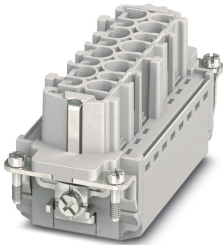


Contact insert - HC-B16-I-PT-F - 1407731

Please be informed that the data shown in this PDF Document is generated from our Online Catalog. Please find the complete data in the user's documentation. Our General Terms of Use for Downloads are valid (<http://phoenixcontact.com/download>)




HEAVYCON socket insert, B16 series, 16 + PE-pos., push-in connection

Your advantages

- ✓ Easy installation without tools, even when mounted, with push-in connection technology
- ✓ Shortest installation time compared to other connection technologies
- ✓ Quick and effortless wiring, in particular when space is tight
- ✓ Automatic cabling with robots possible
- ✓ Safe wiring and operation with color-coded actuators
- ✓ Shock and vibration-resistant in accordance with DIN EN 61373
- ✓ Cost-effective and fast coding with plastic profiles
- ✓ Test connection for 2 mm test plug



Key Commercial Data

Packing unit	1 pc
GTIN	 4 046356 777568
GTIN	4046356777568

Technical data

General

Note	only use flexible conductors with ferrules
	Connectors may be operated only when there is no load/voltage.
Connection method	Push-in connection
Torque	0.8 Nm ... 1.2 Nm (PE connection)
	0.5 Nm ... 0.8 Nm (Mounting screws for mounting in the HEAVYCON housing)
Number of connections per position	1
Degree of pollution	3

Contact insert - HC-B16-I-PT-F - 1407731

Technical data

General

Overvoltage category	III
Number of positions	16+PE
Insertion/withdrawal cycles	≥ 500
Size	B16
	B32
Contact numbering	1 - 16
Conductor cross section	0.14 mm ² ... 2.5 mm ²
Connection cross section AWG	26 ... 14
Stripping length	8 mm ... 10 mm
Assembly instructions	To ensure correct use, installation in housing with IP54 protection or better is required

Ambient conditions

Ambient temperature (operation)	-40 °C ... 125 °C (including heating up of contacts)
---------------------------------	--

Material data

Contact material	Copper alloy
Contact surface material	Ag/Sn (tarnish protection)
Contact carrier material	PC
Standards/regulations	PC: Fire protection in rail vehicles - requirement sets R22 and R23 acc. to DIN EN 45545-2 (Risk level HL1 - HL2)
	PC: Fire protection in rail vehicles - requirement set R24 acc. to DIN EN 45545-2 (Risk level HL1 - HL3)

Electrical characteristics

Rated voltage (III/3)	500 V
Rated surge voltage	6 kV
Rated current	16 A (power contacts)

Standards and Regulations

Flammability rating according to UL 94	V0
Standards/regulations	acc. to DIN EN 45545-2

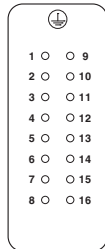
Environmental Product Compliance

China RoHS	Environmentally friendly use period: unlimited = EFUP-e
	No hazardous substances above threshold values

Drawings

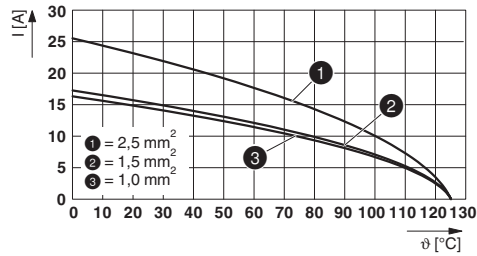
Contact insert - HC-B16-I-PT-F - 1407731

Schematic diagram



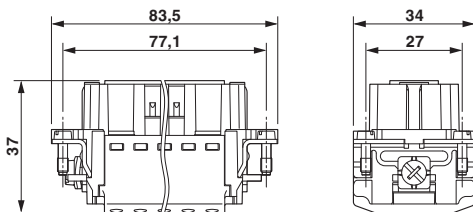
Connector pin assignment, connection side

Diagram



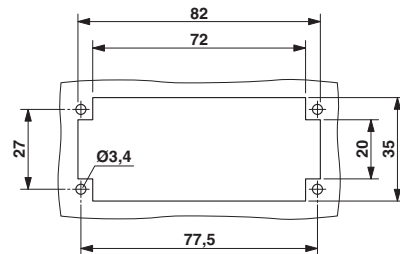
Derating diagram

Dimensional drawing



Dimensional drawing

Dimensional drawing



Mounting cutout when used without housing

Classifications

eCI@ss

eCI@ss 10.0.1	27440205
eCI@ss 11.0	27440205
eCI@ss 4.0	27140800
eCI@ss 4.1	27140800
eCI@ss 5.0	27143400
eCI@ss 5.1	27261200
eCI@ss 6.0	27261200
eCI@ss 7.0	27440205
eCI@ss 9.0	27440205

ETIM

ETIM 3.0	EC000438
ETIM 4.0	EC000438
ETIM 6.0	EC000438
ETIM 7.0	EC000438

UNSPSC

UNSPSC 6.01	30211923
UNSPSC 7.0901	39121522
UNSPSC 11	39121522

Contact insert - HC-B16-I-PT-F - 1407731

Classifications

UNSPSC

UNSPSC 12.01	39121522
UNSPSC 13.2	39121522
UNSPSC 18.0	39121522
UNSPSC 19.0	39121522
UNSPSC 20.0	39121522
UNSPSC 21.0	39121522

Approvals


Approvals


Approvals


CSA / UL Recognized / EAC / DNV GL / EAC / cULus Recognized

Ex Approvals

Approval details

CSA		http://www.csagroup.org/services-industries/product-listing/	13631
Nominal voltage UN		600 V	
Nominal current IN		10 A	
mm ² /AWG/kcmil		14	

UL Recognized		http://database.ul.com/cgi-bin/XYV/template/LISEXT/1FRAME/index.htm	FILE E 118976
Nominal voltage UN		600 V	
Nominal current IN		13 A	
mm ² /AWG/kcmil		14	

EAC		RU C- DE.AI30.B.01102
-----	---	--------------------------

Contact insert - HC-B16-I-PT-F - 1407731

Approvals

DNV GL		https://approvalfinder.dnvgl.com/	TAE000037S
--------	--	---	------------

EAC			RU C- DE.BL08.B.00511
-----	--	--	--------------------------

cULus Recognized		http://database.ul.com/cgi-bin/XYV/template/LISEXT/1FRAME/index.htm	E468743
Nominal voltage UN		600 V	
Nominal current IN		13 A	
mm ² /AWG/kcmil		14	

Accessories

Accessories

Coding element

Coding profile - CP-HC - 1686478



Coding profile, 4 coding profiles per strip, for insertion in coding keyways

Coding element - HC-CBU - 1676860



Coding socket for coding up to 16 connectors

Coding bolt - HC-CB - 1772722



Coding pin, prevents mismatching of up to six connectors with an identical number of positions

Contact insert - HC-B16-I-PT-F - 1407731

Accessories

Coding element - HC-CST - 1676857



Coding peg for coding up to 16 connectors

Crimping tool

Crimping pliers - CRIMPFOX 6 - 1212034



Crimping pliers, for ferrules without insulating collar according to DIN 46228 Part 1 and ferrules with insulating collar according to DIN 46228 Part 4, 0.25 mm² ... 6.0 mm², lateral entry, trapezoidal crimp

Docking frame

Docking frames - HC-B 16-ANDOCK - 1586138



Docking frame for racks, for contact inserts of B16 type, with four M5 flat headed screws, rack balance x/y axis ± 1.5 mm

Mounting material

Screw - HC-B-PES - 1604997



PE screw, for contact inserts HC-B / HC-BB / HC-DD / HC-D40 / HC-D64

PE multiplier - HC-B-3PE - 1644326



PE multiplier, for three PE connections, for HC-B (besides HC-B..E..ZZ) / HC-BB / HC-DD / HC-D40 / HC-D64 contact inserts

Contact insert - HC-B16-I-PT-F - 1407731

Accessories

Strain relief clamp - HC-B-ZG - 1685327



Strain relief clamps contact inserts of series: B-, BB-, D 40, D 64, DD and HV, straight cable exit

Strain relief clamp - HC-B-ZS - 1685330



Strain relief clamps contact inserts of series: B-, BB-, D 40, D 64, DD and HV, lateral cable exit

Additional products

Contact insert - HC-B16-I-PT-M - 1407732



HEAVYCON pin insert, B16 series, 16 + PE-pos., push-in connection

Phoenix Contact 2021 © - all rights reserved
<http://www.phoenixcontact.com>

PHOENIX CONTACT GmbH & Co. KG
Flachsmarktstr. 8
32825 Blomberg
Germany
Tel. +49 5235 300
Fax +49 5235 3 41200
<http://www.phoenixcontact.com>