SVENSK STANDARD

SS-EN IEC 60794-1-305, utg 1:2023

Fastställd	Sida	Ansvarig kommitté
2023-09-20	1 (12)	SEK TK 86

Optokablar – Del 1-305: Artspecifikation – Grundläggande provningsmetoder – Testmetoder för kablars beståndsdelar – Delningsbarhet för ribbon, metod G5

Optical fibre cables – Part 1-305: Generic specifications – Basic optical cable test procedures – Cable element test methods – Ribbon tear (separability), Method G5

Som svensk standard gäller europastandarden EN IEC 60794-1-305:2023. Den svenska standarden innehåller den officiella engelska språkversionen av EN IEC 60794-1-305:2023.

Nationellt förord

Europastandarden EN IEC 60794-1-305:2023

består av:

– **europastandardens ikraftsättningsdokument,** utarbetat inom CENELEC
– **IEC 60794-1-305, First edition, 2022 - Optical fibre cables – Part 1-305: Generic specifications – Basic optical cable test procedures – Cable element test methods – Ribbon tear (separability), Method G5**

utarbetad inom International Electrotechnical Commission, IEC.

Standarden ersätter tidigare fastställd svensk standard SS-EN IEC 60794-1-23, utg 2:2020 som ej gäller fr o m 2026-02-08.

ICS 33.180.10

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SEK Svensk Elstandard
Box 1284
164 29 Kista
Tel 08-444 14 00
www.elstandard.se

EUROPEAN STANDARD

NORME EUROPÉENNE

EUROPÄISCHE NORM

EN IEC 60794-1-305

February 2023

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Supersedes EN IEC 60794-1-23:2019 (partially)

English Version

Optical fibre cables - Part 1-305: Generic specification - Basic optical cable test procedures - Cable element test methods - Ribbon tear (separability), Method G5 (IEC 60794-1-305:2023)

Câbles à fibres optiques - Partie 1-305: Spécification générique - Procédures fondamentales d'essai des câbles optiques - Méthodes d'essai des éléments de câble - Déchirure du ruban (séparabilité), Méthode G5 (IEC 60794-1-305:2023)

Lichtwellenleiterkabel - Teil 1-305: Allgemeine Festlegungen - Grundlegende Prüfverfahren für Lichtwellenleiterkabel - Prüfverfahren für Kabelelemente - Bänderriss (Trennbarkeit), Verfahren G5 (IEC 60794-1-305:2023)

This European Standard was approved by CENELEC on 2023-02-08. CENELEC 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.

Up-to-date lists and bibliographical references concerning such national standards may be obtained on application to the CEN-CENELEC Management Centre or to any CENELEC member.

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

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

European Committee for Electrotechnical Standardization
Comité Européen de Normalisation Electrotechnique
Europäisches Komitee für Elektrotechnische Normung

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

Ref. No. EN IEC 60794-1-305:2023 E

SEK Svensk Elstandard

SS-EN IEC 60794-1-305, utg 1:2023

European foreword

The text of document 86A/2249/FDIS, future edition 1 of IEC 60794-1-305, prepared by SC 86A "Fibres and cables" of IEC/TC 86 "Fibre optics" was submitted to the IEC-CENELEC parallel vote and approved by CENELEC as EN IEC 60794-1-305:2023.

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) 2023-11-08
- latest date by which the national standards conflicting with the document have to be withdrawn (dow) 2026-02-08

This document supersedes (partially) EN IEC 60794-1-23:2019 and all of its amendments and corrigenda (if any).

Attention is drawn to the possibility that some of the elements of this document may be the subject of patent rights. CENELEC shall not be held responsible for identifying any or all such patent rights.

Any feedback and questions on this document should be directed to the users' national committee. A complete listing of these bodies can be found on the CENELEC website.

Endorsement notice

The text of the International Standard IEC 60794-1-305:2023 was approved by CENELEC as a European Standard without any modification.

Annex ZA
(normative)

Normative references to international publications with their corresponding European publications

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.

NOTE 1 Where an International Publication has been modified by common modifications, indicated by (mod), the relevant EN/HD applies.

NOTE 2 Up-to-date information on the latest versions of the European Standards listed in this annex is available here: www.cenelec.eu.

Publication	Year	Title	EN/HD	Year
IEC 60794-1-2	-	Optical fibre cables - Part 1-2: Generic specification - Basic optical cable test procedures - General guidance	EN IEC 60794-1-2	-
IEC 60794-1-31	-	Optical fibre cables - Part 1-31: Generic specification - Optical cable elements - Optical fibre ribbon	EN IEC 60794-1-31	-

IEC 60794-1-305

Edition 1.0 2023-01

INTERNATIONAL STANDARD

NORME INTERNATIONALE

Optical fibre cables –
Part 1-305: Generic specification – Basic optical cable test procedures – Cable element test methods – Ribbon tear (separability), Method G5

Câbles à fibres optiques –
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OPTICAL FIBRE CABLES –

Part 1-305: Generic specification – Basic optical cable test procedures – Cable element test methods – Ribbon tear (separability), Method G5

FOREWORD

1) The International Electrotechnical Commission (IEC) is a worldwide organization for standardization comprising all national electrotechnical committees (IEC National Committees). The object of IEC is to promote international co-operation on all questions concerning standardization in the electrical and electronic fields. To this end and in addition to other activities, IEC publishes International Standards, Technical Specifications, Technical Reports, Publicly Available Specifications (PAS) and Guides (hereafter referred to as "IEC Publication(s)"). Their preparation is entrusted to technical committees; any IEC National Committee interested in the subject dealt with may participate in this preparatory work. International, governmental and non-governmental organizations liaising with the IEC also participate in this preparation. IEC collaborates closely with the International Organization for Standardization (ISO) in accordance with conditions determined by agreement between the two organizations.
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IEC 60794-1-305 has been prepared by subcommittee 86A: Fibres and cables, of IEC technical committee 86: Fibre optics. It is an International Standard.

This first edition of IEC 60794-1-305 cancels and replaces method G5 of the second edition of IEC 60794-1-23 published in 2019. This edition constitutes a technical revision.

This edition includes the following significant technical changes with respect to the second edition of IEC 60794-1-23:2019:

a) the optical cable element test methods contained in IEC 60794-1-23:2019 will now be individually numbered in the IEC 60794-1-3xx series. Each test method is now considered to be an individual document rather than part of a multi-test method compendium. Full cross-reference details are given in IEC 60794-1-2.

The text of this International Standard is based on the following documents:

Draft	Report on voting
86A/2249/FDIS	86A/2271/RVD

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

The language used for the development of this International Standard is English.

This document was drafted in accordance with ISO/IEC Directives, Part 2, and developed in accordance with ISO/IEC Directives, Part 1 and ISO/IEC Directives, IEC Supplement, available at www.iec.ch/members_experts/refdocs. The main document types developed by IEC are described in greater detail at www.iec.ch/publications.

A list of all parts in the IEC 60794 series, published under the general title *Optical fibre cables*, can be found on the IEC website.

The committee has decided that the contents of this document will remain unchanged until the stability date indicated on the IEC website under webstore.iec.ch in the data related to the specific document. At this date, the document will be

- reconfirmed,
- withdrawn,
- replaced by a revised edition, or
- amended.

INTRODUCTION

The International Electrotechnical Commission (IEC) draws attention to the fact that it is claimed that compliance with this document may involve the use of a patent. IEC takes no position concerning the evidence, validity, and scope of this patent right.

The holder of this patent right has assured IEC that s/he is willing to negotiate licences under reasonable and non-discriminatory terms and conditions with applicants throughout the world. In this respect, the statement of the holder of this patent right is registered with IEC. Information may be obtained from the patent database available at http://patents.iec.ch.

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OPTICAL FIBRE CABLES –

Part 1-305: Generic specification – Basic optical cable test procedures – Cable element test methods – Ribbon tear (separability), Method G5

1 Scope

This part of IEC 60794 describes test procedures to be used in establishing uniform requirements for optical fibre ribbons as optical fibre cable elements for the mechanical property-tear (separability).

This document applies to optical fibre cables for use with telecommunication equipment and devices employing similar techniques, and to cables having a combination of both optical fibres and electrical conductors.

NOTE Throughout the document, the wording "optical cable" can also include optical fibre units, microduct fibre units, etc.

This test is applicable for edge-bonded ribbons and encapsulated ribbons specified in IEC 60794-1-31, and not intended to be used for partially-bonded ribbons.

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.

IEC 60794-1-2, *Optical fibre cables – Part 1-2: Generic specification – Basic optical cable test procedures – General guidance*

IEC 60794-1-31, *Optical fibre cables – Part 1-31: Generic specification – Optical cable elements – Optical fibre ribbon*