine-2-thione (2-imidazoline-2-thiol) - 96-45-7 Weight 0.092 kg minimum actuating force in directions of actuation 20 N length of the sensor 60.7 mm width of the sensor 60.7 mm width of the sensor 60.7 mm width of the sensor 6 b om Ambient conditions ambient temperature 6 during operation 7 C - 25 +85 °C 7 during storage 7 during storage 8 cyplosion protection category for dust 8 mechanical 6 one explosion protection category for dust 8 mechanical 6 one 8 cyplosion protection category for dust 8 mechanical 6 operating frequency rated value 5 0 60 Hz	protection class IP	IP66/IP67
vibration resistance	shock resistance	
* according to IEC 60068-2-6 mechanical service life (operating cycles) typical electrical endurance (operating cycles) at AC-15 at 230 V typical thermal current 10 A material of the enclosure of the switch head reference code according to IEC 81346-2 B continuous current of the C characteristic MCB 1 A; for a short-circuit current smaller than 400 A continuous current of the Quick DIAZED fuse link continuous current of the DIAZED fuse link G active principle repeat accuracy 0.05 mm Substance Prohibitance (Date) SVHC substance name Imidazolidine-2-thione (2-imidazoline-2-thiol) - 96-45-7 Weight 0.092 kg minimum actuating force in directions of actuation length of the sensor ### Aphient conditions ambient temperature • during operation • during storage explosion protection category for dust ### design of the switching contact mechanical mechanical poerating frequency rated value 50 60 Hz	• according to IEC 60068-2-27	30g / 11 ms
mechanical service life (operating cycles) typical electrical endurance (operating cycles) at AC-15 at 230 V typical 100 000 10	vibration resistance	
electrical endurance (operating cycles) at AC-15 at 230 V typical thermal current material of the enclosure of the switch head plastic reference code according to IEC 81346-2 B continuous current of the C characteristic MCB 1 A; for a short-circuit current smaller than 400 A continuous current of the quick DIAZED fuse link 10 A; for a short-circuit current smaller than 400 A continuous current of the DIAZED fuse link 0 A; for a short-circuit current smaller than 400 A continuous current of the DIAZED fuse link gG 6 A active principle mechanical repeat accuracy 0.05 mm Substance Prohibitance (Date) 07/01/2006 SVHC substance name Imidazolidine-2-thione (2-imidazoline-2-thiol) - 96-45-7 Weight 0.092 kg minimum actuating force in directions of actuation 20 N length of the sensor 60.7 mm width of the sensor 50 mm Ambient conditions ambient temperature • during operation • during storage • 40 +90 °C explosion protection category for dust mone Main circuit design of the switching contact mechanical operating frequency rated value 50 60 Hz	• according to IEC 60068-2-6	0.35 mm/5g
thermal current 10 A material of the enclosure of the switch head plastic reference code according to IEC 81346-2 continuous current of the C characteristic MCB 1A; for a short-circuit current smaller than 400 A continuous current of the quick DIAZED fuse link 10 A; for a short-circuit current smaller than 400 A continuous current of the DIAZED fuse link gG 6 A active principle mechanical repeat accuracy 0.05 mm Substance Prohibitance (Date) 07/01/2006 SVHC substance name Imidazolidine-2-thione (2-imidazoline-2-thiol) - 96-45-7 Weight 0.092 kg minimum actuating force in directions of actuation 20 N length of the sensor 60.7 mm width of the sensor 50 mm Ambient conditions ambient temperature • during operation -25 +85 °C • during storage -40 +90 °C explosion protection category for dust mechanical operating frequency rated value 50 60 Hz	mechanical service life (operating cycles) typical	15 000 000
material of the enclosure of the switch head reference code according to IEC 81346-2 B continuous current of the C characteristic MCB 1 A; for a short-circuit current smaller than 400 A continuous current of the quick DIAZED fuse link 10 A; for a short-circuit current smaller than 400 A continuous current of the DIAZED fuse link 6 A active principle repeat accuracy 0.05 mm Substance Prohibitance (Date) 5VHC substance name Imidazolidine-2-thione (2-imidazoline-2-thiol) - 96-45-7 Weight 0.092 kg minimum actuating force in directions of actuation 20 N length of the sensor 60.7 mm width of the sensor 60.7 mm width of the sensor 4 during operation - 25 +85 °C - during storage 4-40 +90 °C explosion protection category for dust mechanical operating frequency rated value 50 60 Hz		100 000
reference code according to IEC 81346-2 continuous current of the C characteristic MCB continuous current of the quick DIAZED fuse link continuous current of the quick DIAZED fuse link continuous current of the DIAZED fuse link gG active principle repeat accuracy 0.05 mm Substance Prohibitance (Date) SVHC substance name Imidazolidine-2-thione (2-imidazoline-2-thiol) - 96-45-7 Weight 0.092 kg minimum actuating force in directions of actuation length of the sensor width of the sensor ### Main circuit design of the switching contact operating frequency rated value #### B 1 A; for a short-circuit current smaller than 400 A 1 A; for a short-cir	thermal current	10 A
continuous current of the C characteristic MCB 1 A; for a short-circuit current smaller than 400 A continuous current of the quick DIAZED fuse link 10 A; for a short-circuit current smaller than 400 A continuous current of the DIAZED fuse link gG 6 A active principle mechanical repeat accuracy 0.05 mm Substance Prohibitance (Date) SYHC substance name Imidazolidine-2-thione (2-imidazoline-2-thiol) - 96-45-7 Weight 0.092 kg minimum actuating force in directions of actuation length of the sensor 60.7 mm width of the sensor ### Mobient conditions ambient temperature • during operation • during storage -40 +90 °C explosion protection category for dust mechanical operating frequency rated value 50 60 Hz	material of the enclosure of the switch head	plastic
continuous current of the quick DIAZED fuse link continuous current of the DIAZED fuse link gG active principle mechanical repeat accuracy 0.05 mm Substance Prohibitance (Date) 07/01/2006 SVHC substance name Imidazolidine-2-thione (2-imidazoline-2-thiol) - 96-45-7 Weight 0.092 kg minimum actuating force in directions of actuation length of the sensor 60.7 mm width of the sensor 40 during operation 40 during operation 40 during storage 40 +90 °C explosion protection category for dust explosion protection category rated value 0 during frequency rated value 10 A; for a short-circuit current smaller than 400 A 6 A 6 A 6 A 6 A 6 A 6 A 6 A 6 A 6 A 6	reference code according to IEC 81346-2	В
continuous current of the DIAZED fuse link gG active principle mechanical repeat accuracy 0.05 mm Substance Prohibitance (Date) 07/01/2006 SVHC substance name Imidazolidine-2-thione (2-imidazoline-2-thiol) - 96-45-7 Weight 0.092 kg minimum actuating force in directions of actuation 20 N length of the sensor 60.7 mm width of the sensor 50 mm Ambient conditions ambient temperature	continuous current of the C characteristic MCB	1 A; for a short-circuit current smaller than 400 A
active principle mechanical repeat accuracy 0.05 mm Substance Prohibitance (Date) 07/01/2006 SVHC substance name Imidazolidine-2-thione (2-imidazoline-2-thiol) - 96-45-7 Weight 0.092 kg minimum actuating force in directions of actuation 20 N length of the sensor 60.7 mm width of the sensor 50 mm Ambient conditions ambient temperature	continuous current of the quick DIAZED fuse link	10 A; for a short-circuit current smaller than 400 A
repeat accuracy Substance Prohibitance (Date) SVHC substance name Imidazolidine-2-thione (2-imidazoline-2-thiol) - 96-45-7 Weight 0.092 kg minimum actuating force in directions of actuation 20 N length of the sensor 60.7 mm width of the sensor 50 mm Ambient conditions ambient temperature • during operation • during storage 40 +90 °C explosion protection category for dust mechanical operating frequency rated value 50 60 Hz	continuous current of the DIAZED fuse link gG	6 A
Substance Prohibitance (Date) SVHC substance name Imidazolidine-2-thione (2-imidazoline-2-thiol) - 96-45-7 Weight 0.092 kg minimum actuating force in directions of actuation 20 N length of the sensor 60.7 mm width of the sensor 50 mm Ambient conditions ambient temperature • during operation • during storage • during storage explosion protection category for dust mone Main circuit design of the switching contact operating frequency rated value 0 07/01/2006 1 midazolidine-2-thione (2-imidazoline-2-thiol) - 96-45-7 0 0.092 kg 0 N 1 0.092 kg 1 0.09	active principle	mechanical
SVHC substance name Imidazolidine-2-thione (2-imidazoline-2-thiol) - 96-45-7 Weight	repeat accuracy	0.05 mm
Weight 0.092 kg minimum actuating force in directions of actuation 20 N length of the sensor 60.7 mm width of the sensor 50 mm Ambient conditions ambient temperature	Substance Prohibitance (Date)	07/01/2006
minimum actuating force in directions of actuation length of the sensor width of the sensor Ambient conditions ambient temperature oduring operation during storage explosion protection category for dust mone Main circuit design of the switching contact operating frequency rated value 20 N 60.7 mm 60.7 m	SVHC substance name	Imidazolidine-2-thione (2-imidazoline-2-thiol) - 96-45-7
length of the sensor 60.7 mm width of the sensor 50 mm Ambient conditions ambient temperature • during operation -25 +85 °C • during storage -40 +90 °C explosion protection category for dust none Main circuit design of the switching contact mechanical operating frequency rated value 50 60 Hz	Weight	0.092 kg
width of the sensor Ambient conditions ambient temperature • during operation • during storage • during storage explosion protection category for dust mone Main circuit design of the switching contact operating frequency rated value 50 60 Hz	minimum actuating force in directions of actuation	20 N
Ambient conditions ambient temperature • during operation • during storage • during storage • and the series of the switching contact operating frequency rated value -25 +85 °C -40 +90 °C resplosion protection category for dust none mechanical operating frequency rated value 50 60 Hz	length of the sensor	60.7 mm
ambient temperature • during operation • during storage • during storage • 40 +90 °C explosion protection category for dust none Main circuit design of the switching contact operating frequency rated value 50 60 Hz	width of the sensor	50 mm
 during operation during storage 40 +90 °C explosion protection category for dust mone Main circuit design of the switching contact mechanical operating frequency rated value 50 60 Hz 	Ambient conditions	
during storage -40 +90 °C explosion protection category for dust Main circuit design of the switching contact operating frequency rated value -40 +90 °C none mechanical 50 60 Hz	ambient temperature	
explosion protection category for dust Main circuit design of the switching contact mechanical operating frequency rated value 50 60 Hz	 during operation 	-25 +85 °C
design of the switching contact mechanical operating frequency rated value 50 60 Hz	during storage	-40 +90 °C
design of the switching contact mechanical operating frequency rated value 50 60 Hz	explosion protection category for dust	none
operating frequency rated value 50 60 Hz	Main circuit	
	design of the switching contact	mechanical
number of NC contacts for auxiliary contacts	operating frequency rated value	50 60 Hz
	number of NC contacts for auxiliary contacts	1

design of the interface Approvals Certificates	without
Communication/ Protocol	
design of the interface for safety-related communication	without
for AWG cables stranded	1x (20 16), 2x (20 18)
 for AWG cables solid 	1x (20 16), 2x (20 18)
 finely stranded with core end processing 	1x (0.5 1.5 mm²), 2x (0.5 0.75 mm²)
• solid	1x (0.5 1.5 mm²), 2x (0.5 0.75 mm²)
type of connectable conductor cross-sections	
type of electrical connection	screw terminal
Connections/ Terminals	
fastening method	screw fixing
mounting position	any
Installation/ mounting/ dimensions	
cable entry type	2x (M20 x 1.5)
number of switching contacts safety-related	1
circuit principle	snap-action contacts
design of the switching function	positive opening, integrated
shape of the switch head	rounded
standard-compliant actuator head	EN 50047, design B
design of the actuating element	Rounded plunger, plastic plunger
Drive Head	
design of the housing according to standard	No
coating of the enclosure	Other types
material of the enclosure	plastic
design of the housing	block, wide
Enclosure	
• at 400 V rated value	0.12 A
at 250 V rated value	0.27 A
at 125 V rated value	0.55 A
at 24 V rated value	3 A
operational current at DC-13	
at 400 V rated value	4 A
at 240 V rated value	6 A
at 120 V rated value	6 A
at 24 V rated value	6 A
operational current at AC-15	
number of NO contacts for auxiliary contacts	1

General Product Approval

Test Certificates











Type Test Certificates/Test Report

Test Certificates

other

Environment

Type Test Certificates/Test Report



Confirmation

Environmental Confirmations

Further information

Information on the packaging

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

Information for data generation and storage

https://support.industry.siemens.com/cs/ww/en/view/109995012

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

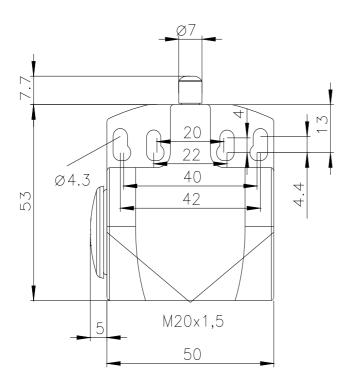
https://www.siemens.com/ic10

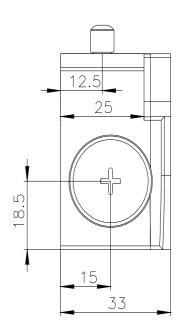
Industry Mall (Online ordering system)

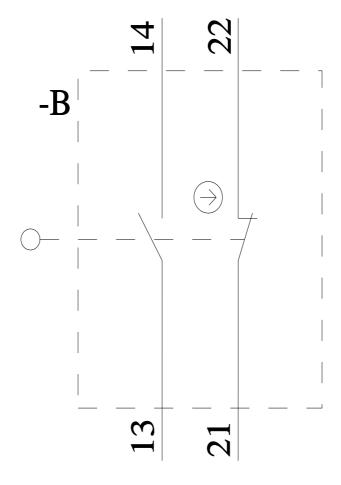
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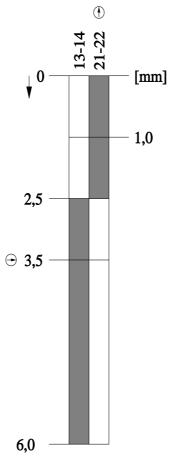
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