



SLOVENSKI STANDARD
oSIST prEN 4734-101:2024
01-maj-2024

Aeronavtika - Mehanski prenosni kontakt, optični kontakt - Multi konektorji - 101.
del: MT moški 12-polni kontakt - Tehnična specifikacija

Aerospace series - Mechanical transfer contact, fibre optic contact Multi connectors -
Part 101: MT male contact 12 ways - Technical specification

Luft- und Raumfahrt - Haupt-Element - Teil 101: Technische Lieferbedingungen

Série aérospatiale - Contact à transfert mécanique, connecteurs à contact à fibre optique
multivoies - Partie 101 : Contact MT mâle 12 voies - Spécification technique

Ta slovenski standard je istoveten z: prEN 4734-101

<https://standards.iteh.ai/catalog/standards/sist/4f5851ed-5d42-49cb-b291-0c095eb1bd18/osist-pren-4734-101-2024>

ICS:

49.060	Letalska in vesoljska električna oprema in sistemi	Aerospace electric equipment and systems
--------	---	---

oSIST prEN 4734-101:2024

en,fr,de

EUROPEAN STANDARD
NORME EUROPÉENNE
EUROPÄISCHE NORM

DRAFT
prEN 4734-101

November 2023

ICS 49.090

English Version

Aerospace series - Mechanical transfer contact, fibre optic contact Multi connectors - Part 101: MT male contact 12 ways - Technical specification

Aerospace séries - Contact fibre optique multivoies -
Partie 101 : Contact MT male 12 fibres - Spécification
technique

Luft- und Raumfahrt - Haupt-Element - Teil 101:
Technische Lieferbedingungen

This draft European Standard is submitted to CEN members for enquiry. It has been drawn up by the Technical Committee ASD-STAN.

If this draft becomes a European Standard, CEN members are bound to comply with the CEN/CENELEC Internal Regulations which stipulate the conditions for giving this European Standard the status of a national standard without any alteration.

This draft European Standard was established by CEN in three official versions (English, French, German). A version in any other language made by translation under the responsibility of a CEN member into its own language and notified to the CEN-CENELEC Management Centre has the same status as the official versions.

CEN members are the national standards bodies of Austria, Belgium, Bulgaria, Croatia, Cyprus, Czech Republic, Denmark, Estonia, Finland, France, Germany, Greece, Hungary, Iceland, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, Netherlands, Norway, Poland, Portugal, Republic of North Macedonia, Romania, Serbia, Slovakia, Slovenia, Spain, Sweden, Switzerland, Türkiye and United Kingdom.

Recipients of this draft are invited to submit, with their comments, notification of any relevant patent rights of which they are aware and to provide supporting documentation.

Warning : This document is not a European Standard. It is distributed for review and comments. It is subject to change without notice and shall not be referred to as a European Standard.



EUROPEAN COMMITTEE FOR STANDARDIZATION
COMITÉ EUROPÉEN DE NORMALISATION
EUROPÄISCHES KOMITEE FÜR NORMUNG

CEN-CENELEC Management Centre: Rue de la Science 23, B-1040 Brussels

Contents

Page

European foreword	3
1 Scope.....	4
2 Normative references.....	4
3 Terms and definitions.....	4
4 Fibre optic contact and definition.....	4
4.1 Contact composition	4
4.2 Contact dimensions and mass	6
4.3 Polarization keys	7
4.4 Mated contact force.....	7
4.5 Alignment	7
4.6 Interface	7
4.7 Cable retention	7
4.8 Mateability	7
5 Optical performance.....	8
5.1 Insertion loss.....	8
5.2 Return loss	8
5.3 Channel to channel consistency.....	9
6 Permissible cables.....	9
7 Technical specification	9
8 Tests according to EN 2591-100.....	9
9 Assembly process instructions	11
9.1 Cleaning instructions.....	11
9.2 Tooling.....	11
9.3 Termination instructions.....	12
10 Designation	13

European foreword

This document (prEN 4734-101:2023) has been prepared by the Aerospace and Defence Industries Association of Europe — Standardization (ASD-STAN).

After enquiries and votes carried out in accordance with the rules of this Association, this document has received the approval of the National Associations and the Official Services of the member countries of ASD-STAN, prior to its presentation to CEN.

This document is currently submitted to the CEN Enquiry.

iTeh Standards (<https://standards.iteh.ai>) Document Preview

[oSIST prEN 4734-101:2024](https://standards.iteh.ai/catalog/standards/sist/4f5851ed-5d42-49cb-b291-0c095eb1bd18/osist-pren-4734-101-2024)

<https://standards.iteh.ai/catalog/standards/sist/4f5851ed-5d42-49cb-b291-0c095eb1bd18/osist-pren-4734-101-2024>

prEN 4734-101:2023 (E)

1 Scope

This document specifies the performance and dimensions of MT male contact 12 ways for prEN 4733-001 connector specification.

2 Normative references

The following documents are referred to in the text in such a way that some or all of their content constitutes requirements of this document. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

EN 2591-X¹, *Aerospace series — Elements of electrical and optical connection — Test methods*

prEN 4733-001, *Aerospace series — Connectors, optical, rectangular, modular — Operating temperature 125 °C, for EN 4734-10X MT contacts — Part 001: Technical specification*²

EN 4641-501, *Aerospace series — Cable optical — 125 µm diameter cladding — Part 501: Outer diameter 2,7 mm, semi loose structure — 12 optical ways — fibre diameter 50 µm/125 µm — Product standard*³

CEI-IEC 61754-5, *International standard — Fibre optic connector interfaces — Part 5: Type MT connector family*

3 Terms and definitions

For the purposes of this document, the terms and definitions given in EN 2591-100 apply.

ISO and IEC maintain terminology databases for use in standardization at the following addresses:

- ISO Online browsing platform: available at <https://www.iso.org/obp/>
- IEC Electropedia: available at <https://www.electropedia.org/>

4 Fibre optic contact and definition

4.1 Contact composition

The different components which composed the MT male contact are shown in Figure 1.

¹ As specified in this document.

² In preparation at the date of publication of this standard.

³ In preparation at the date of publication of this standard.