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# INTERNATIONAL STANDARD

Appliance couplers for household and similar general purposes – Part 1: General requirements

INTERNATIONAL ELECTROTECHNICAL COMMISSION

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#### INTERNATIONAL ELECTROTECHNICAL COMMISSION

# APPLIANCE COUPLERS FOR HOUSEHOLD AND SIMILAR GENERAL PURPOSES –

## Part 1: General requirements

#### **FOREWORD**

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International Standard IEC 60320-1 has been prepared by subcommittee 23G: Appliance couplers, of IEC technical committee 23: Electrical accessories.

This third edition cancels and replaces the second edition published in 2001 and Amendment 1:2007. This edition constitutes a technical revision.

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

- a) Standard sheets moved from IEC 60320-1 to IEC 60320-3.
- b) Clarification of requirements for non-standardized appliance couplers.

The text of this standard is based on the following documents:

FDIS	Report on voting
23G/345/FDIS	23G/346/RVD

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

This publication has been drafted in accordance with the ISO/IEC Directives, Part 2.

A list of all the parts in the IEC 60320 series, under the general title *Appliance couplers for household and similar general purposes*, can be found on the IEC website.

Part 1 is to be used in conjunction with the following parts of the IEC 60320 series, if applicable.

IEC 60320-2-1, Appliance couplers for household and similar general purposes – Part 2-1: Sewing machine couplers

IEC 60320-2-3, Appliance coupler for household and similar general purposes – Part 2-3: Appliance coupler with a degree of protection higher than IPX0

IEC 60320-2-4, Appliance couplers for household and similar general purposes – Part 2-4: Couplers dependent on appliance weight for engagement

IEC 60320-3, Appliance couplers for household and similar general purposes – Part 3: Standard sheets and gauges

NOTE If these standards are referring to another edition of IEC 60320-1, that edition is applicable.

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

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

A bilingual version of this publication may be issued at a later date.

The contents of the corrigenda of January 2016 and May 2019 have been included in this copy.

## APPLIANCE COUPLERS FOR HOUSEHOLD AND SIMILAR GENERAL PURPOSES –

## Part 1: General requirements

#### 1 Scope

This part of IEC 60320 sets the general requirements for appliance couplers for two poles and two poles with earth contact and for the connection of electrical devices for household and similar onto the mains supply.

This part of IEC 60320 is also valid for appliance inlets/appliance outlets integrated or incorporated in appliances.

The rated voltage does not exceed 250 V (a.c.) and the rated current does not exceed 16 A.

Appliance couplers complying with this part of IEC 60320 are suitable for normal use at ambient temperatures not normally exceeding +40 °C, but their average over a period of 24 h does not exceed +35 °C, with a lower limit of the ambient air temperature of -5 °C.

Appliance couplers are not suitable for

- use in place of plug and socket-outlet systems according to IEC 60884-1.
- use in place of devices for connecting luminaires (DCLs) according to IEC 61995 or luminaire supporting couplers (LSCs).

NOTE Requirements for d.c. are under consideration.

#### 2 Normative references

The following documents, in whole or in part, are normatively referenced in this document and are indispensable for its application. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

IEC 60068-2-31, Environmental testing – Part 2-31: Tests – Test Ec: Rough handling shocks, primarily for equipment-type specimens

IEC 60068-2-60, Environmental testing – Part 2-60: Tests – Test Ke: Flowing mixed gas corrosion test

IEC 60068-2-75, Environmental testing – Part 2-75: Tests – Test Eh: Hammer tests

IEC 60112, Method for the determination of the proof and the comparative tracking indices of solid insulating materials

IEC 60227 (all parts), Polyvinyl chloride insulated cables of rated voltages up to and including  $450/750\ V$ 

IEC 60245 (all parts), Rubber insulated cables – Rated voltages up to and including  $450/750\ V$ 

IEC 60320 (all parts), Appliance couplers for household and similar general purposes

IEC 60320-3:2014, Appliance couplers for household and similar general purposes – Part 3: Standard sheets and gauges

IEC 60417, *Graphical symbols for use on equipment* (available from: <a href="http://www.graphical-symbols.info/equipment">http://www.graphical-symbols.info/equipment</a>)

IEC 60664-1:2007, Insulation coordination for equipment within low voltage systems – Part 1: Principles, requirements and tests

IEC 60695-2-10:2000, Fire hazard testing – Part 2-10: Glowing/hot-wire based test methods – Glow-wire apparatus and common test procedure

IEC 60695-2-11:2000, Fire hazard testing – Part 2-11: Glowing/hot-wire based test methods – Glow-wire flammability test method for end-products (GWEPT)

IEC 60695-2-12:2000, Fire hazard testing – Part 2-12: Glowing/hot-wire based test methods – Glow-wire flammability index (GWFI) test method for materials

IEC 60695-2-13:2000, Fire hazard testing – Part 2-13: Glowing/hot-wire based test methods – Glow-wire ignition temperature (GWIT) test method for materials

IEC 60695-10-2, Fire hazard testing - Part 10: Abnormal heat - Ball pressure test method

IEC 60730-2-11, Automatic electrical controls for household and similar use – Part 2-11: Particular requirements for energy regulators

IEC 60999-1, Connecting devices – Electrical copper conductors – Safety requirements for screw-type and screwless-type clamping units – Part 1: General requirements and particular requirements for clamping units for conductors from 0,2 mm<sup>2</sup> up to 35 mm<sup>2</sup> (included)

IEC 61032, Protection of persons and equipment by enclosures – Probes for verification

IEC 61058 (all parts), Switches for appliances