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Nizkonapetostne stikalne in krmilne naprave - 5-3. del: Krmilne naprave in stikalni elementi - Zahteve za približevalne naprave z določenim obnašanjem ob okvarnih razmerah (PDDB) (IEC 60947-5-3:2026)

Low-voltage switchgear and controlgear - Part 5-3: Control circuit devices and switching elements - Requirements for proximity devices with defined behaviour under fault conditions (PDDB) (IEC 60947-5-3:2026)

Niederspannungsschaltgeräte - Teil 5-3: Steuergeräte und Schaltelemente - Anforderungen für Näherungsschalter mit definiertem Verhalten unter Fehlerbedingungen (PDDB) (IEC 60947-5-3:2026)

Appareillage à basse tension - Partie 5-3: Appareils et éléments de commutation pour circuits de commande - Exigences pour dispositifs de détection de proximité à comportement défini dans des conditions de défaut (PDDB) (IEC 60947-5-3:2026)

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EUROPEAN STANDARD
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EN IEC 60947-5-3

October 2026

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English Version

**Low-voltage switchgear and controlgear - Part 5-3: Control
circuit devices and switching elements - Requirements for
proximity devices with defined behaviour under fault conditions
(PDDB)
(IEC 60947-5-3:2026)**

Appareillage à basse tension - Partie 5-3: Appareils et
éléments de commutation pour circuits de commande -
Exigences pour dispositifs de détection de proximité à
comportement défini dans des conditions de défaut (PDDB)
(IEC 60947-5-3:2026)

Niederspannungsschaltgeräte - Teil 5-3: Steuergeräte und
Schaltelemente - Anforderungen für Näherungsschalter mit
definiertem Verhalten unter Fehlerbedingungen (PDDB)
(IEC 60947-5-3:2026)

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Europäisches Komitee für Elektrotechnische Normung

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

EN IEC 60947-5-3:2026 (E)**European foreword**

The text of document 121A/716/FDIS, future edition 3 of IEC 60947-5-3, prepared by SC 121A "Low-voltage switchgear and controlgear" of IEC/TC 121 "Switchgear and controlgear and their assemblies for low voltage" was submitted to the IEC-CENELEC parallel vote and approved by CENELEC as EN IEC 60947-5-3:2026.

The following dates are fixed:

- latest date by which the document has to be implemented at national (dop) 2027-10-31 level by publication of an identical national standard or by endorsement
- latest date by which the national standards conflicting with the (dow) 2029-10-31 document have to be withdrawn

This document supersedes EN 60947-5-3:2013 and all of its amendments and corrigenda (if any).

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This document is read in conjunction with EN IEC 60947-1:2021 and EN IEC 60947-5-2:2020.

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.

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Endorsement notice

The text of the International Standard IEC 60947-5-3:2026 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 60068-2-6:2007	NOTE	Approved as EN 60068-2-6:2008 (not modified)
IEC 60068-2-27:2008	NOTE	Approved as EN 60068-2-27:2009 (not modified)
IEC 60204-1:2016	NOTE	Approved as EN 60204-1:2018
IEC 60204-1:2016/AMD1:2021	NOTE	Approved as EN 60204-1:2018/A1:2025 (not modified)
IEC 60364 (series)	NOTE	Approved as HD 60364 (series)
IEC 60947-5-6:1999	NOTE	Approved as EN 60947-5-6:2000 (not modified)
IEC 61000-4-13:2002	NOTE	Approved as EN 61000-4-13:2002 (not modified)
IEC 61000-6-7:2014	NOTE	Approved as EN 61000-6-7:2015 (not modified)
IEC 61165:2006	NOTE	Approved as EN 61165:2006 (not modified)
IEC 61508-1:2010	NOTE	Approved as EN 61508-1:2010 (not modified)
IEC 61508-4:2010	NOTE	Approved as EN 61508-4:2010 (not modified)
IEC 61508-5:2010	NOTE	Approved as EN 61508-5:2010 (not modified)

IEC 61508-6:2010	NOTE	Approved as EN 61508-6:2010 (not modified)
IEC 61508-3	NOTE	Approved as EN 61508-3
IEC 61508-7:2010	NOTE	Approved as EN 61508-7:2010 (not modified)
IEC 61511 (series)	NOTE	Approved as EN 61511 (series)
IEC 61709:2017	NOTE	Approved as EN 61709:2017 (not modified)
IEC 61496 (series)	NOTE	Approved as EN IEC 61496 (series)
IEC 60529:1989	NOTE	Approved as EN 60529:1991 (not modified)
IEC 62683-2-3	NOTE	Approved as EN IEC 62683-2-3
IEC 31010:2019	NOTE	Approved as EN IEC 31010:2019 (not modified)
IEC 62443 (series)	NOTE	Approved as EN IEC 62443 (series)
IEC 63208	NOTE	Approved as EN IEC 63208
ISO 13849-2:2012	NOTE	Approved as EN ISO 13849-2:2012 (not modified)
IEC 61709	NOTE	Approved as EN 61709

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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.cenelec.eu.

<u>Publication</u>	<u>Year</u>	<u>Title</u>	<u>EN/HD</u>	<u>Year</u>
IEC 60068-2-1	-	Environmental testing - Part 2-1: Tests - Test A: Cold	EN IEC 60068-2-1	-
IEC 60068-2-30	2005	Environmental testing - Part 2-30: Tests - Test Db: Damp heat, cyclic (12 h + 12 h cycle)	EN 60068-2-30	2005
IEC 60204-1	2016	Safety of machinery - Electrical equipment of machines - Part 1: General requirements	EN 60204-1	2018
+ AMD1	2021		+ A1	2025
IEC 60730-1	-	Automatic electrical controls - Part 1: General requirements	EN IEC 60730-1	-
IEC 60812	-	Failure modes and effects analysis (FMEA and FMECA)	EN IEC 60812	-
IEC 60947-1	— ¹	Low-voltage switchgear and controlgear - Part 1: General rules	EN IEC 60947-1	-
IEC 60947-5-1	2024	Low-voltage switchgear and controlgear - Part 5-1: Control circuit devices and switching elements - Electromechanical control circuit devices	EN IEC 60947-5-1	2025
IEC 60947-5-2	2019	Low-voltage switchgear and controlgear - Part 5-2: Control circuit devices and switching elements - Proximity switches	EN IEC 60947-5-2	2020
-	-		+ A11	2022
IEC 61000-4-2	-	Electromagnetic compatibility (EMC) - Part 4-2: Testing and measurement techniques - Electrostatic discharge immunity test	EN IEC 61000-4-2	-
IEC 61000-4-3	-	Electromagnetic compatibility (EMC) - Part 4-3 : Testing and measurement techniques - Radiated, radio-frequency, electromagnetic field immunity test	EN IEC 61000-4-3	-

¹ Under preparation. Stage at the time of publication: IEC CDV 60947-1:2026.

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IEC 61000-4-4	-	Electromagnetic compatibility (EMC) - Part 4-4: Testing and measurement techniques - Electrical fast transient/burst immunity test	EN 61000-4-4	-
IEC 61000-4-5	-	Electromagnetic compatibility (EMC) - Part 4-5: Testing and measurement techniques - Surge immunity test	EN 61000-4-5	-
IEC 61000-4-6	-	Electromagnetic compatibility (EMC) - Part 4-6: Testing and measurement techniques - Immunity to conducted disturbances, induced by radio-frequency fields	EN IEC 61000-4-6	-
IEC 61000-4-8	-	Electromagnetic compatibility (EMC) - Part 4-8: Testing and measurement techniques - Power frequency magnetic field immunity test	EN 61000-4-8	-
IEC 61000-4-11	-	Electromagnetic compatibility (EMC) - Part 4-11: Testing and measurement techniques - Voltage dips, short interruptions and voltage variations immunity tests for equipment with input current up to 16 A per phase	EN IEC 61000-4-11	-
IEC 61000-4-29	-	Electromagnetic compatibility (EMC) - Part 4-29: Testing and measurement techniques - Voltage dips, short interruptions and voltage variations on d.c. input power port immunity tests	EN IEC 61000-4-29	-
IEC 61131-2	2017	Industrial-process measurement and control - Programmable controllers - Part 2: Equipment requirements and tests	EN IEC 61131-2	2025
IEC 61140	2016	Protection against electric shock - Common aspects for installation and equipment	EN 61140	2016
IEC 61508-2	2010	Functional safety of electrical/electronic/programmable electronic safety-related systems - Part 2: Requirements for electrical/electronic/programmable electronic safety-related systems	EN 61508-2	2010
IEC 61508-3	-	Functional safety of electrical/electronic/programmable electronic safety-related systems - Part 3: Software requirements	EN 61508-3	-
IEC 62061	2021	Safety of machinery - Functional safety of safety-related control systems	EN IEC 62061	2021
+ A1	2024		+ A1	2024
ISO 13849-1	2023	Safety of machinery - Safety-related parts of control systems - Part 1: General principles for design	EN ISO 13849-1	2023
ISO 14119	2024	Safety of machinery - Interlocking devices associated with guards - Principles for design and selection	EN ISO 14119	2025
-	-		+ A11	2026

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Edition 3.0 2026-08

INTERNATIONAL STANDARD

**Low-voltage switchgear and controlgear -
Part 5-3: Control circuit devices and switching elements - Requirements for
proximity devices with defined behaviour under fault conditions (PDDB)**

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