

Irish Standard I.S. EN 61754-6:2013

Fibre optic interconnecting devices and passive components - Fibre optic connector interfaces -- Part 6: Type MU connector family

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#### **EUROPEAN STANDARD**

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English version

# Fibre optic interconnecting devices and passive components Fibre optic connector interfaces Part 6: Type MU connector family

(IEC 61754-6:2013)

Dispositifs d'interconnexion et composants passifs à fibres optiques - Interfaces de connecteurs à fibres optiques (CEI 61754-6:2013)

Lichtwellenleiter -Verbindungselemente und passive Bauteile - Steckgesichter von Lichtwellenleiter-Steckverbindern -Teil 6: Bauart MU-Steckverbinderfamilie (IEC 61754-6:2013)

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#### **Foreword**

The text of document 86B/3627/FDIS, future edition 2 of IEC 61754-6, prepared by subcommittee 86B "Fibre optic interconnecting devices and passive components" of IEC/TC 86 "Fibre optics" was submitted to the IEC-CENELEC parallel vote and approved by CENELEC as EN 61754-6:2013.

The following dates are fixed:

•	latest date by which the document has to be implemented at national level by publication of an identical national standard or by endorsement	(dop)	2014-05-26
•	latest date by which the national standards conflicting with the	(dow)	2014-08-26

This document supersedes EN 61754-6:1997 + A1:2001 + A2:2005.

EN 61754-6:2013 includes the following significant technical changes with respect to EN 61754-6:1997 + A1:2001 + A2:2005 :

a) addition of standard references;

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NOTE When an international publication has been modified by common modifications, indicated by (mod), the relevant EN/HD applies.

<u>Publication</u>	<u>Year</u>	<u>Title</u>	EN/HD	<u>Year</u>
IEC 61755-3-1		Fibre optic interconnecting devices and passive components -Fibre optic connector optical interfaces - Part 3-1:Connectors with 2,5 mm and 1,25 mm diameter cylindrical full zirconia ferrule, non-angled single mode non-dispersion shifted fibres	prEN 61755-3-1 <sup>1)</sup>	
IEC 61755-3-2		Fibre optic interconnecting devices and passive components -Fibre optic connector optical interfaces - Part 3-2: Connectors with 2,5 mm and 1,25 mm diameter cylindrical full zirconia ferrule, angled single mode non-dispersion shifted fibres	prEN 61755-3-2 <sup>1)</sup>	

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<sup>1)</sup> At draft stage.

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IEC 61754-6

Edition 2.0 2013-07

# INTERNATIONAL STANDARD

Fibre optic interconnecting devices and passive components – Fibre optic connector interfaces –

Part 6: Type MU connector family





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## INTERNATIONAL STANDARD

Fibre optic interconnecting devices and passive components – Fibre optic connector interfaces –

Part 6: Type MU connector family

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#### -2-

### CONTENTS

FO	REWORD	5
1	Scope	7
2	Normative references	7
3	Description	7
4	Interfaces	7
Anr	nex A (informative) Configuration of type MU-A connector set	74
Anr	nex B (informative) Configuration of type MU-B connector set	75
Anr	nex C (informative) Floating 2-port connector plug	76
Bib	liography	77
Fig	ure 1 – Simplex plug connector interface – Push/pull	11
Fig	ure 2 – 4,5 mm duplex plug connector interface – Push/pull	14
Fig	ure 3 – Simplex adaptor connector interface – Push/pull	17
Fig	ure 4 – Gauge pin for resilient alignment sleeve	19
Fig	ure 5 – 4,5 mm duplex adaptor connector interface – Push/pull	20
Fig	ure 6 – 8-port adaptor connector interface – Push/pull	23
Fig	ure 7 – Plug connector interface – For printed board housings	25
Fig	ure 8 – Sleeve holder interface	27
Fig	ure 9 – 2-port backplane housing interface	30
Fig	ure 10 – 2-port printed board housing interface	34
Fig	ure 11 – 8-port backplane housing interface	37
Fig	ure 12 – 8-port printed board housing interface	41
Fig	ure 13 – Simplex active device receptacle interface	43
Fig	ure 14 – Detail of the mechanical stop for rigid bore alignment feature	45
Fig	ure 15 – 4,5 mm duplex active device receptacle interface	46
Fig	ure 16 – Detail of the mechanical stop for rigid bore alignment feature	48
Fig	ure 17 – 6,25 mm duplex active device receptacle interface	49
Fig	ure 18 – Detail of the mechanical stop for rigid bore alignment feature	51
Fig	ure 19 – Plug connector interface for printed board housings, APC	53
Fig	ure 20 - Simplex plug connector interface - Push/pull, APC	56
Fig	ure 21 – 4,5 mm duplex plug connector interface – Push/pull, APC	59
Fig	ure 22 – 6,25 mm duplex plug connector interface – Push/pull, APC	62
Fig	ure 23 – 6,25 mm duplex plug connector interface – Push/pull	64
Fig	ure 24 – 6,25 mm duplex adaptor connector interface	67
Fig	ure 25 – Horizontal duplex plug connector interface – Push/pull	69
Fig	ure 26 – Horizontal duplex adaptor connector interface	72
Fig	ure A.1 – Configuration of type MU-A connector set	74
Fig	ure B.1 – Configuration of type MU-B connector set	75
Fig	ure C.1 – Floating 2-port connector plug	76
Tab	ble 1 – MU-A connector set	9

Table 2 – MU-B connector set	9
Table 3 – MU receptacles	10
Table 4 – Dimensions of the simplex plug connector interface	12
Table 5 – Grade	13
Table 6 – Dimensions of the 4,5 mm duplex plug connector interface	15
Table 7 – Grade	16
Table 8 – Dimensions of the simplex adaptor connector interface	18
Table 9 – Grade	18
Table 10 – Gauge pin dimensions	19
Table 11 – Dimensions of the 4,5 mm duplex adaptor connector interface	21
Table 12 – Grade	22
Table 13 – Dimensions of the 8-port adaptor connector interface	24
Table 14 – Grade	24
Table 15 – Dimensions of the plug connector interface	
Table 16 – Grade	26
Table 17 – Dimensions of the sleeve holder interface	28
Table 18 – Grade	28
Table 19 – Dimensions of the 2-port backplane housing interface)	31
Table 20 – Grade	32
Table 21 – Dimensions of the 2-port printed board housing interface	35
Table 22 – Dimensions of the 8-port backplane housing interface	38
Table 23 – Grade	39
Table 24 – Dimensions of the 8-port printed board housing interface	42
Table 25 – Dimensions of the simplex active device receptacle interface	44
Table 26 – Alignment feature grade	45
Table 27 – Dimensions of the mechanical stop for rigid bore alignment feature	45
Table 28 – Mechanical stop feature grade	46
Table 29 – Dimensions of the 4,5 mm duplex active device receptacle interface	47
Table 30 – Alignment feature grade	48
Table 31 – Dimensions of the mechanical stop for rigid bore alignment feature	48
Table 32 – Mechanical stop feature grade	49
Table 33 – Dimensions of the 6,25 mm duplex active device receptacle interface	50
Table 34 – Alignment feature grade	51
Table 35 – Dimensions of the mechanical stop for rigid bore alignment feature	51
Table 36 – Mechanical stop feature grade	52
Table 37 – Dimensions of the plug connector interface for printed board housings, APC	54
Table 38 – Dimensions of the simplex plug connector interfaces, APC	57
Table 39 – Dimensions of the 4,5 mm duplex plug connector interfaces, APC	60
Table 40 – Dimensions of the 6,25 mm duplex plug connector interface, APC	63
Table 41 – Dimensions of the 6,25 mm duplex plug connector interface	65
Table 42 – Grade	
Table 43 – Dimensions of the 6,25 mm duplex adaptor connector interface	68
Table 44 – Grade	68

**-4-**

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Table 45 – Dimensions of the horizontal duplex plug connector interface	.70
Table 46 – Grade	.71
Table 47 – Dimensions of the horizontal duplex adaptor connector interface	73
Table 48 – Grade	.73
Table C.1 – Dimensions table for 2-port connector plug	76

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- 5 -

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# FIBRE OPTIC INTERCONNECTING DEVICES AND PASSIVE COMPONENTS – FIBRE OPTIC CONNECTOR INTERFACES –

Part 6: Type MU connector family

#### **FOREWORD**

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International Standard IEC 61754-6 has been prepared by subcommittee 86B: Fibre optic interconnecting devices and passive components, of IEC technical committee 86: Fibre optics.

This second edition cancels and replaces the first edition published in 1997 and constitutes a technical revision.

This edition includes the following significant technical changes with respect to the previous edition:

- a) addition of standard references;
- b) revision of intermateability.

**-6-**

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The text of this standard is based on the following documents:

FDIS	Report on voting
86B/3627/FDIS	86B/3662/RVD

Full information on the voting for the approval of this standard can be found in the report on voting indicated in the above table.

This publication has been drafted in accordance with the ISO/IEC Directives, Part 2.

A list of all parts of the IEC 61754 series, under the general title *Fibre optic interconnecting devices and passive components – Fibre optic connector interfaces,* can be found on the IEC website.

Future standards in this series will carry the new general title as cited above. Titles of existing standards in this series will be updated at the time of the next edition.

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**-7-**

# FIBRE OPTIC INTERCONNECTING DEVICES AND PASSIVE COMPONENTS – FIBRE OPTIC CONNECTOR INTERFACES –

Part 6: Type MU connector family

#### 1 Scope

This part of IEC 61754 defines the standard interface dimensions for type MU family of connectors.

#### 2 Normative references

The following documents, in whole or in part, are normatively referenced in this document and are indispensable for its application. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

IEC 61755-3-1, Fibre optic connector optical interfaces – Part 3-1:Optical interface, 2,5 mm and 1,25 mm diameter cylindrical full zirconia PC ferrule, single mode fibre

IEC 61755-3-2, Fibre optic connector optical interfaces — Part 3-2: Optical interface, 2,5 mm and 1,25 mm diameter cylindrical full zirconia ferrules for 8 degrees angled-PC single mode fibres

#### 3 Description

The parent connector for type MU connector family is a miniature single-position plug which is characterized by a cylindrical, spring-loaded butting ferrule(s) of a 1,25 mm typical diameter, and a push-pull coupling mechanism. The optical alignment mechanism of the connectors is of a rigid hole or a resilient sleeve style.

This part 6 type MU connector family defines the standard interface dimensions of active device receptacles for the type MU connectors. The receptacles are used to retain the connector plugs and mechanically maintain the optical datum target of the plugs at a defined position within the receptacle housings.

#### 4 Interfaces

This standard contains the following standard interfaces.

Interface IEC 61754-6-1: Simplex plug connector interface – Push/pull (See Figure 1)

Interface IEC 61754-6-2: 4,5 mm duplex plug connector interface – Push/pull (See Figure 2)

Interface IEC 61754-6-3: Simplex adaptor connector interface – Push/pull (See Figure 3)

Interface IEC 61754-6-4: 4,5 mm duplex adaptor connector interface – Push/pull (See Figure 5)

Interface IEC 61754-6-5: 8-port adaptor connector interface – Push/pull (See Figure 6)

Interface IEC 61754-6-6: Plug connector interface – for printed board housings (See Figure 7)

Interface IEC 61754-6-7: Sleeve holder interface – for printed board housings (See Figure 8)

Interface IEC 61754-6-8: 2-port backplane housing interface – Self-retentive (See Figure 9)



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