

INTERNATIONAL STANDARD

NORME INTERNATIONALE

Equipment for general lighting purposes – EMC immunity requirements

Équipements pour l'éclairage à usage général – Exigences concernant l'immunité CEM

Withhold



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IEC Central Office
3, rue de Varembe
CH-1211 Geneva 20
Switzerland
Email: inmail@iec.ch
Web: www.iec.ch

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EQUIPMENT FOR GENERAL LIGHTING PURPOSES – EMC IMMUNITY REQUIREMENTS

INTERPRETATION SHEET 1

This interpretation sheet has been prepared by IEC technical committee 34: Lamps and related equipment.

The text of this interpretation sheet is based on the following documents:

| | |
|------------|------------------|
| ISH | Report on voting |
| 34/180/ISH | 34/185/RVD |

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

The draft is based on the outcome of documents 34/155/DC and 34/158/INF.

Introduction:

Test conditions of dimmable lighting equipment are unclear in IEC 61547 for dimmable lighting equipment with dim level other than $50\% \pm 10\%$. Some HID control units have only one dim level, for example 65 %.

Present text, Clause 7, second paragraph, first sentence:

“Equipment including a regulating control shall be tested at a light output level of $50\% \pm 10\%$.”

Interpretation for equipment which could not fulfill the test dim level conditions:

If a light output level of $50\% \pm 10\%$ is not available for equipment including regulating control, the test shall be done at the level which is closest to 50 %. If two steps equally distant to 50 % are available, the lower level ($< 50\%$) shall be used for the test.

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EQUIPMENT FOR GENERAL LIGHTING PURPOSES – EMC IMMUNITY REQUIREMENTS

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International Standard IEC 61547 has been prepared by IEC technical committee 34: Lamps and related equipment.

This second edition cancels and replaces the first edition, published in 1995, and its Amendment 1 (2000). It constitutes a technical revision

The main reason for this revision is to update the dates of the references to the basic standards which also required some editorial changes in the tables. Other changes are:

- 1 Scope: clearly excludes multimedia equipment with lamps (e.g. TV);
- 3.2 Enclosure port: removal of the "earth port" in Figure 1 as in the generic EMC standards; the note below Figure 1 in the first edition relates to a requirement and moved to the main text under 5.1 General;
- 5.6 Injected currents: update of the names of the example CDN's;
- 5.7 Surges: test only at the peak of the mains voltage by deleting the requirement to test at zero crossings;

- 5.8 Voltage dips and interruptions: clarifying that the voltage level changes at the zero crossing;
- 6.3.2 Independent auxiliaries: Table 14 has been simplified because most independent auxiliaries have identical performance criteria;
- 6.3.3 Luminaires: Table 15 has been simplified because most luminaires have identical performance criteria; correcting the error in the injected current column by changing the B into A for luminaires with electronic ballast for discharge lamps; additionally, the requirements for emergency luminaires operating in high risk task areas are updated to meet the levels specified in IEC 60598-2-22;
- 7 Conditions during testing: the "under consideration" for the operating conditions for starting devices has been deleted; the supply voltage and frequency during the test are clearly stated; shortening the immunity test for equipment incorporating a regulating control by testing at one light output level ($50 \% \pm 10 \%$) instead of testing at three light output levels which are difficult to adjust and do not provide extra protection.

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

| FDIS | Report on voting |
|-------------|------------------|
| 34/127/FDIS | 34/130/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.

This standard is to be read in conjunction with the relevant basic and/or product standard(s).

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

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The contents of the corrigendum of April 2010 and Interpretation sheet 1 of June 2013 have been included in this copy.