

PTV 2,5-QUATTRO-MT - Knife-disconnect terminal block



1079070

<https://www.phoenixcontact.com/us/products/1079070>

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 documentation. Our general terms of use for downloads are valid.



Knife-disconnect terminal block, nom. voltage: 400 V, nominal current: 20 A, connection method: Push-in connection, Rated cross section: 2.5 mm², cross section: 0.14 mm² - 4 mm², color: gray

Your advantages

- The secure end position of the lever-type disconnect knife ensures that the switching states of the knife disconnect terminal blocks are permanently secured and are always clearly recognizable
- The circuits can be opened easily with a standard screwdriver
- Clear wiring, thanks to lateral conductor entry
- The compact design enables wiring in a confined space
- The Push-in connection terminal blocks are characterized by the system features of the CLIPLINE complete system
- In addition to the testing option in the double function shaft, all terminal blocks provide an additional test pick-off

Commercial data

Item number	1079070
Packing unit	50 pc
Minimum order quantity	50 pc
Sales key	BE23
Product key	BE2331
GTIN	4055626797496
Weight per piece (including packing)	12.024 g
Weight per piece (excluding packing)	12.02 g
Customs tariff number	85369010
Country of origin	CN

PTV 2,5-QUATTRO-MT - Knife-disconnect terminal block



1079070

<https://www.phoenixcontact.com/us/products/1079070>

Technical data

Product properties

Product type	Disconnect terminal block
Product family	PTV
Number of connections	4
Number of rows	1
Potentials	1

Insulation characteristics

Overvoltage category	III
Degree of pollution	3

Electrical properties

Rated surge voltage	6 kV
Maximum power dissipation for nominal condition	0.77 W

Connection data

Number of connections per level	4
Nominal cross section	2.5 mm ²
Connection method	Push-in connection
Stripping length	8 mm ... 10 mm
Internal cylindrical gage	A3
Connection in acc. with standard	IEC 60947-7-1
Conductor cross-section rigid	0.14 mm ² ... 4 mm ²
Cross section AWG	26 ... 12 (converted acc. to IEC)
Conductor cross-section flexible	0.14 mm ² ... 4 mm ²
Conductor cross-section, flexible [AWG]	26 ... 12 (converted acc. to IEC)
Conductor cross-section flexible (ferrule without plastic sleeve)	0.14 mm ² ... 2.5 mm ²
Flexible conductor cross-section (ferrule with plastic sleeve)	0.14 mm ² ... 2.5 mm ²
2 conductors with the same cross section, flexible, with TWIN ferrule with plastic sleeve	0.5 mm ² ... 1.5 mm ²
Nominal current	20 A
Maximum load current	20 A (with 4 mm ² conductor cross-section, rigid)
Nominal voltage	400 V
Nominal cross section	2.5 mm ²

Connection cross sections directly pluggable

Conductor cross-section rigid	0.5 mm ² ... 4 mm ²
Conductor cross-section flexible (ferrule without plastic sleeve)	1 mm ² ... 2.5 mm ²
Flexible conductor cross-section (ferrule with plastic sleeve)	1 mm ² ... 2.5 mm ²

Dimensions

Width	5.2 mm
End cover width	2.2 mm

PTV 2,5-QUATTRO-MT - Knife-disconnect terminal block



1079070

<https://www.phoenixcontact.com/us/products/1079070>

Height	80.5 mm
Depth	45.7 mm
Depth on NS 35/7,5	47.2 mm
Depth on NS 35/15	54.7 mm

Material specifications

Color	gray (RAL 7042)
Flammability rating according to UL 94	V0
Insulating material group	I
Insulating material	PA
Static insulating material application in cold	-60 °C
Relative insulation material temperature index (Elec., UL 746 B)	130 °C
Fire protection for rail vehicles (DIN EN 45545-2) R22	HL 1 - HL 3
Fire protection for rail vehicles (DIN EN 45545-2) R23	HL 1 - HL 3
Fire protection for rail vehicles (DIN EN 45545-2) R24	HL 1 - HL 3
Fire protection for rail vehicles (DIN EN 45545-2) R26	HL 1 - HL 3
Surface flammability NFPA 130 (ASTM E 162)	passed
Specific optical density of smoke NFPA 130 (ASTM E 662)	passed
Smoke gas toxicity NFPA 130 (SMP 800C)	passed

Electrical tests

Surge voltage test

Result	Test passed
--------	-------------

Temperature-rise test

Requirement temperature-rise test	Increase in temperature ≤ 45 K
Result	Test passed
Short-time withstand current 2.5 mm ²	0.3 kA
Result	Test passed

Power-frequency withstand voltage

Test voltage setpoint	1.89 kV
Result	Test passed

Mechanical properties

Mechanical data

Open side panel	Yes
-----------------	-----

Mechanical tests

Mechanical strength

Result	Test passed
--------	-------------

Attachment on the carrier

DIN rail/fixing support	NS 35
-------------------------	-------

PTV 2,5-QUATTRO-MT - Knife-disconnect terminal block



1079070

<https://www.phoenixcontact.com/us/products/1079070>

Result	Test passed
Test for conductor damage and slackening	
Rotation speed	10 rpm
Revolutions	135
Conductor cross-section/weight	0.14 mm ² / 0.2 kg
	2.5 mm ² / 0.7 kg
	4 mm ² / 0.9 kg
Result	Test passed

Environmental and real-life conditions

Aging

Temperature cycles	192
Result	Test passed

Needle-flame test

Time of exposure	30 s
Result	Test passed

Oscillation/broadband noise

Specification	DIN EN 50155 (VDE 0115-200):2018-05
Spectrum	Long life test category 2, bogie-mounted
Frequency	$f_1 = 5 \text{ Hz}$ to $f_2 = 250 \text{ Hz}$
ASD level	6.12 (m/s ²) ² /Hz
Acceleration	3.12g
Test duration per axis	5 h
Test directions	X-, Y- and Z-axis
Result	Test passed

Shocks

Pulse shape	Half-sine
Acceleration	30g
Shock duration	18 ms
Number of shocks per direction	3
Test directions	X-, Y- and Z-axis (pos. and neg.)
Result	Test passed

Ambient conditions

Ambient temperature (operation)	-60 °C ... 110 °C (Operating temperature range incl. self-heating; for max. short-term operating temperature, see RTI Elec.)
Ambient temperature (storage/transport)	-25 °C ... 60 °C (for a short time, not exceeding 24 h, -60 °C to +70 °C)
Ambient temperature (assembly)	-5 °C ... 70 °C
Ambient temperature (actuation)	-5 °C ... 70 °C
Permissible humidity (operation)	20 % ... 90 %
Permissible humidity (storage/transport)	30 % ... 70 %

PTV 2,5-QUATTRO-MT - Knife-disconnect terminal block



1079070
<https://www.phoenixcontact.com/us/products/1079070>

Standards and regulations

Connection in acc. with standard	IEC 60947-7-1
----------------------------------	---------------

PTV 2,5-QUATTRO-MT - Knife-disconnect terminal block

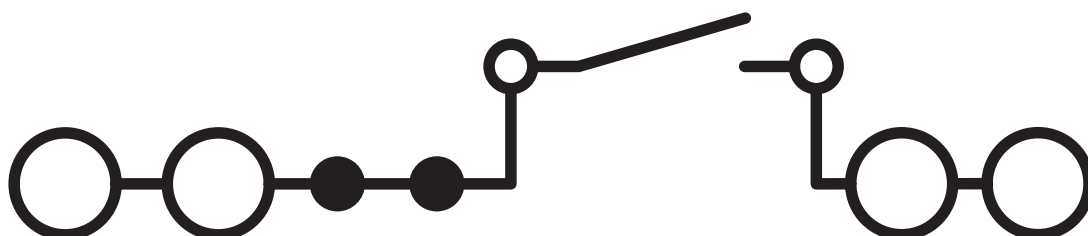


1079070

<https://www.phoenixcontact.com/us/products/1079070>

Drawings

Circuit diagram



PTV 2,5-QUATTRO-MT - Knife-disconnect terminal block



1079070

<https://www.phoenixcontact.com/us/products/1079070>

Approvals

To download certificates, visit the product detail page: <https://www.phoenixcontact.com/us/products/1079070>

 CSA Approval ID: 158887				
	Nominal voltage U_N	Nominal current I_N	Cross section AWG	Cross section mm^2
B	300 V	20 A	26 - 12	-
C	300 V	20 A	26 - 12	-
D	600 V	5 A	26 - 12	-

 EAC Approval ID: RU C-DE.BL08.B.00644				
---	--	--	--	--

 cULus Recognized Approval ID: E60425				
	Nominal voltage U_N	Nominal current I_N	Cross section AWG	Cross section mm^2
B	300 V	20 A	26 - 12	-
C	300 V	20 A	26 - 12	-
F	400 V	20 A	26 - 12	-
D	600 V	5 A	26 - 12	-

 IECEE CB Scheme Approval ID: DE1-67139				
	Nominal voltage U_N	Nominal current I_N	Cross section AWG	Cross section mm^2
keine	400 V	20 A	-	0.2 - 4

 VDE Zeichengenehmigung Approval ID: 40056318				
	Nominal voltage U_N	Nominal current I_N	Cross section AWG	Cross section mm^2
keine	400 V	20 A	-	0.2 - 4

PTV 2,5-QUATTRO-MT - Knife-disconnect terminal block



1079070

<https://www.phoenixcontact.com/us/products/1079070>

Classifications

ECLASS

ECLASS-13.0	27250108
ECLASS-15.0	27250108

ETIM

ETIM 9.0	EC000902
----------	----------

UNSPSC

UNSPSC 21.0	39121400
-------------	----------

PTV 2,5-QUATTRO-MT - Knife-disconnect terminal block



1079070
<https://www.phoenixcontact.com/us/products/1079070>

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%

Phoenix Contact 2025 © - all rights reserved
<https://www.phoenixcontact.com>

Phoenix Contact USA
586 Fulling Mill Road
Middletown, PA 17057, United States
(+717) 944-1300
info@phoenixcon.com