BS EN IEC 62442-2:2018

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BSI Standards Publication

Energy performance of lamp controlgear

Part 2: Controlgear for high intensity discharge lamps (excluding fluorescent lamps) - Method of measurement to determine the efficiency of controlgear



National foreword

This British Standard is the UK implementation of EN IEC 62442-2:2018. It is identical to IEC 62442-2:2018. It supersedes BS EN 62442-2:2014+A11:2017, which will be withdrawn on 10 August 2021.

The UK participation in its preparation was entrusted to Technical Committee CPL/34/3, Auxiliaries for lamps.

A list of organizations represented on this committee can be obtained on request to its secretary.

This publication does not purport to include all the necessary provisions of a contract. Users are responsible for its correct application.

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EUROPÄISCHE NORM

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English Version

Energy performance of lamp controlgear - Part 2: Controlgear for high intensity discharge lamps (excluding fluorescent lamps) -Method of measurement to determine the efficiency of controlgear (IEC 62442-2:2018)

Performance énergétique des appareillages de lampes -Partie 2: Appareillages des lampes à décharge à haute intensité (à l'exclusion des lampes à fluorescence) -Méthode de mesure pour la détermination du rendement des appareillages (IEC 62442-2:2018) Energieeffizienz von Lampenbetriebsgeräten - Teil 2: Betriebsgeräte für Hochdruck-Entladungslampen (ausgenommen Leuchtstofflampen) - Messverfahren zur Bestimmung des Wirkungsgrades von Betriebsgeräten (IEC 62442-2:2018)

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

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

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European foreword

The text of document 34C/1336A/CDV, future edition 2 of IEC 62442-2, prepared by SC 34C "Auxiliaries for lamps" of IEC/TC 34 "Lamps and related equipment" was submitted to the IEC-CENELEC parallel vote and approved by CENELEC as EN IEC 62442-2:2018.

The following dates are fixed:

•	latest date by which the document has to be implemented at national	(dop)	2019-05-10
	level by publication of an identical national standard or by endorsement		

• latest date by which the national standards conflicting with the (dow) 2021-08-10 document have to be withdrawn

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Endorsement notice

The text of the International Standard IEC 62442-2:2018 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 standards indicated:

IEC 60188 NO	TE Harmor	ized as EN 60188.
IEC 60662 NO	TE Harmor	ized as EN 60662.
IEC 60923 NO	TE Harmor	ized as EN 60923.
IEC 61167 NO	TE Harmor	ized as EN 61167.
IEC 62035 NO	TE Harmor	ized as EN 62035.
IEC 62442-3 NO	TE Harmor	ized as EN 62442-3.

(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.

Publication	Year	<u>Title</u>	<u>EN/HD</u>	<u>Year</u>
IEC 61347-1	2015	Lamp controlgear - Part 1: General ar safety requirements	nd EN 61347-1	2015
IEC 61347-2-9	-	Lamp controlgear Part 2-9: Particula requirements for electromagnet controlgear for discharge lamps (excludir fluorescent lamps)	ic	-
IEC 61347-2-12	-	Lamp controlgear - Part 2-12: Particula requirements for d.c. or a.c. supplie electronic ballasts for discharge lamp (excluding fluorescent lamps)	ed	-
IEC Guide 115	2007	Application of uncertainty of measureme to conformity assessment activities in the electrotechnical sector		-

CONTENTS

F	OREWC	DRD	3
1	Scop	be	5
2	Norm	native references	5
3	Term	ns and definitions	6
4		eral	
	4.1	Applicability	7
	4.2	General notes on tests	7
	4.3	Controllable controlgear	8
	4.4	Multi-lamp type controlgear	8
	4.5	Measurement uncertainty	8
	4.6	Sampling of controlgear for testing	8
	4.7	Size of the test sample	8
	4.8	Power supply	8
	4.9	Supply voltage waveform	9
	4.10	Instrument accuracy	9
	4.11	Multi-rated voltage controlgear	9
	4.12	Sensor and network connections	9
5		nod of measurement of the input power and calculation of the efficiency of rolgear for high intensity discharge lamps	10
	5.1	Measurement setup: electromagnetic controlgear	10
	5.2	Efficiency calculation: electromagnetic controlgear	
	5.3	Measurement setup: electronic controlgear	11
	5.4	Efficiency calculation: electronic controlgear	12
	5.5	Standby power measurement of electronic controlgear	12
Bi	bliograp	phy	13
Fi	gure 1 -	 Measurement setup for electromagnetic controlgear 	10
Fi	gure 2 -	 Measurement setup for electronic controlgear 	11
Fi	gure 3 -	 Measurement setup of the standby power of electronic controlgear 	12

Table 1 – Typical nominal electricity supply details for some regions8

INTERNATIONAL ELECTROTECHNICAL COMMISSION

ENERGY PERFORMANCE OF LAMP CONTROLGEAR -

Part 2: Controlgear for high intensity discharge lamps (excluding fluorescent lamps) – Method of measurement to determine the efficiency of controlgear

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International Standard IEC 62442-2 has been prepared by subcommittee 34C: Auxiliaries for lamps, of IEC technical committee 34: Lamps and related equipment.

This second edition cancels and replaces the first edition published in 2014. This edition constitutes a technical revision and has been harmonized with IEC 62442-1 and IEC 62442-3.

The text of this International Standard is based on the following documents:

CDV	Report on voting
34C/1336A/CDV	34C/1377/RVC

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

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

A list of all parts in the IEC 62442 series, published under the general title *Energy performance of lamp controlgear*, can be found on the IEC website.

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

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

ENERGY PERFORMANCE OF LAMP CONTROLGEAR -

Part 2: Controlgear for high intensity discharge lamps (excluding fluorescent lamps) – Method of measurement to determine the efficiency of controlgear

1 Scope

This part of IEC 62442 defines a measurement method of the power losses of electromagnetic controlgear, the total input power and the standby power of electronic controlgear for high intensity discharged lamps (excluding fluorescent lamps). A calculation method of the efficiency of controlgear for high intensity discharged lamp(s) is also defined.

It is assumed that the controlgear are designed for use on DC supplies up to 1 000 V and/or AC supplies up to 1 000 V at 50 Hz or 60 Hz.

This document applies to electrical controlgear-lamp circuits comprised solely of the controlgear and of the lamp(s).

NOTE Requirements for testing individual controlgear during production are not included.

This document specifies the measurement method for the total input power, the standby power and the calculation method of the lamp controlgear efficiency for all controlgear sold for domestic and normal commercial purposes operating with high intensity discharge lamps.

This document does not apply to:

- controlgear which form an integral part of lamps;
- controlgear circuits with capacitors connected in series;
- controllable electromagnetic controlgear.

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.

IEC 61347-1:2015, Lamp controlgear – Part 1: General and safety requirements

IEC 61347-2-9, Lamp controlgear – Part 2-9: Particular requirements for electromagnetic controlgear for discharge lamps (excluding fluorescent lamps)

IEC 61347-2-12, Lamp controlgear – Part 2-12: Particular requirements for d.c. or a.c. supplied electronic ballasts for discharge lamps (excluding fluorescent lamps)

IEC Guide 115:2007, Application of uncertainty of measurement to conformity assessment activities in the electrotechnical sector