



General	
<ul style="list-style-type: none"> • 6 contacts • Forcibly guided contact set • According to EN 50205 application type A • Reinforced (double) insulation • Low coil power consumption • Ambient temperature - 25 ... + 75 °C • Soldering heat resistance 260 °C / 5 s • RoHS compliance 	

Connections	
<ul style="list-style-type: none"> • Pre-soldered pins with Sn 100 for PCB 	
Drive:	
<ul style="list-style-type: none"> • Direct current, monostable 	
Approvals:	
<ul style="list-style-type: none"> • TÜV • cULus 	
Standards:	
<ul style="list-style-type: none"> • EN 50205 • IEC 61810-1 • UL 508 	

Technical Data mechanical

Dimensions L x W x H (in mm)	55 x 16,5 x 15,7
Shock resistance NO/NC contact	10/1,0 g, 11 ms half sine
Vibration resistance NO/NC contact	10/0,5 g, 10 - 200 Hz
Operating time NC-contact, contact opens	typical 8 ms
Operating time NO-contact, contact closes	typical 15 ms
Releasing time NO-contact, contact opens	typical 5 ms
Releasing time NC-contact, contact closes	typical 10 ms
Mechanical service life (without load)	> 10 ⁷ cycles
Weight	30 g

Technical Data electrical

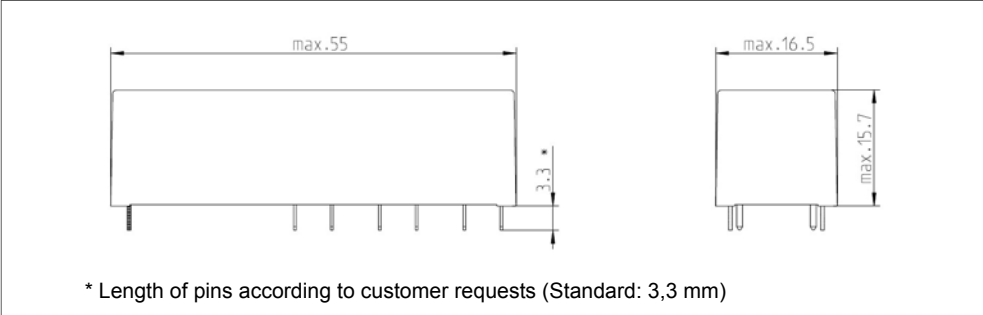
Max. switching capacity	AC 2.000 VA; DC ¹⁾ W
Max. switching voltage	AC 230/240 V; DC ¹⁾ V
Max. switching current	8 A
Constant current I _{th2} over 1 contact at the same time	8 A
Constant current I _{th2} over 2 contact at the same time	5,6 A
Constant current I _{th2} over 3 contact at the same time	4,6 A
Constant current I _{th2} over 4 contact at the same time	4,0 A
Min. switching capacity	10 mA / 5 V
Contact resistance (factory setting)	< 100 mΩ (at 1 A / 24 VDC contact load)
Switching capacity AC-15 230/240 V	I _e = 5 A
DC-13 24 V	I _e = 6 A ²⁾
Electrical service life (bei T _U = 75 °C)	
AC-1 230 V / 8 A	80.000 cycles ³⁾
DC-1 24 V / 8 A	100.000 cycles
Short-circuit capacity 1.000 A / AC 230 V	6 A gL/gG-fuse

¹⁾ see DC-switching capacity at page 4

²⁾ (IEC DIN EN 60947-5-1) The sequence with 990 switching cycles at 60 operations / min. is reduced on 6 cycles / min.

³⁾ To achieve the specified number of electrical switching cycles it is necessary to open after the soldering and washing process the ventilation element - see drawing on page 4

Dimensions



Insulation

Over voltage category (Ü) III	B = Basic insulation			
Degree of pollution (V) 2	V = Reinforced (double) insulation			
Insulating material group II	F = Functional insulation			
Insulation between	Nominal voltage network system		Air-/creeping distance ²⁾	Test voltage 50 Hz / 60 s
	AC 120/240 V	AC 230/400 V		
Drive - Contactset	V	V	> 6,0 mm	3.000 V
Contact - Contact	V	V	> 6,0 mm	3.000 V
Between open contact	F	F	> 1,0 mm ¹⁾	500 V

¹⁾ When opening failure at the antivalent contacts > 0,5 mm (DIN EN 50205)

²⁾ This information should support the design of the circuit board (diameter of the solder pad):

Variant 1

Variant 2

Type code

Housing D washtight (RT III)	Connections 3 Soldering pins for PCB	Special version 1 Variant 1 2 Variant 2 Variants see at connection grid at page 3	Version 00 Standard 01 Special version
H D Z - 0 3 4 8 0 / 2 1 - 0 0 1 0 1 2 - 4 2 0 / 0 0 2 . 0 0			
Special feature Z forcibly guided contacts	Drive 0 DC, monostable	Size 2 6 Contacts	Coil See coil table
			<input type="checkbox"/> NO <input type="checkbox"/> NC <input type="checkbox"/> CO
			Contactset-number See contactset table

Contactset table

Number of contacts	Contact material				Contactset-number
NO/NC/CO-contacts	AgSnO ₂				
	+ 0,2µm Au				
420 (Variant 1)	002				
420 (Variant 2)	004				

Coil table
Number of contacts
420

Coil-No.	Resistance [Ω]	Resistance-tolerance ±	Ambient temperature				Printing (U _{nom}) [V]
			+ 20 °C	+ 75 °C	- 25 °C	+ 20 °C	
			U ₁ [V]	U ₂ [V]	U ₃ [V]	U _{rel} [V]	
001022	53	8	4,4	7,3	23	0,6	6
001088	112	9	6,5	10,5	34	0,9	9
001016	214	11	9,0	14,5	47	1,3	12
001080	410	10	12,7	20,1	67	1,8	18
001076	575	13	15,2	23,6	78	2,1	21
001012	810	9	17,9	28,4	94	2,6	24
001082	1640	9	25,2	40,3	132	3,6	36
001078	2975	12	35,0	53,8	181	4,9	48
001079	4465	12	43,5	66,0	225	6,1	58
001090	16010	15	82,6	124,0	422	11,2	110
Further coils are possible and available							

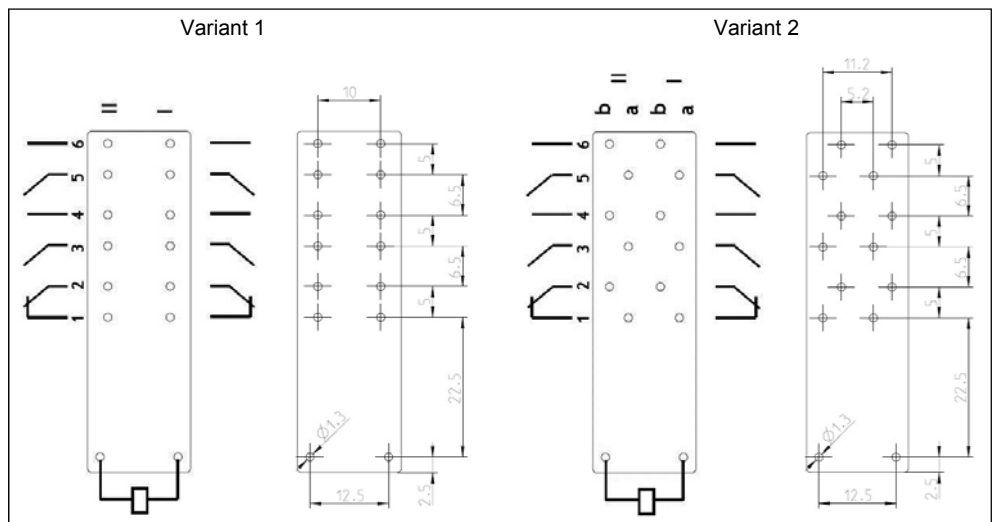
U₁: Minimum operating voltage with consideration of coil self heating
 U₂: Thermal restricted maximum coil voltage
 U₃: Maximum admissible coil voltage to realize a contact gap of > 0.5 mm also at a contact fault
 U_{rel}: Releasing voltage

All values only valid for new (unused) relays!

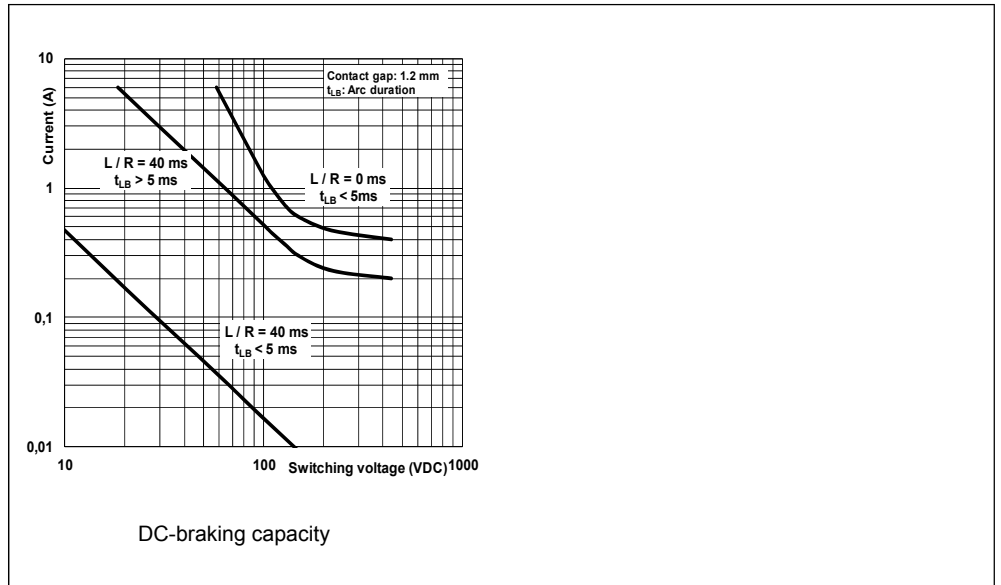
Running types

Printing (U _{nom}) [V]	Type code	Article-No.	U ₁ [V]	U ₂ [V]	U ₃ [V]	U _{rel} [V]
6	HDZ-03480/21-001022-420/002.00	480-1002	4,4	7,3	23	0,6
12	HDZ-03480/21-001016-420/002.00	480-1003	9,0	14,5	47	1,3
12	HDZ-03480/22-001016-420/004.00	480-1009	9,0	14,5	47	1,3
24	HDZ-03480/21-001012-420/002.00	480-1001	17,9	28,4	94	2,6
36	HDZ-03480/21-001082-420/002.00	480-1004	25,2	40,3	132	3,6
48	HDZ-03480/21-001078-420/002.00	480-1005	35,0	53,8	181	4,9
58	HDZ-03480/21-001079-420/002.00	480-1006	43,5	66,0	225	6,1
110	HDZ-03480/21-001090-420/002.00	480-1007	82,6	124,0	422	11,2
110	HDZ-03480/22-001090-420/004.00	480-1012	82,6	124,0	422	11,2

Connection grid
View on soldering side



Diagram



Others

