

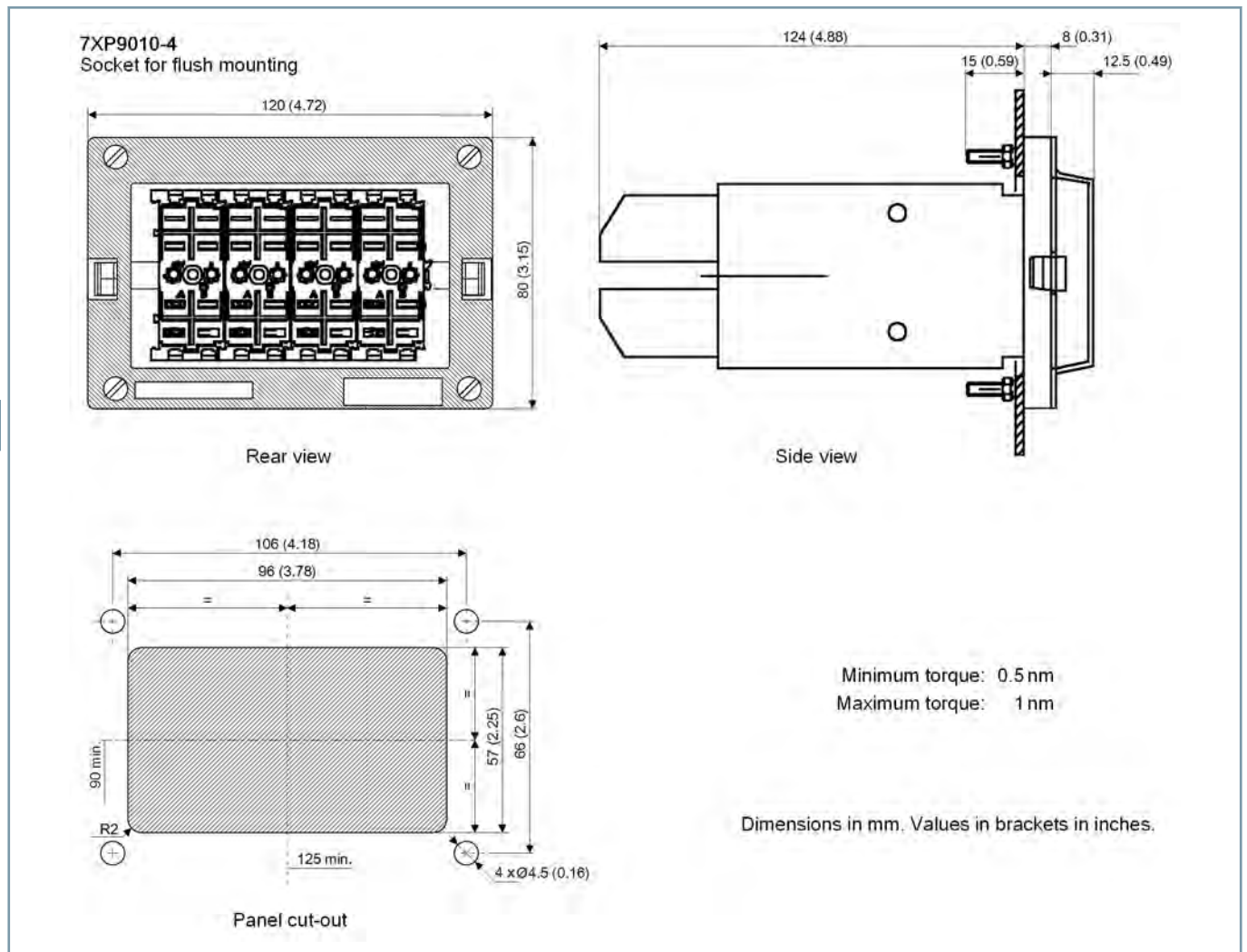
[dw\_7pa30-3phs\_socket\_for\_surface-mounting, 2, en\_US]

Figure 2.6/8 Surface-Mounting Base

# Auxiliary Relays

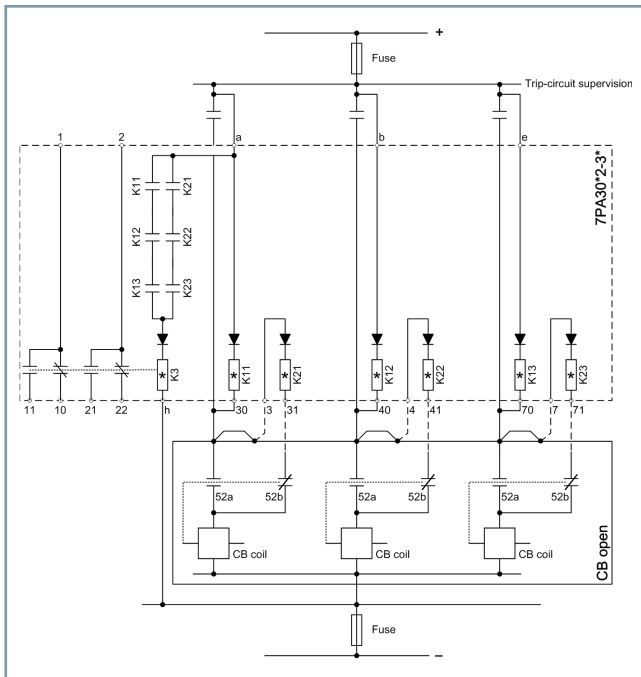
## Trip-Circuit Supervision Relay – 7PA30 3-phase

2.6



[dw\_7pa30-3phs\_socket\_for\_flush-mounting\_2\_en\_US]

Figure 2.6/9 Flush-Mounting Base



(dw\_7pa30-3phs\_connection\_2\_en\_US)

Figure 2.6/10 Connections - Contacts shown for a De-Energized Relay

### Technical Data

Rated Voltage and Internal Consumption		
$V_N$ (VDC)	Voltage range (VDC)	Internal consumption (mA)
24/30	18 to 33	32
48	36 to 52.8	35
60	45 to 66	18
110/125	82.5 to 137.5	18
220	165 to 242	13

Pre-arcing time for excitation	> 500 ms
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Contacts	
Continuous current	8 A
Overload capability	15 A
Switching power	15 A/4 s/ 110 VDC
Breaking power	0.3 A/110 VDC

$V_{max}$ open-circuited contact	250 VDC/400 VAC
Mechanical endurance	$10^7$ switching cycles
Operating temperature	-10 °C +55 °C
Storage temperature	-30 °C +70 °C
Max. humidity	93%/40 °C

Weights and packaging	
7PA30 3-phase	165 g
Carton	150x124x84 mm

Weights and packaging	
7XP9010-4	400 g
7XP9012-0	225 g

Design guidelines	
<b>Electrical tests according to</b>	<b>IEC 60255-27</b>
Insulation	2 kV/50 Hz/1 min
Surge immunity	5 kV/1.2/50 $\mu$ s
Insulation resistance	> 100 M $\Omega$ /500 VDC
<b>Flame resistance</b>	
Plastics	UL94: V0
<b>Protection class</b>	<b>IEC 60529, EN60529</b>
Relays	IP40
Flush-mounting base	IP10
Surface-Mounting Base	IP10
<b>Environmental conditions</b>	<b>IEC 60068-2</b>
Dry cold, in operation	-10 °C
Dry heat, in operation	+55 °C
Storage and transportation	-30 °C +70 °C

EMC Tests	
<b>High-frequency test:</b>	<b>EN 60255-22-1</b>
Test level: 1 MHz, 400 imp/s, 2 s	
Common mode: 2.5 kV	
Differential mode: 1 kV	
<b>Fast transient bursts</b>	<b>EN 61000-4-4</b>
Test level: 4 kV, 2.5 kHz, 1 min*2 kV, 5 kHz, 1 min	
<b>Energy surge voltages</b>	<b>EN 61000-4-5</b>
8/20 $\mu$ s. (current) - 1.2/50 $\mu$ s. (voltage) - 8/20 $\mu$ s. (current)	
Common mode: 2 kV - differential mode: 1 kV	
<b>Radiated HF field interference,</b>	<b>EN 61000-4-3</b>
amplitude-modulated: Test level: 80-1000 MHz, 10 V/m, 80% AM (1 kHz)	
<b>Radiated HF field interference, pulse-modulated:</b>	<b>EN 61000-4-3</b>
Test level: 900 $\pm$ 5 MHz, 10 V/m, 50% (200 Hz) 1.89 GHz $\pm$ 10 MHz, 10 V/m, 50% (200 Hz)	
<b>Line-conducted HF</b>	<b>EN 61000-4-6</b>
amplitude-modulated: Test level: 0.15-80 MHz, 10 V, 80% AM (1 kHz)	
<b>Electrostatic discharge test: Test level:</b>	<b>EN 61000-4-2</b>
Contact $\pm$ 15 kV, air mode $\pm$ 15 kV	

# Auxiliary Relays

## Trip-Circuit Supervision Relay – 7PA30 3-phase

2.6

EMC Tests	
<b>Magnetic Field with Energy Frequency</b> Test level: 100 A/m 1 min•1000 A/m 1 s.	EN 61000-4-8
<b>Emitted interference tests:</b> Test level: Cover: 30-230 MHz, 40 dB (µV/m) (quasi peak) - 10 m 230-1000 MHz, 47 dB (µV/m) (quasi peak) - 10 m Power supply: 0.15-0.5 MHz, 79 dB (µV) (quasi peak)/66 dB average 0.5-5 MHz, 73 dB (µV) (quasi peak)/60 dB average 5-30 MHz, 73 dB (µV) (quasi peak)/60 dB average	EN 55011 Class A

### Selection and Ordering Data

Description	Order No.															
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
<b>3-phase Trip-Circuit Supervision Relay with 2 change-over contacts</b>	7	P	A	3	0	□	2	-	□	A	A	0	0	-	□	
						▲			▲					▲		
<i>Rated voltage</i>																
DC 24/30 V						1										
DC 60 V						2										
DC 110/125 V						3										
DC 220 V						4										
DC 48 V						8										
<i>Number of phases</i>																
3-phase									3							
<i>Base</i>																
Without base														0		
With base 7XP9010-4 (flush mounting)														1		
With base 7XP9012-0 (surface mounting)														2		
5 x retaining bracket for auxiliary relay with surface mounting base (1 required for each relay/surface mounting base)	.	.	.	.	.	.	.	.	.	A	Y	R	:	E	4	7