Knife disconnect terminal block - QTC 2,5-MT - 3206487

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Knife disconnect terminal block, nom. voltage: 400 V, nominal current: 20 A, connection method: Quick connection, cross section: 0.5 mm² - 2.5 mm², AWG: 20 - 14, length: 82.5 mm, width: 6.2 mm, color: gray, mounting: NS 35/7,5, NS 35/15, nom. voltage: 400 V

Why buy this product

- Tested for railway applications

RoHS

Key Commercial Data

Packing unit	50 STK
GTIN	4 046356 057660
GTIN	4046356057660

Technical data

General

Number of levels	1
Number of connections	2
Nominal cross section	2.5 mm²
Color	gray
Insulating material	PA
Flammability rating according to UL 94	V0
Area of application	Railway industry
	Machine building
	Plant engineering
Rated surge voltage	6 kV
Degree of pollution	3
Overvoltage category	III
Insulating material group	I
Connection in acc. with standard	IEC 60947-7-1
Nominal current I_N	20 A

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Technical data

General

Maximum load current	20 A (with a 2.5 mm² conductor cross section)
Nominal voltage U_N	400 V
Open side panel	Yes
Shock protection test specification	IEC 60529:2001-02
Back of the hand protection	guaranteed
Finger protection	guaranteed
Result of surge voltage test	Test passed
Surge voltage test setpoint	7.3 kV
Result of power-frequency withstand voltage test	Test passed
Power frequency withstand voltage setpoint	1.89 kV
Result of the test for mechanical stability of terminal points (5 x conductor connection)	Test passed
Result of bending test	Test passed
Bending test rotation speed	10 rpm
Bending test turns	135
Bending test conductor cross section/weight	0.5 mm² / 0.3 kg
	2.5 mm² / 0.7 kg
Tensile test result	Test passed
Conductor cross section tensile test	0.5 mm²
Tractive force setpoint	20 N
Conductor cross section tensile test	2.5 mm²
Tractive force setpoint	50 N
Result of tight fit on support	Test passed
Tight fit on carrier	NS 35
Setpoint	1 N
Result of voltage-drop test	Test passed
Requirements, voltage drop	≤ 6,4 mV
Result of temperature-rise test	Test passed
Short circuit stability result	Test passed
Conductor cross section short circuit testing	2.5 mm²
Short-time current	0.3 kA
Result of thermal test	Test passed
Proof of thermal characteristics (needle flame) effective duration	30 s
Relative insulation material temperature index (Elec., UL 746 B)	130 °C
Temperature index of insulation material (DIN EN 60216-1 (VDE 0304-21))	130 °C
Static insulating material application in cold	-60 °C
Behavior in fire for rail vehicles (DIN 5510-2)	Test passed
Flame test method (DIN EN 60695-11-10)	V0
Oxygen index (DIN EN ISO 4589-2)	>32 %
NF F16-101, NF F10-102 Class I	2

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Technical data

General

NF F16-101, NF F10-102 Class F	2
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
Calorimetric heat release NFPA 130 (ASTM E 1354)	28 MJ/kg
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

Dimensions

Width	6.2 mm
Length	82.5 mm
Height NS 35/7,5	39.3 mm
Height NS 35/15	46.8 mm

Connection data

Conductor cross section solid min.	0.5 mm²
Conductor cross section solid max.	2.5 mm²
Conductor cross section flexible min.	0.5 mm²
Conductor cross section flexible max.	2.5 mm²
Conductor cross section AWG min.	20
Conductor cross section AWG max.	14
Connection method	Quick connection
Max. wire diameter incl. insulation	3.8 mm
Material wire insulation	PVC / PE
Structure of individual litz in acc. with VDE 0295 / smallest wire diameter	VDE 0295 Cl.1-5

Standards and Regulations

Connection in acc. with standard	CSA
	IEC 60947-7-1
Flammability rating according to UL 94	V0
Fire protection for rail vehicles (DIN EN 45545-2) R22	HL 1 - HL 3 HL 1 - HL 3 HL 1 - HL 3 HL 1 - HL 3
Fire protection for rail vehicles (DIN EN 45545-2) R23	HL 1 - HL 3 HL 1 - HL 3 HL 1 - HL 3 HL 1 - HL 3
Fire protection for rail vehicles (DIN EN 45545-2) R24	HL 1 - HL 3 HL 1 - HL 3 HL 1 - HL 3 HL 1 - HL 3
Fire protection for rail vehicles (DIN EN 45545-2) R26	HL 1 - HL 3 HL 1 - HL 3 HL 1 - HL 3 HL 1 - HL 3

Environmental Product Compliance

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

Drawings

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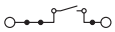
Circuit diagram



Approvals

Approvals

Approvals

CSA / UL Recognized / cUL Recognized / BV / ABS / NK / LR / DNV GL / cULus Recognized

Ex Approvals

Approval details

CSA		http://www.csagroup.org/services-industries/product-listing/	13631

	D	B	C
Nominal voltage UN	600 V	300 V	300 V
Nominal current IN	5 A	15 A	15 A
mm²/AWG/kcmil	20-14	20-14	20-14

UL Recognized		http://database.ul.com/cgi-bin/XYV/template/LISEXT/1FRAME/index.htm	FILE E 60425

	D		B	C
Nominal voltage UN	300 V	300 V	300 V	150 V
Nominal current IN	10 A	15 A	15 A	15 A
mm²/AWG/kcmil	20-14	20-14	20-14	20-14

cUL Recognized		http://database.ul.com/cgi-bin/XYV/template/LISEXT/1FRAME/index.htm	FILE E 60425

	D		B	C
Nominal voltage UN	300 V	300 V	300 V	150 V
Nominal current IN	10 A	15 A	15 A	15 A
mm²/AWG/kcmil	20-14	20-14	20-14	20-14

BV		http://www.veristar.com/portal/veristarinfo/generalinfo/approved/approvedProducts/equipmentAndMaterials	20148/A0 BV

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Approvals

ABS	http://www.eagle.org/eagleExternalPortalWEB/	16-HG1589079-PDA
NK	http://www.classnk.or.jp/hp/en/	09 ME 139
LR	http://www.lr.org/en	15/20023
DNV GL	http://exchange.dnv.com/tari/	TAE000014H
cULus Recognized	http://database.ul.com/cgi-bin/XYV/template/LISEXT/1FRAME/index.htm	

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