

### SLOVENSKI STANDARD SIST EN IEC 60512-28-100:2025

01-januar-2025

Konektorji za električno in elektronsko opremo - Preskusi in meritve - 28-100. del: Preskusi signalne celovitosti do 2000 MHz - Preskusi od 28a do 28g (IEC 60512-28-100:2024)

Connectors for electrical and electronic equipment - Tests and measurements - Part 28-100: Signal integrity tests up to 2 000 MHz - Tests 28a to 28g (IEC 60512-28-100:2024)

Steckverbinder für elektrische und elektronische Einrichtungen - Mess- und Prüfverfahren - Teil 28-100: Signalintegritätsprüfungen bis 2 000 MHz - Prüfungen 28a bis 28g (IEC 60512-28-100:2024)

Connecteurs pour équipements électriques et électroniques - Essais et mesures - Partie 28-100: Essais d'intégrité des signaux jusqu'à 2 000 MHz - Essais 28a à 28g (IEC 60512 -28-100:2024)

Ta slovenski standard je istoveten z: EN IEC 60512-28-100:2024

ICS:

31.220.10 Vtiči in vtičnice, konektorji Plug-and-socket devices.

Connectors

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## EUROPEAN STANDARD NORME EUROPÉENNE EUROPÄISCHE NORM

EN IEC 60512-28-100

November 2024

ICS 31.220.10

Supersedes EN IEC 60512-28-100:2019

#### **English Version**

Connectors for electrical and electronic equipment - Tests and measurements - Part 28-100: Signal integrity tests up to 2 000 MHz - Tests 28a to 28g (IEC 60512-28-100:2024)

Connecteurs pour équipements électriques et électroniques - Essais et mesures - Partie 28-100: Essais d'intégrité des signaux jusqu'à 2 000 MHz - Essais 28a à 28g (IEC 60512-28-100:2024)

Steckverbinder für elektrische und elektronische Einrichtungen - Mess- und Prüfverfahren - Teil 28-100: Signalintegritätsprüfungen bis 2 000 MHz - Prüfungen 28a bis 28g (IEC 60512-28-100:2024)

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

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#### **European foreword**

The text of document 48B/3109/FDIS, future edition 3 of IEC 60512-28-100, prepared by SC 48B "Electrical connectors" of IEC/TC 48 "Electrical connectors and mechanical structures for electrical and electronic equipment" was submitted to the IEC-CENELEC parallel vote and approved by CENELEC as EN IEC 60512-28-100:2024.

The following dates are fixed:

- latest date by which the document has to be implemented at national (dop) 2025-11-30 level by publication of an identical national standard or by endorsement
- latest date by which the national standards conflicting with the (dow) 2027-11-30 document have to be withdrawn

This document supersedes EN IEC 60512-28-100:2019 and all of its amendments and corrigenda (if any).

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The text of the International Standard IEC 60512-28-100:2024 was approved by CENELEC as a European Standard without any modification.

In the official version, for Bibliography, the following notes have to be added for the standard indicated:

IEC 60603-7	NOTE Approved as EN IEC 60603-7
IEC 61076-1	NOTE Approved as EN 61076-1
IEC 61076-2	NOTE Approved as EN 61076-2
IEC 61076-3	NOTE Approved as EN 61076-3
IEC 63171	NOTE Approved as EN IEC 63171
IEC 60603-7-81	NOTE Approved as EN 60603-7-81
IEC 60603-7-82	NOTE Approved as EN 60603-7-82
IEC 61076-3-110	NOTE Approved as EN 61076-3-110
IEC 61076-3-104	NOTE Approved as EN 61076-3-104
IEC 61076-2-109	NOTE Approved as EN 61076-2-109
IEC 60603-7-2	NOTE Approved as EN 60603-7-2
IEC 60603-7-3	NOTE Approved as EN 60603-7-3

IEC 60603-7-4	NOTE Approved as EN 60603-7-4
IEC 60603-7-5	NOTE Approved as EN 60603-7-5
IEC 60603-7-41	NOTE Approved as EN 60603-7-41
IEC 60603-7-51	NOTE Approved as EN 60603-7-51
IEC 60603-7-7	NOTE Approved as EN 60603-7-7
IEC 60603-7-71	NOTE Approved as EN 60603-7-71

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#### 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.cencenelec.eu.

<u>Publication</u>	<u>Year</u>	<u>Title</u>	EN/HD	<u>Year</u>
IEC 60050-581	-	International Electrotechnical Vocabulary - Part 581: Electromechanical components for electronic equipment	-	-
IEC 60512-1	- (h4	Connectors for electrical and electronic equipment - Tests and measurements - Part 1: Generic specification	EN IEC 60512-1	-
IEC 60512-26-100	<u>- (m</u>	Connectors for electronic equipment - Tests and measurements - Part 26-100: Measurement setup, test and reference arrangements and measurements for connectors according to IEC 60603-7 - Tests 26a to 26g	EN 60512-26-100	-
IEC 60512-27-100	g/standa:	Connectors for electronic equipment - Tests and measurements - Part 27-100: Signal integrity tests up to 500 MHz on 60603-7 series connectors - Tests 27a to 27g	EN 60512-27-100	0512-28-100
IEC 60512-27-200	-	Connectors for electrical and electronic equipment - Tests and measurements - Part 27-200: Additional specifications for signal integrity tests up to 2 000 MHz on IEC 60603-7 series connectors - Tests 27a to 27g	EN IEC 60512-27-200	-
IEC 60512-29-100	-	Connectors for electronic equipment - Tests and measurements - Part 29-100: Signal integrity tests up to 500 MHz on M12 style connectors - Tests 29a to 29g	EN 60512-29-100	-
IEC 60603-7	-	Connectors for electronic equipment - Part 7: Detail specification for 8-way, unshielded, free and fixed connectors	EN IEC 60603-7	-
IEC 61076-1	-	Connectors for electronic equipment - Product requirements - Part 1: Generic specification	EN 61076-1	-

IEC 61076-3-104	-	Connectors for electrical and electronic equipment - Product requirements - Part 3-104: Detail specification for 8-way, shielded free and fixed connectors for data transmissions with frequencies up to 2 000 MHz	EN 61076-3-104	-
IEC 61076-3-110	-	Connectors for electrical and electronic equipment - Product requirements - Part 3-110: Detail specification for free and fixed connectors for data transmission with frequencies up to 3 000 MHz	EN 61076-3-110	-
IEC 61156-1	-	Multicore and symmetrical pair/quad cables for digital communications - Part 1: Generic specification	-	-
IEC 61169-15	-	Radio-frequency connectors - Part 15: Sectional specification - RF coaxial connectors with inner diameter of outer conductor 4,13 mm (0,163 in) with threaded coupling - Characteristic impedance 50 $\Omega$ (type SMA)	EN IEC 61169-15	-
IEC 61169-16	-	Radio-frequency connectors - Part 16: Sectional specification - RF coaxial connectors with inner diameter of outer conductor 7 mm (0,276 in) with screw coupling - Characteristics impedance 50 ohms (75 ohms) (type N)	EN 61169-16	-
IEC 62153-4-6	-(ht	Metallic cables and other passive components test methods - Part 4-6: Electromagnetic compatibility (EMC) - Surface transfer impedance - line injection method	aai)	-
IEC 62153-4-7 dards.iteh.ai/catalog	_ g/standar	Metallic cables and other passive 2025 components test methods - Part 4-7: SSS Electromagnetic compatibility (EMC) -Test method for measuring of transfer impedance $Z_T$ and screening attenuation $a_S$ or coupling attenuation $a_C$ of connectors and assemblies - Triaxial tube in tube method	EN IEC 62153-4-7 64df4f3f/sist-en-iec-6	<u>-</u> 0512-28-100-2025
IEC 62153-4-12	-	Metallic communication cable test methods - Part 4-12: Electromagnetic compatibility (EMC) - Coupling attenuation or screening attenuation of connecting hardware - Absorbing clamp method	-	-
IEC 62153-4-15	-	Metallic cables and other passive components test methods - Part 4-15: Electromagnetic compatibility (EMC) - Test method for measuring transfer impedance and screening attenuation - or coupling attenuation with triaxial cell	EN IEC 62153-4-15	-
IEC 63171	-	Connectors for electrical and electronic equipment - Shielded or unshielded free and fixed connectors for balanced single-pair data transmission with current-carrying capacity - General requirements and tests	EN IEC 63171	-

ISO/IEC 11801-1 - Information technology - Generic cabling for customer premises - Part 1: General requirements

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### IEC 60512-28-100

Edition 3.0 2024-08

## INTERNATIONAL STANDARD

## NORME INTERNATIONALE



Connectors for electrical and electronic equipment – Tests and measurements – Part 28-100: Signal integrity tests up to 2 000 MHz – Tests 28a to 28g

Connecteurs pour équipements électriques et électroniques – Essais et mesures –

Partie 28-100: Essais d'intégrité des signaux jusqu'à 2 000 MHz – Essais 28a à 28q SISTENIEC 60512-28-100:2025

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#### INTERNATIONAL ELECTROTECHNICAL COMMISSION

Connectors for electrical and electronic equipment –

Tests and measurements –

Part 28-100: Signal integrity tests up to 2 000 MHz – Tests 28a to 28g

#### **FOREWORD**

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IEC 60512-28-100 has been prepared by subcommittee 48B: Electrical connectors, of IEC technical committee 48: Electrical connectors and mechanical structures for electrical and electronic equipment. It is an International Standard.

This third edition cancels and replaces the second edition, published in 2019. This edition constitutes a technical revision.

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

a) The frequency range has been modified to start at 0,1 MHz instead of 1 MHz, to include single-pair connectors.