



SLOVENSKI STANDARD SIST EN 6059-505:2025

01-marec-2025

Aeronavtika - Električni kabli, namestitvev - Zaščitne obojke - Preskusne metode - 505. del: Udar strele ter tokovni in napetostni udar

Aerospace series - Electrical cables, installation - Protection sleeves - Test methods - Part 505: Lightning strike, current and voltage pulse

Luft- und Raumfahrt - Elektrische Leitungen, Installation - Schutzschläuche - Prüfverfahren - Teil 505: Blitzschlag, Strom- und Spannungsimpuls

Série aérospatiale - Câbles électriques, installation - Gains de protection - Partie 505 : Tenue à la foudre, impulsion de tension et de courant

Ta slovenski standard je istoveten z: EN 6059-505:2024

SIST EN 6059-505:2025

ICS:

29.060.20	Kabli	Cables
49.060	Letalska in vesoljska električna oprema in sistemi	Aerospace electric equipment and systems

SIST EN 6059-505:2025

en,fr,de

EUROPEAN STANDARD

EN 6059-505

NORME EUROPÉENNE

EUROPÄISCHE NORM

December 2024

ICS 49.060

English Version

Aerospace series - Electrical cables, installation - Protection sleeves - Test methods - Part 505: Lightning strike and current pulse

Série aérospatiale - Câbles électriques, installation -
Gaines de protection - Méthodes d'essais - Partie 505 :
Tenue à la foudre et impulsion de courant

Luft- und Raumfahrt - Elektrische Leitungen,
Installation - Schutzschläuche - Prüfverfahren - Teil
505: Blitzschlag und Stromimpuls

This European Standard was approved by CEN on 9 September 2024.

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. 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 CEN 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 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.

[SIST EN 6059-505:2025](https://standards.iteh.ai/catalog/standards/sist/cc4e0e29-07ca-4c81-8580-8b9d28ba29b8/sist-en-6059-505-2025)

<https://standards.iteh.ai/catalog/standards/sist/cc4e0e29-07ca-4c81-8580-8b9d28ba29b8/sist-en-6059-505-2025>



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

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

EN 6059-505:2024 (E)

Contents		Page
European foreword		3
1	Scope.....	4
2	Normative references.....	4
3	Terms and definitions.....	4
4	Preparation of specimens.....	4
4.1	Test specimen	4
4.2	High current test	6
5	Apparatus	6
6	Method.....	7
6.1	Pre-conditioning	7
6.2	Procedure	7
6.3	Final measurements	9
7	Requirements.....	9

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

[SIST EN 6059-505:2025](https://standards.iteh.ai/catalog/standards/sist/cc4e0e29-07ca-4c81-8580-8b9d28ba29b8/sist-en-6059-505-2025)

<https://standards.iteh.ai/catalog/standards/sist/cc4e0e29-07ca-4c81-8580-8b9d28ba29b8/sist-en-6059-505-2025>

European foreword

This document (EN 6059-505:2024) has been prepared by 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 shall be given the status of a national standard, either by publication of an identical text or by endorsement, at the latest by June 2025, and conflicting national standards shall be withdrawn at the latest by June 2025.

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

According to the CEN-CENELEC Internal Regulations, the national standards organizations of the following countries are bound to implement this document: 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 the United Kingdom.

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

[SIST EN 6059-505:2025](https://standards.iteh.ai/catalog/standards/sist/cc4e0e29-07ca-4c81-8580-8b9d28ba29b8/sist-en-6059-505-2025)

<https://standards.iteh.ai/catalog/standards/sist/cc4e0e29-07ca-4c81-8580-8b9d28ba29b8/sist-en-6059-505-2025>

EN 6059-505:2024 (E)**1 Scope**

This document specifies a method to measure the ability of a protective sleeve to withstand specified severities of simulated lightning strikes.

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 2267-010, *Aerospace series — Cables, electrical, for general purpose — Operating temperatures between -55 °C and 260 °C — Part 010: DR family, single UV laser printable — Product standard*

EN 3475-301, *Aerospace series — Cables, electrical, aircraft use — Test methods — Part 301: Ohmic resistance per unit length*

EN 3660-033, *Aerospace series — Cable outlet accessories for circular and rectangular electrical and optical connectors — Part 033: Stainless steel banding band, style Z, for attachment of individual and/or overall screens to cable outlets — Product standard*

EN 6059-201,¹ *Aerospace series — Electrical cables, installation — Protection sleeves — Test methods — Part 201: Visual inspection*

3 Terms and definitions

No terms and definitions are listed in this document.

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 Preparation of specimens**4.1 Test specimen**

Unless otherwise specified in the product standard, the smallest, medium and largest sleeve sizes shall be tested. Unless otherwise specified in the product standard, a minimum of 3 samples by size shall be tested.

The sleeve specimen shall be installed over a bundle with a diameter equal to the nominal sleeve size and made of DR EN 2267-010 cables with a minimum of 1 meter in length.

The conductive layer of the specimen, if multi-layer protection sleeves are tested, shall be crimped on both ends to a round conductive metal part. This round conductive metal part should be a feedthrough or cable outlet, compatible in fit, form and function to conduct the electrical current. This round conductive metal part shall be able to accept the nominal size of the sleeve and be resistant enough to sustain the pressure applied by the metal clamp of at least 6 mm in width of the EN 3660-033 stainless

¹ Published as ASD-STAN prEN at the date of publication of this document, available at: <https://www.asd-stan.org/>.