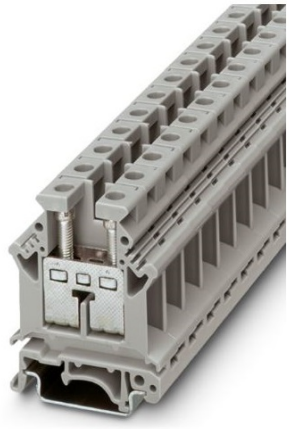
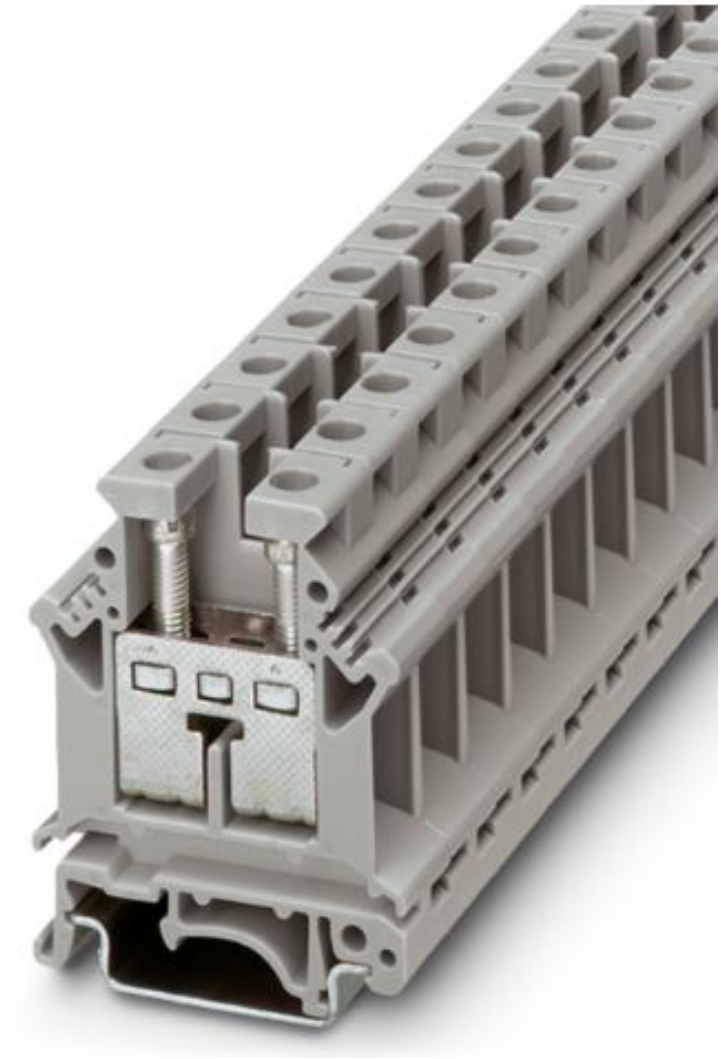


PHOENIX CONTACT UK 16 N Feed-Through Terminal Block Instruction Manual

Contents

PHOENIX TAGLINEHERE

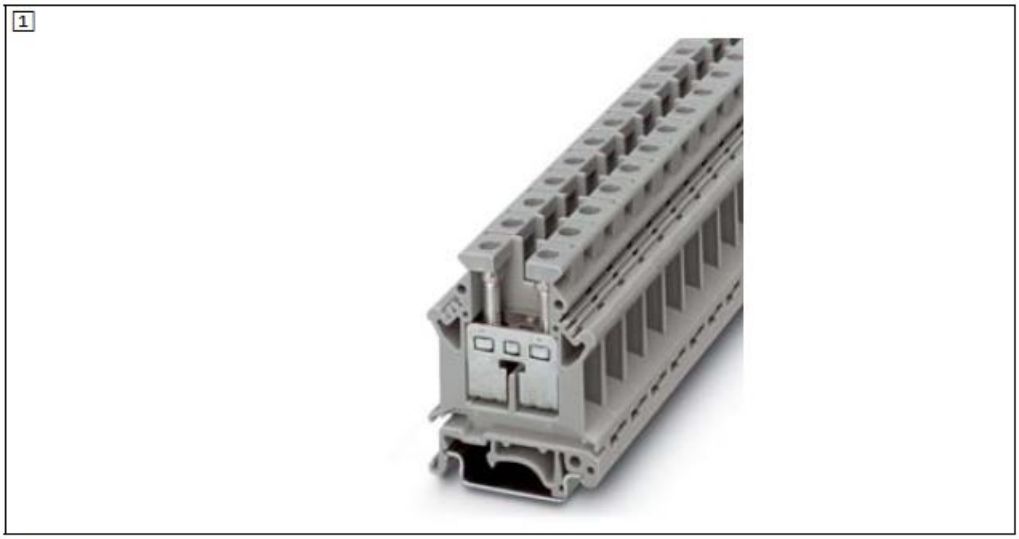
PHOENIX CONTACT UK 16 N Feed-Through Terminal Block



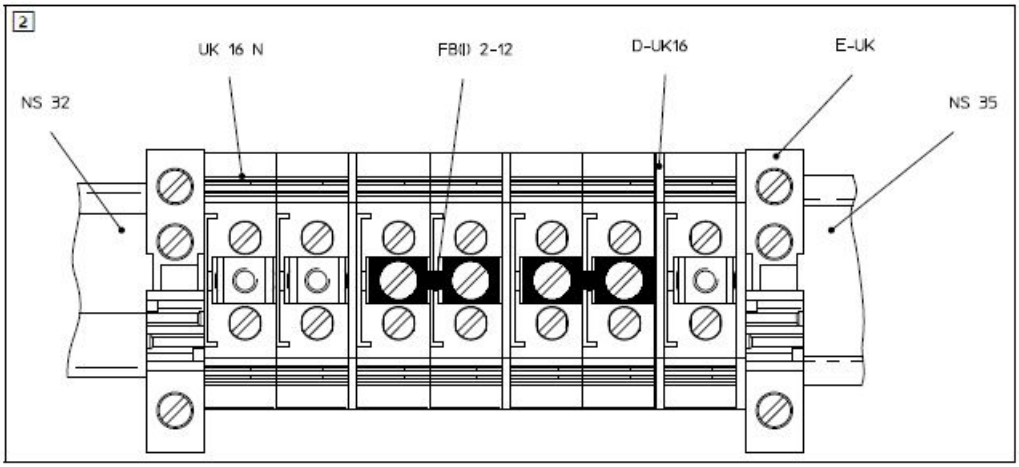
Installation notes for electricians

UK 16 N **3006043**

1



2



Feed-through terminal block with screw connection for use in potentially explosive areas The terminal is designed for connecting and linking copper wires in wiring spaces with “eb”, “ec” or “nA” types of protection.

Installation instructions Increased safety “e”

The terminal block must be installed in a housing which is suitable for the type of protection. **Depending on the type of protection, the housing must meet the follow-ing requirements:**

- Flammable gases: IEC/EN 60079-0 and IEC/EN 60079-7
- Combustible dust: IEC/EN 60079-0 and IEC/EN 60079-31

When arranging terminal blocks of other series and sizes, as well as other certified components in rows, ensure that the required air clearances and creepage dis-tances are observed. You may install the terminal block in equipment with temperature class T6 (e.g. branch or junction boxes). The rated values must be adhered to. The ambient tem-perature at the installation position may not exceed +40°C. The terminal block may also be installed in equipment with temperature classes T1 to T5. For applications in temperature classes T1 to T4, ensure compliance with the highest permissible operating temperature at the insulating parts (see Technical Data, “Installation temperature range”).

Installation and connection

Installation on the DIN rail

Snap the terminal blocks onto a corresponding DIN rail. For optical or electrical iso-lation, partition plates or covers can be inserted between the terminal blocks. When the terminal blocks are arranged in rows, fit the end terminal with the open half of the housing with the corresponding cover. If the terminal strip is not pro-tected against twisting, slipping or moving by other certified components, it must be fixed on both sides with one of the specified end brackets (see accessories). Observe the accompanying example when installing the accessories.

Note: When fixing terminal blocks with other certified components, ensure that the required air clearances and creepage distances are observed.

Use of bridges

To form terminal block groups with the same potential, connect the desired number of positions. Mount the fixed bridge (FB…) into the bridge shaft of the terminal blocks. Tighten the bridge screws with the specified torque.

NOTE: Observe the maximum rated currents when using jumpers (see technical data)!

Connecting the conductors

Strip the conductors to the specified length (see technical data). Stranded conduc-tors can be fitted with ferrules. Crimp the ferrules using crimping pliers and ensure that the test requirements listed in DIN 46228 Part 4 are met. The length of the cop-per ferrules must equal the specified conductor stripping length. Insert the conduc-tor into the terminal point up to the stop. Tighten the screw of the terminal point (tool recommendation, see accessories), adhere to the specified torque range. Recommendation: tighten all screws including those which are on terminal points that are not used.

For further information, s

Certificate of conformity

- further certificates
- Reference to the general safety notes

Technical data

Technical data
EU-type examination certificate
IECEx certificate
Marking on the product
Operating temperature range
Rated insulation voltage
Rated voltage
- for bridging with bridge
Temperature increase
Contact resistance
Rated current
Maximum load current
Connection capacity
Rated cross section
Connection capacity rigid
Connection capacity flexible
2 conductors with same cross section, rigid
2 conductors with same cross section, flexible
Stripping length
Torque
Accessories / Type / Item No.
End cover / D-UK 16 / 3006027
Screwdriver / SZS 1,0X4,0 VDE / 1205066
End clamp / E/UK / 1201442
Fixed bridge / FBI 2-12 / 0200075 Fixed bridge / FBI 10-12 / 0203454

Attestation of Conformity

The above-mentioned product conforms with the most important requirements of directive 2014/34/EU (ATEX directive) and its amending directives. **The following relevant standards were consulted for evaluating the conformity:**

- IEC 60079-0/EN 60079-0
- IEC 60079-7/EN 60079-7

For the complete list of relevant standards, including the issue status, see attesta-tion of conformity. This is available in the download area under the category Man-ufacturer's Declaration. Conformance with the provisions of the **ATEX directive was certified by the follow-ing notified body:**

DEKRA Certification B.V., P.O. Box 5185, 6802 ED Arnhem, Meander 1051, 6825 MJ Arnhem, NETHERLANDS [ID No. 0344]

Further valid certificates

Country	Notified body	Certificate no. / file no.
USA/Canada	UL	E 192998
Brazil	Inmetro	DNV 19.0101 U
China	NEPSI	GYJ20.1195U

Technical data/requirements in accordance with UL and CSA standards

For applications in North America, these installation instructions apply with the following additions:

USR:	UL 60079-0, fourth edition / UL 60079-7, sec- ond edition
CNR:	CAN / CSA E 60079-0:02, CAN/CSA E 60079- 7:03
Voltage V	600
Maximum load current A	85
Connectable conductor cross sections	AWG 22-4 rigid and flexible copper conductors
Conductor connection method	Factory and field wiring
Marking	USR: Class I, Zone I, AEx e IIC Gb/ CNR: Ex e IIC Gb

Acceptance criteria

- The suitability of the mounting equipment and the mounting method must be as-sessed in the end application.
- The connection cables at the terminal blocks must be adequately insulated for the voltages. The clearance between conductor insulation and the metal of the ter-minal point may not exceed 1 mm (see stripping length).
- During operation, the terminal blocks may not be used in an ambient temperature lower than -60°C or higher than +110°C.
- The terminal blocks have been rated for use in a housing with a minimum require-ment of IP54. The suitability of the housing for the end application for increased safety is to be taken into consideration.
- The terminal points for the external connections of these terminal blocks have been rated in accordance with ANSI/UL 486E “Equipment Wiring Terminals for Use with Aluminum and/or Copper Conductors”. The suitability of the terminal points must be assessed during the final acceptance.
- The air clearances and creepage distances between bare live parts with different potentials are to be taken into consideration in the end application.
- The suitability of the terminal blocks is to be confirmed via a temperature-rise test in the end application.
- If used in connection and junction boxes, the specified design and installation regulations must be taken into consideration.

Safety notes

NOTE: Observe the general safety notes. These are available in the down-load area in the ‘Safety notes’ category.

Document valid for all color versions!

Documents / Resources

	PHOENIX CONTACT UK 16 N Feed-Through Terminal Block [pdf] Instruction Manual UK 16 N Feed-Through Terminal Block, UK 16 N, Feed-Through Terminal Block, Terminal Block , Block

References

- Phoenix Contact USA