

1870695

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Printed circuit board terminal, nominal current: 16 A, rated voltage (III/2): 400 V, nominal cross section: 1.5 mm², number of potentials: 16, number of rows: 1, number of positions per row: 16, product range: ZFKDS(A) 1,5, pitch: 5.08 mm, connection method: Spring-cage connection, mounting: Wave soldering, conductor/PCB connection direction: 45 °, color: green, Pin layout: Linear pinning, Solder pin [P]: 3.5 mm, number of solder pins per potential: 2, type of packaging: packed in cardboard

### Your advantages

- Defined contact force ensures that contact remains stable over the long term
- · Clamping space opened by means of fixed screwdriver enables convenient conductor connection
- · Angled connection enables multi-row arrangement on the PCB
- The latching on the side enables various numbers of positions to be combined
- Two solder pins reduce the mechanical strain on the soldering spots

#### Commercial data

Item number	1870695
Packing unit	10 pc
Minimum order quantity	10 pc
Note	Made to order (non-returnable)
Sales key	AALMBA
Product key	AALMBA
GTIN	4017918138912
Weight per piece (including packing)	20.18 g
Weight per piece (excluding packing)	20 g
Customs tariff number	85369010
Country of origin	IN



1870695

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### Technical data

### Product properties

Product type	Printed circuit board terminal
Product family	ZFKDS(A) 1,5
Product line	COMBICON Terminals S
Туре	PC terminal block can be aligned
Number of positions	16
Pitch	5.08 mm
Number of connections	16
Number of rows	1
Number of potentials	16
Pin layout	Linear pinning
Solder pins per potential	2

### Electrical properties

#### Properties

Nominal current I <sub>N</sub>	16 A
Nominal voltage U <sub>N</sub>	400 V
Rated voltage (III/3)	250 V
Rated surge voltage (III/3)	4 kV
Rated voltage (III/2)	400 V
Rated surge voltage (III/2)	4 kV
Rated voltage (II/2)	630 V
Rated surge voltage (II/2)	4 kV

### Connection data

### Connection technology

Туре	PC terminal block can be aligned	
Nominal cross section	1.5 mm <sup>2</sup>	
Conductor connection		
Connection method	Spring-cage connection	

Conductor Connection	
Connection method	Spring-cage connection
Conductor cross section rigid	0.2 mm <sup>2</sup> 2.5 mm <sup>2</sup>
Conductor cross section flexible	0.2 mm <sup>2</sup> 1.5 mm <sup>2</sup>
Conductor cross section AWG	24 14
Conductor cross section flexible, with ferrule without plastic sleeve	0.25 mm <sup>2</sup> 1.5 mm <sup>2</sup>
Conductor cross section, flexible, with ferrule, with plastic sleeve	0.25 mm² 1.5 mm²

### Mounting

Stripping length

7.5 mm



1870695

Pin layout

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terial specifications			
Material data - contact			
Note	WEEE/RoHS-compliant, free of whiskers according to IEC 60068-2-82/JEDEC JESD 201		
Contact material	Cu alloy		
Surface characteristics	hot-dip tin-plated		
Metal surface terminal point (top layer)	Tin (10 - 16 μm Sn)		
Metal surface soldering area (top layer)	Tin (10 - 16 μm Sn)		
Material data - housing			
Color (Housing)	green (6021)		
Insulating material	PA		
Insulating material group	T		
CTI according to IEC 60112	600		
Flammability rating according to UL 94	V0		
Glow wire flammability index GWFI according to EN 60695-2-12	850		
Glow wire ignition temperature GWIT according to EN 60695-2-13	775		
Temperature for the ball pressure test according to EN 60695-10-2	125 °C		
aterial data – actuating element			
Color (Actuating element)	green (6021)		
nensions			
Dimensional drawing	h P		
Pitch	5.08 mm		
Width [w]	83.82 mm		
Height [h]	17.7 mm		

16.9 mm

14.2 mm

3.5 mm

0.7 x 1 mm

5.08 mm

1.3 mm

Linear pinning

### Electrical tests

PCB design

Pin spacing
Hole diameter

Length [I]

Installed height

Pin dimensions

Solder pin length [P]



1870695

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#### Air clearances and creepage distances |

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Insulating material group	I
Rated insulation voltage (III/3)	250 V
Rated surge voltage (III/3)	4 kV
Rated insulation voltage (III/2)	400 V
Rated surge voltage (III/2)	4 kV
Rated insulation voltage (II/2)	630 V
Rated surge voltage (II/2)	4 kV

#### Environmental and real-life conditions

#### Ambient conditions

Ambient temperature (operation)	-40 °C 100 °C (Depending on the current carrying capacity/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

Type of packaging	packed in cardboard
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1870695

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## **Approvals**

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CSA Approval ID: 13631				
	Nominal voltage U <sub>N</sub>	Nominal current I <sub>N</sub>	Cross section AWG	Cross section mm <sup>2</sup>
Use group B				
	300 V	10 A	28 - 12	-
Use group D				
	300 V	10 A	28 - 12	-

CULus Recognized Approval ID: E60425-19941111				
	Nominal voltage U <sub>N</sub>	Nominal current I <sub>N</sub>	Cross section AWG	Cross section mm <sup>2</sup>
Use group B				
	250 V	10 A	26 - 12	-
Use group D				
	300 V	10 A	26 - 12	-

KEMA-KEUR Approval ID: 2160724	KEMA-KEUR Approval ID: 2160724.01				
	Nominal voltage U <sub>N</sub>	Nominal current I <sub>N</sub>	Cross section AWG	Cross section mm <sup>2</sup>	
Only flexible conductors	250 V	-	-	0.2 - 1.5	
Only rigid conductors	250 V	-	-	0.2 - 2.5	



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## Classifications

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	ECLASS-13.0	27460101		
ETIM				
	ETIM 9.0	EC002643		
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%			

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