



IECEx Certificate of Conformity

INTERNATIONAL ELECTROTECHNICAL COMMISSION IEC Certification System for Explosive Atmospheres

for rules and details of the IECEx Scheme visit www.iecex.com

Certificate No.: **IECEx UL 09.0016X** Page 1 of 4 Certificate history:
Status: **Current** Issue No: 5 [Issue 4 \(2018-02-20\)](#)
Date of Issue: 2019-12-16 [Issue 3 \(2017-11-17\)](#)
[Issue 2 \(2015-02-25\)](#)
[Issue 1 \(2013-07-24\)](#)
[Issue 0 \(2009-07-13\)](#)
Applicant: **Adalet/Scott Fetzer Co.**
4801 W. 150th Street
Cleveland, OH 44135
United States of America
Equipment: **Terminal Enclosures - Type TN***
Optional accessory:
Type of Protection: **Increased Safety "eb" and Dust Ignition Protection by Enclosure "tb"**
Marking: Ex eb IIC T6...T4 Gb
Ex tb IIIC T120°C Db IP66
-50 °C to +70 °C for T4
-50°C to +60°C for T4
-50 °C to +55 °C for T5
-50°C to +40°C for T6

Approved for issue on behalf of the IECEx
Certification Body:

Lucy Frieders

Position:

Staff Engineer

Signature:
(for printed version)

Date:

2019-12-16

1. This certificate and schedule may only be reproduced in full.
2. This certificate is not transferable and remains the property of the issuing body.
3. The Status and authenticity of this certificate may be verified by visiting www.iecex.com or use of this QR Code.



Certificate issued by:

UL LLC
333 Pfingsten Road
Northbrook IL 60062-2096
United States of America





IECEX Certificate of Conformity

Certificate No.: **IECEX UL 09.0016X**

Page 2 of 4

Date of issue: 2019-12-16

Issue No: 5

Manufacturer: **Adalet/Scott Fetzer Co.**
4801 W. 150th Street
Cleveland, OH 44135 USA
United States of America

Additional
manufacturing
locations:

This certificate is issued as verification that a sample(s), representative of production, was assessed and tested and found to comply with the IEC Standard list below and that the manufacturer's quality system, relating to the Ex products covered by this certificate, was assessed and found to comply with the IECEx Quality system requirements. This certificate is granted subject to the conditions as set out in IECEx Scheme Rules, IECEx 02 and Operational Documents as amended

STANDARDS :

The equipment and any acceptable variations to it specified in the schedule of this certificate and the identified documents, was found to comply with the following standards

IEC 60079-0:2011 Explosive atmospheres - Part 0: General requirements
Edition:6.0

IEC 60079-31:2013 Explosive atmospheres - Part 31: Equipment dust ignition protection by enclosure "t"
Edition:2

IEC 60079-7:2015 Explosive atmospheres – Part 7: Equipment protection by increased safety "e"
Edition:5.0

This Certificate **does not** indicate compliance with safety and performance requirements other than those expressly included in the Standards listed above.

TEST & ASSESSMENT REPORTS:

A sample(s) of the equipment listed has successfully met the examination and test requirements as recorded in:

Test Report:

[US/UL/ExTR09.0018/05](#)

Quality Assessment Report:

[US/UL/QAR08.0003/09](#)



IECEx Certificate of Conformity

Certificate No.: **IECEx UL 09.0016X**

Page 3 of 4

Date of issue: 2019-12-16

Issue No: 5

EQUIPMENT:

Equipment and systems covered by this Certificate are as follows:

The Type TN series of enclosures are junction boxes provided with increased safety terminal blocks. These enclosures are manufactured of powder coated cold rolled steel, brushed finish stainless steel 304 and brushed finish steel 316L respectively and are available in various sizes and depths. The boxes consist of a cover, hinge assembly, body, grounding lug, gland plates and gaskets. The enclosures may be mounted in a vertical or horizontal position and can be fitted with up to eight gland plates.

Please see Annex for more additional information.

SPECIFIC CONDITIONS OF USE: YES as shown below:

- This certificate applies to equipment without cable/conduit entries. When installing cable or conduit entries, the cable/conduit entries must be certified as increased safety or flameproof, for protection type 'tb', and have a minimum IP66 rating. All unused conduit openings must be fitted with a certified close up plug equivalent of the apparatus and must be marked with an IP66 rating.
- The number of conductors entering the enclosure plus the number of internal connections (bridges and ground conductors are not counted) shall not exceed that of the Enclosure Size Terminal Content sheets.
- After installation, all creepage distances and clearances shall be according to Table 1 in IEC 60079-7, Fifth Edition.
- All conductors/cables shall be copper and shall be suitable for: 80°C when $-50^{\circ}\text{C} \leq T_a \leq +40^{\circ}\text{C}$, 95°C when $-50^{\circ}\text{C} \leq T_a \leq +55^{\circ}\text{C}$, 100°C when $-50^{\circ}\text{C} \leq T_a \leq +60^{\circ}\text{C}$, 110°C when $-50^{\circ}\text{C} \leq T_a \leq +70^{\circ}\text{C}$.
- Each terminal block shall not be specified to accommodate more than one individual conductor in a clamping point unless specifically designed and assessed for doing so.
- For screwless connections intended for Class 5 or Class 6 fine stranded conductors according to IEC 60228, the fine stranded wire shall be equipped with a ferrule or the termination shall have a method to open the clamping mechanism so that the conductors are not damaged during installation of the conductor.
- The end user shall provide bonding means as necessary.
- See enclosure outline for conduit/cable layout information, minimum wire bending requirements, and minimum electrical clearance.
- To minimize the risk of electrostatic charge, provisions shall be made for adequate grounding and equipment shall be installed in such a manner so that accidental discharge shall not occur.

Please see Annex for additional information.



IECEX Certificate of Conformity

Certificate No.: **IECEX UL 09.0016X**

Page 4 of 4

Date of issue: 2019-12-16

Issue No: 5

DETAILS OF CERTIFICATE CHANGES (for issues 1 and above)

Issue 1: Update to the latest standards, updated allowable enclosure sizes, addition of terminal blocks and updated to "tb" dust protection.

Issue 2: Updating DS589TB for the populated TN enclosures.

Issue 3: Certification updated to latest editions of IEC 60079-7 and IEC 60079-31. The TN series component enclosures utilized by the TN Populated Terminal enclosures were updated with a new enclosure cover to body gasket.

Issue 4: Revise paperwork, which does not affect previous assessment.

Issue 5: Minor drawing updates.

Annex:

[Annex to IECEx UL 09.0016X Issue 5.pdf](#)



IECEX Certificate of Conformity

Certificate No.: IECEx UL 09.0016X

Issue No.: 5

Page 1 of 3

TYPE DESIGNATION

Nomenclature for Type TN:

TN4	-18	18	08	-A	R0010
I	II	III	IV	V	VI

I – Enclosure Material

TN4 – Powder Coated Cold Rolled/Hot Rolled Steel
TN4X – Brushed Finish Stainless Steel 304
TN4X6 – Brushed Finish Stainless Steel 316L

II – Enclosure Length

XX – Any two-digit number that indicates the outside box length (in inches) (Max. 60 in. (1530mm))

III – Enclosure Width

XX – Any two-digit number that indicates the outside box width (in inches) (max. 36 in. (914 mm))

IV – Enclosure Depth

XX – Any two-digit number that indicates the outside box depth (in inches) (max. 36 in. (914 mm))

V – Gland Plate Location(s)*

A – Gland plate on top side
B – Gland plate on bottom side
C – Gland plate on left side
D – Gland plate on right side
*Omit dashes when multiple Gland Plates are installed

VI – Adalet Assembly Part Number

XXXXX – Any five-digit alphanumeric characters

PARAMETERS RELATING TO THE SAFETY

Maximum Voltage 1.1 kV



IECEX Certificate of Conformity


Certificate No.: IECEx UL 09.0016X

Issue No.: 5

Page 2 of 3

MARKING

Marking has to be readable and indelible; it has to include the following indications:

ADALET			
a Scott Fetzer company			
<small>4801 WEST 150TH STREET CLEVELAND, OH 44135</small>			
CE 0539 Ⓢ II 2 G Ex eb IIC T <input type="checkbox"/> Gb	Ex eb IIC T <input type="checkbox"/> Gb		
CE 0539 Ⓢ II 2 D Ex tb IIIC T120°C Db IP66	Ex tb IIIC T120°C Db IP66		
DEMKO 13 ATEX 1209263X	IECEX UL 09.0016X		
Cat # <input type="text"/>	YEAR <input type="text"/>		
Ser # <input type="text"/>	<input type="text"/>		
MAX VOLTAGE	MAX AMPERAGE	MAX # OF CONDUCTORS	MIN CONDUCTOR SIZE
<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>
	Class I, Zone 1, AEx eb IIC T <input type="checkbox"/> Gb		-50 ≤ Ta ≤ <input type="text"/> °C
LISTED 182L	Ex eb IIC T <input type="checkbox"/> Gb X		Class I, Div. 2, Groups ABCD
Justification and Pull Box for Hazardous Locations	Type 4X, 3, 3R, & 12		Class II, Div. 2, Groups FG

ROUTINE EXAMINATIONS AND TESTS

Routine tests according to IEC 60079-7 cl. 7.1 are not required, as they are performed for the terminal blocks detailed on DS589TB under their own certification.



IECEX Certificate of Conformity

Certificate No.: IECEx UL 09.0016X

Issue No.: 5

Page 3 of 3

LIST OF CERTIFIED COMPONENTS

The following additional previous editions of Standards noted under the "Standards" section of this Certificate were applied to integral Components as itemized below. There are no significant safety related changes between these previous editions and the editions noted under the "Standards" section.

Terminal Block, Part No. ST 1.5 (-PE), manufactured by Phoenix Contact	IEC 60079-7:2006-07, IEC 60079-0:2011
Terminal Block, Part No. ST 2.5 (-PE), manufactured by Phoenix Contact	IEC 60079-7:2006-07, IEC 60079-0:2011
Terminal Block, Part No. ST 4/6 (-PE), manufactured by Phoenix Contact	IEC 60079-7:2006-07, IEC 60079-0:2011
Terminal Block, Part No. UK 10N, UK35, UKH 50-95, manufactured by Phoenix Contact	IEC 60079-7:2006-07, IEC 60079-0:2011
Terminal Block, Part No. UKH 150, UKH 240, manufactured by Phoenix Contact	IEC 60079-7:2006-07, IEC 60079-0:2011
Terminal Block, Part No. UT 2.5/35 (-PE), manufactured by Phoenix Contact	IEC 60079-7:2006-07, IEC 60079-0:2011
Terminal Block, Part No. 1492-J, manufactured by Rockwell	IEC 60079-7:2001, IEC 60079-0:2004
Terminal Block, Part No. 1492-L, manufactured by Rockwell	IEC 60079-7:2001, IEC 60079-0:2004
Terminal Block, Part No. SAK (KrG), Manufactured by Weidmuller	IEC 60079-7:2001, IEC 60079-0:2004
Terminal Block, Part No. SAKK, Manufactured by Weidmuller	IEC 60079-7:2001, IEC 60079-0:2004
Terminal Block, Part No. WDU, WDK, WPE 2.5-70, Manufactured by Weidmuller	IEC 60079-7:2001, IEC 60079-0:2004
Terminal Block, Part No. WDU, WPE 2.5-35, 35-50N, Manufactured by Weidmuller	IEC 60079-7:2006-07, IEC 60079-0:2011
Terminal Block, Part No. WDU, 2.5T/C, Manufactured by Weidmuller	IEC 60079-7:2001, IEC 60079-0:2004
Terminal Block, Part No. WFF, Manufactured by Weidmuller	IEC 60079-7:2001, IEC 60079-0:2004
Terminal Block, Part No. ZB, Manufactured by Weidmuller	IEC 60079-7:2006, IEC 60079-0:2007
Terminal Block, Part No. ZDU, ZDK, ZPE, Manufactured by Weidmuller	IEC 60079-7:2001, IEC 60079-0:2004
Terminal Block, Part No. ZDUB 2.5-2/2AN, 2.5-2/4AN, Manufactured by Weidmuller	IEC 60079-7:2001, IEC 60079-0:2004