# SIEMENS

## Data sheet

# 3UG4511-1BN20



ANALOG MONITORING RELAY PHASE SEQUENCE MONITORING 3X 160 TO 260V AC 50 TO 60 HZ 2 CHANGEOVER CONTACTS SCREW TERMINAL REPLACEMENT PRODUCT FOR 3UG3511-1BQ50

### Figure similar

Product function	_	Phase monitoring relay
Measuring circuit:		
Type of voltage for monitoring		AC
Number of poles for main current circuit		3
Measurable voltage at AC	V	160 260
General technical data:		
Display version LED		Yes
Product function		
<ul> <li>undervoltage detection</li> </ul>		No
<ul> <li>Overvoltage detection</li> </ul>		No
<ul> <li>phase sequence recognition</li> </ul>		Yes
<ul> <li>Phase failure detection</li> </ul>		No
Phase unbalance		No
<ul> <li>Overvoltage detection 3 phase</li> </ul>		No
<ul> <li>undervoltage detection 3 phases</li> </ul>		No
<ul> <li>Voltage window recognition 3 phase</li> </ul>		No
Auto-reset		Yes

Adjustable open/closed-circuit current principle		No
Starting time after the control supply voltage has	ms	200
been applied		
Response time maximum	ms	450
Type of voltage of the control supply voltage		AC
Control supply voltage		
• at AC		
— at 50 Hz rated value	V	160 260
— at 60 Hz rated value	V	160 260
Operating range factor control supply voltage rated value		
● at AC		
— at 50 Hz		1 1
— at 60 Hz		1 1
Surge voltage resistance rated value	kV	6
Consumed active power	W	2
Protection class IP		IP20
Electromagnetic compatibility		IEC 60947-1 / IEC 61000-6-2 / IEC 61000-6-4
Vibration resistance acc. to IEC 60068-2-6		1 6 Hz: 15 mm, 6 500 Hz: 2g
Shock resistance acc. to IEC 60068-2-27		sinusoidal half-wave 15g / 11 ms
Installation altitude at height above sea level maximum	m	2 000
Conducted interference due to burst acc. to IEC 61000-4-4		2 kV
Conducted interference due to conductor-earth surge acc. to IEC 61000-4-5		2 kV
Conducted interference due to conductor-conductor surge acc. to IEC 61000-4-5		1 kV
Electrostatic discharge acc. to IEC 61000-4-2		6 kV contact discharge / 8 kV air discharge
Field-bound parasitic coupling acc. to IEC 61000-4-3		10 V/m
Insulation voltage for overvoltage category III according to IEC 60664 with degree of pollution 3 rated value	V	690
Degree of pollution		3
Ambient temperature		
<ul> <li>during operation</li> </ul>	°C	-25 +60
• during storage	°C	-40 +85
• during transport	°C	-40 +85
Galvanic isolation		
<ul> <li>between entrance and outlet</li> </ul>		Yes
• between the outputs		Yes
<ul> <li>between the voltage supply and other circuits</li> </ul>		Yes
Mechanical data:		

Width	mm	22.5
Height	mm	92
Depth	mm	91
Mounting position		any
Required spacing for grounded parts		
• forwards	mm	0
Backwards	mm	0
• at the side	mm	0
• upwards	mm	0
• downwards	mm	0
Required spacing with side-by-side mounting	-	•
forwards	mm	0
Backwards	mm	0
• at the side	mm	0
• upwards	mm	
• downwards	mm	0
Required spacing for live parts		2
• forwards	mm	0
Backwards	mm	0
• at the side	mm	0
• upwards	mm	0
downwards	mm	0
Mounting type		snap-on mounting
Product function removable terminal for auxiliary and control circuit		Yes
Type of electrical connection		screw-type terminals
Type of connectable conductor cross-sections		
• solid		1x (0.5 4 mm2), 2x (0.5 2.5 mm2)
<ul> <li>finely stranded</li> </ul>		
— with core end processing		1x (0.5 2.5 mm2), 2x (0.5 1.5 mm2)
<ul> <li>at AWG conductors</li> </ul>		
— solid		2x (20 14)
— stranded		2x (20 14)
Tightening torque with screw-type terminals	N∙m	0.8 1.2
Outputs:		
Number of NO contacts delayed switching		0
Number of NC contacts delayed switching		0
Number of CO contacts delayed switching		2
Ampacity of the output relay		
• at AC-15		
— at 250 V at 50/60 Hz	А	3
— at 400 V at 50/60 Hz	А	3

• at DC-13		
— at 24 V	А	1
— at 125 V	А	0.2
— at 250 V	А	0.1
Thermal current of the switching element with contacts maximum	A	5
Operating current at 17 V minimum	mA	5
Continuous current of the DIAZED fuse link of the output relay	A	4
Mechanical service life (switching cycles) typical		10 000 000
Electrical endurance (switching cycles) at AC-15 at 230 V typical		100 000
Operating frequency with 3RT2 contactor maximum	1/h	5 000

# Certificates/ approvals:

General Prod	uct Approval		EMC	Declaration of	Test
				Conformity	Certificates
		EHC	C-Tick	EG-Konf.	Type Test Certificates/Test Report

Test Certificates	Shipping Approval	other	Railway
Special Test Certificate	Lloyd's Register	Confirmation	Vibration and Shock
	LRS		

### Further information

Information- and Downloadcenter (Catalogs, Brochures,...) http://www.siemens.com/industrial-controls/catalogs

### Industry Mall (Online ordering system)

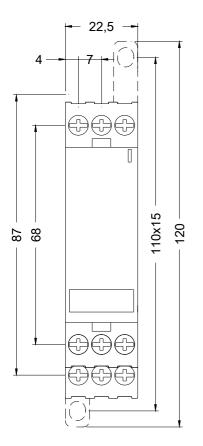
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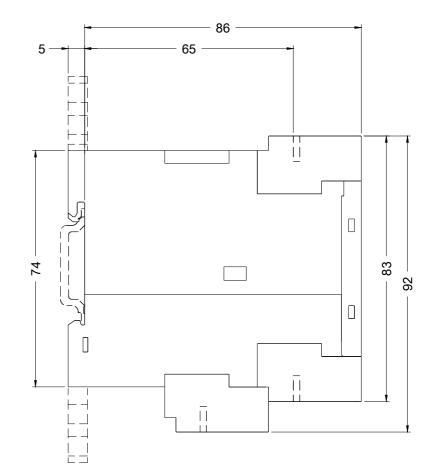
#### Cax online generator

http://support.automation.siemens.com/WW/CAXorder/default.aspx?lang=en&mlfb=3UG4511-1BN20

Service&Support (Manuals, Certificates, Characteristics, FAQs,...) https://support.industry.siemens.com/cs/ww/en/ps/3UG4511-1BN20

Image database (product images, 2D dimension drawings, 3D models, device circuit diagrams, EPLAN macros, ...) http://www.automation.siemens.com/bilddb/cax\_de.aspx?mlfb=3UG4511-1BN20&lang=en





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