

1784978

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Feed-through header, nominal cross section: 35 mm², color: green, nominal current: 125 A, rated voltage (III/2): 1000 V, contact surface: Ag, contact connection type: Socket, number of potentials: 3, number of rows: 1, number of positions: 3, number of connections: 3, product range: DFK-IPC 35 HC/..-GF, pitch: 15 mm, mounting: Wave soldering, pin layout: Linear pinning, solder pin [P]: 4.6 mm, number of solder pins per potential: 3, plug-in system: COMBICON PC 35, Pin connector pattern alignment: Standard, locking: Screw locking mechanism, mounting method: Threaded flange, type of packaging: packed in cardboard

#### Your advantages

- · Well-known mounting principle allows worldwide use
- · Double flange for space-optimized screw connection on the housing panel and with the connector
- · Inverted header with socket contacts for touch-proof device outputs or PCB/PCB connections
- · Integrated double steel spring provides additional safety in the event of temperature and power fluctuations

#### Commercial data

Item number	1784978
Packing unit	25 pc
Minimum order quantity	50 pc
Note	Made to order (non-returnable)
Sales key	AA05
Product key	AAEWCB
GTIN	4046356561280
Weight per piece (including packing)	97.68 g
Weight per piece (excluding packing)	97.65 g
Customs tariff number	85366930
Country of origin	PL



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#### Technical data

### Product properties

Product type	Feed-through header
Product family	DFK-IPC 35 HC/GF
Product line	COMBICON Connectors XL
Туре	Feed-through header
Number of positions	3
Pitch	15 mm
Number of connections	3
Number of rows	1
Number of potentials	3
Mounting flange	Threaded flange
Pin layout	Linear pinning
Solder pins per potential	3

#### Electrical properties

#### Properties

Nominal current I <sub>N</sub> 125 A  Nominal voltage U <sub>N</sub> 1000 V  Rated voltage (III/3) 1000 V  Rated surge voltage (III/3) 8 kV  Rated voltage (III/2) 1000 V  Rated surge voltage (III/2) 8 kV  Rated voltage (III/2) 8 kV  Rated voltage (III/2) 6 kV		
Rated voltage (III/3)       1000 V         Rated surge voltage (III/3)       8 kV         Rated voltage (III/2)       1000 V         Rated surge voltage (III/2)       8 kV         Rated voltage (III/2)       1000 V	Nominal current I <sub>N</sub>	125 A
Rated surge voltage (III/3) 8 kV  Rated voltage (III/2) 1000 V  Rated surge voltage (III/2) 8 kV  Rated voltage (III/2) 1000 V	Nominal voltage U <sub>N</sub>	1000 V
Rated voltage (III/2)  Rated surge voltage (III/2)  Rated voltage (III/2)  1000 V  Rated voltage (II/2)	Rated voltage (III/3)	1000 V
Rated surge voltage (III/2) 8 kV Rated voltage (II/2) 1000 V	Rated surge voltage (III/3)	8 kV
Rated voltage (II/2) 1000 V	Rated voltage (III/2)	1000 V
	Rated surge voltage (III/2)	8 kV
Rated surge voltage (II/2) 6 kV	Rated voltage (II/2)	1000 V
	Rated surge voltage (II/2)	6 kV

#### Mounting

Mounting type	Wave soldering
Pin layout	Linear pinning
Flange	
Tightening torque	0.8 Nm
Attachment to feed-through panel	
Tightening torque	1 Nm
Screw	1700368 DFK-PC 35 SS

#### Attachment on the PCB

Tightening torque	1 Nm
Screw	1700368 DFK-PC 35 SS

#### Material specifications

Material data - contact



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Note	WEEE/RoHS-compliant, free of whiskers according to IEC 60068-2-82/JEDEC JESD 201
Contact material	Cu alloy
Metal surface contact area (top layer)	Silver (4 - 8 μm Ag)
Material data - housing	
Color (Housing)	green (6021)
Color (Housing) Insulating material	green (6021) PBT
( 0)	
Insulating material	PBT

#### Notes

Notes on operation	In accordance with IEC 61984, COMBICON connectors have no switching power (COC). During designated use, they must not be plugged in or disconnected when carrying voltage or under load.
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#### **Dimensions**

Dimensional drawing	P
Pitch	15 mm
Width [w]	77.4 mm
Height [h]	36.3 mm
Length [I]	44.9 mm
Installed height	31.7 mm
Solder pin length [P]	4.6 mm
Pin dimensions	2.5 x 2.5 mm
PCB design	
Hole diameter	3.6 mm
	5.4 mm

#### Electrical tests

#### Air clearances and creepage distances |

Specification	IEC 60664-1:2007-04
Insulating material group	Illa
Comparative tracking index (IEC 60112)	CTI 225
Rated insulation voltage (III/3)	1000 V
Rated surge voltage (III/3)	8 kV
minimum clearance value - non-homogenous field (III/3)	8 mm
minimum creepage distance (III/3)	16 mm
Rated insulation voltage (III/2)	1000 V



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Rated surge voltage (III/2)	8 kV
minimum clearance value - non-homogenous field (III/2)	8 mm
minimum creepage distance (III/2)	10 mm
Rated insulation voltage (II/2)	1000 V
Rated surge voltage (II/2)	6 kV
minimum clearance value - non-homogenous field (II/2)	5.5 mm
minimum creepage distance (II/2)	10 mm

#### Environmental and real-life conditions

#### Ambient conditions

Ambient temperature (operation)	-40 °C 100 °C (dependent on the derating curve)
Ambient temperature (storage/transport)	-40 °C 70 °C
Relative humidity (storage/transport)	30 % 70 %
Ambient temperature (assembly)	-5 °C 100 °C

#### Packaging specifications

#### Packaging specifications

Type of packaging packed in cardboard
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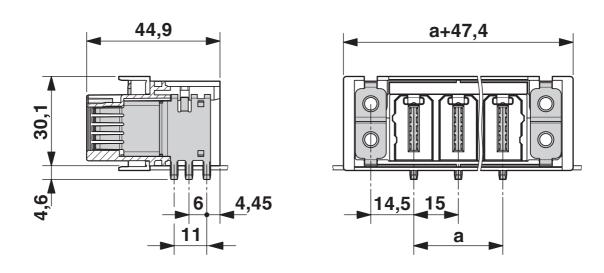


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## Drawings

#### Dimensional drawing



# a+40,6<sup>±0,15</sup> a+29<sup>±0,15</sup> a+17,5<sup>±0,15</sup>

Dimensional drawing



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#### **Approvals**

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UL Recognized Approval ID: E60425-20101007				
	Nominal voltage U <sub>N</sub>	Nominal current I <sub>N</sub>	Cross section AWG	Cross section mm <sup>2</sup>
Use group B				
	600 V	115 A	-	-
Use group C				
	600 V	115 A	-	-

<b>√DE</b>	VDE report with production monitoring Approval ID: 40039053					
		Nominal voltage U <sub>N</sub>	Nominal current I <sub>N</sub>	Cross section AWG	Cross section mm <sup>2</sup>	
		1000 V	125 A	-	-	



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## Classifications

ECLASS		
	ECLASS-13.0	27460201
E	ГІМ	
	ETIM 9.0	EC002637

**UNSPSC** 

UNSPSC 21.0 39121400



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## Environmental product compliance

#### EU RoHS

Fulfills EU RoHS substance requirements	Yes, No exemptions
China RoHS	
Environment friendly use period (EFUP)	EFUP-E
	No hazardous substances above the limits
EU REACH SVHC	
REACH candidate substance (CAS No.)	No substance above 0.1 wt%
EF3.0 Climate Change	
CO2e kg	0.562 kg CO2e

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