

Power PCB Relay PCFN Solar

- 1 pole 26A, 1 form A (NO) contact
- Contact gap >1.5mm
- 200mW hold power
- Ambient temperature up to 75°C, 85°C at 22A
- the appliance is able to meet VDE V 0126-1-1

Typical applications
Photovoltaic Inverter



F_PCEN_B



Approvals

VDE Cert. No. 40012548, UL E58304
Technical data of approved types on request.

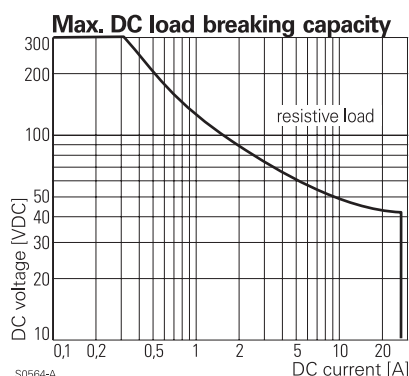
Contact Data

Contact arrangement	1 form A (NO)
Contact gap	>1.5mm
Rated voltage	277VAC
Rated current	26A
Breaking capacity max.	7200VA
Contact material	AgSnO ₂
Frequency of operation, with/without load	6/300min ⁻¹
Operate/release time max.	20/10ms
Bounce time max., form A	3ms

Contact ratings

Type	Contact	Load	Cycles
IEC 61810 / UL 508			
PCFN-1..H2MG	A (NO)	26A, 277VAC, cosφ=1, 75°C	30x10 ³
PCFN-1..H2MG	A (NO)	22A, 250VAC, cosφ=1, 85°C	30x10 ³
PCFN-1..H2MG	A (NO)	14A, 250VAC, cosφ=1, 85°C	100x10 ³
UL 508			
PCFN-1..H2MG	A (NO)	26A, 277VAC, resistive, 75°C	30x10 ³
PCFN-1..H2MG	A (NO)	22A, 277VAC, resistive, 85°C	30x10 ³

Mechanical endurance, DC coil 1x10⁶ operations



Coil Data

Rated coil voltage	12VDC
Coil insulation system according UL	Class F

Coil versions, DC coil

Coil code	Rated voltage VDC	Operate voltage VDC	Release voltage VDC	Coil resistance Ω±10%	Rated coil power mW
12	12	7.8	1.2	96	1.5 ¹⁾

1) Ambient temperature > 23°C requires reduction of coil voltage to 4.4 to <6V after 100ms.
Hold voltage >=4.4V at ambient temperature ≤85°C.
All figures are given for coil without pre-energization, at ambient temperature +23°C.
Other coil voltages on request.

Insulation Data

Initial dielectric strength	
between open contacts	2500V _{rms}
between contact and coil	4000V _{rms}
Clearance/creepage	
between contact and coil	6.1/6.1 mm
Material group of insulation parts	III
Tracking index of relay base	PTI 175

Other Data

Material compliance: EU RoHS/ELV, China RoHS, REACH, Halogen content refer to the Product Compliance Support Center at www.te.com/customer-support/rohssupportcenter

Ambient temperature -25 to +75°C¹⁾
-25 to +85°C at 22A

Category of environmental protection

IEC 61810 RTII - flux proof

Vibration resistance (functional) 10g

Vibration resistance (destructive) 10g

Shock resistance (destructive) 100g

Terminal type PCB-THT

Mounting distance ≥10mm

Weight 28g

Resistance to soldering heat THT

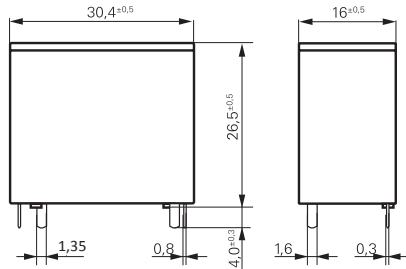
IEC 60068-2-20 260°C/5s

Packaging unit tube/20 pcs., box/500 pcs.

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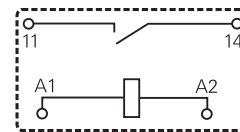
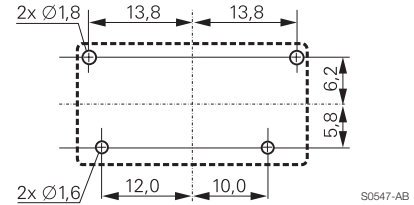
Power PCB Relay PCFN Solar (Continued)

Dimensions



PCB layout / terminal assignment

Bottom view on solder pins



S0547-AA

NOTE: it is recommended to connect the grid (phase or neutral line) to pin 11 of the PCFN Solar.

Product code	Version	Contact arrangement	Contact material	Coil	Part number
PCFN-112H2MG	PCB, flux tight	1 form A (NO) contact	AgSnO ₂	12VDC	1721929-1
PCFN-124H2MG	PCB, flux tight	1 form A (NO) contact	AgSnO ₂	24VDC	1721929-2