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**Elektroakustika – Slušni pripomočki – 8. del: Metode za merjenje  
zmogljivostnih karakteristik slušnih pripomočkov v pogojih simuliranega  
delovanja na kraju samem (IEC 60118-8:2005)**

Electroacoustics - Hearing aids - Part 8: Methods of measurement of performance  
characteristics of hearing aids under simulated in situ working conditions (IEC  
60118-8:2005)

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English version

**Electroacoustics –  
Hearing aids**  
**Part 8: Methods of measurement of performance characteristics  
of hearing aids under simulated *in situ* working conditions**  
(IEC 60118-8:2005)

Electroacoustique –  
Appareils de correction auditive  
Partie 8: Méthodes de mesure  
des caractéristiques fonctionnelles  
des appareils de correction auditive  
dans des conditions simulées  
de fonctionnement *in situ*  
(CEI 60118-8:2005)

Akustik –  
Hörgeräte  
Teil 8: Verfahren zur Messung der  
Übertragungseigenschaften von  
Hörgeräten unter simulierten  
*In-Situ*-Bedingungen  
(IEC 60118-8:2005)

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# CENELEC

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

**Central Secretariat: rue de Stassart 35, B - 1050 Brussels**

## Foreword

The text of document 29/584/FDIS, future edition 2 of IEC 60118-8, prepared by IEC TC 29, Electroacoustics, was submitted to the IEC-CENELEC parallel vote and was approved by CENELEC as EN 60118-8 on 2005-12-01.

The following dates were fixed:

- latest date by which the EN has to be implemented at national level by publication of an identical national standard or by endorsement (dop) 2006-09-01
- latest date by which the national standards conflicting with the EN have to be withdrawn (dow) 2008-12-01

Annex ZA has been added by CENELEC.

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## Endorsement notice

The text of the International Standard IEC 60118-8:2005 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 60068	NOTE	Harmonized in the EN 60068 series (not modified). <a href="https://standards.iteh.ai/catalog/standards/sist/fl5b261-a258-4449-b665-122140003b7c-0016-8-2006">https://standards.iteh.ai/catalog/standards/sist/fl5b261-a258-4449-b665-122140003b7c-0016-8-2006</a>
IEC 60118-7	NOTE	Harmonized as EN 60118-7:2005 (not modified).

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## Annex ZA (normative)

### Normative references to international publications with their corresponding European publications

The following referenced documents are indispensable for the application 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 Where an international publication has been modified by common modifications, indicated by (mod), the relevant EN/HD applies.

<u>Publication</u>	<u>Year</u>	<u>Title</u>	<u>EN/HD</u>	<u>Year</u>
IEC 60118-0	1983	Hearing aids Part 0: Measurement of electroacoustical characteristics	EN 60118-0	1993
IEC 60263	- <sup>1)</sup>	Scales and sizes for plotting frequency characteristics and polar diagrams	-	-
IEC 60711	- <sup>1)</sup>	Occluded-ear simulator for the measurement of earphones coupled to the ear by ear inserts	HD 443 S1	1983 <sup>2)</sup>
IEC 60959	- <sup>1)</sup>	Provisional head and torso simulator for acoustic measurements on air conduction hearing aids	-	-

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1) Undated reference.

2) Valid edition at date of issue.

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60118-8

Deuxième édition  
Second edition  
2005-10

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**Electroacoustique –  
Appareils de correction auditive –**

**Partie 8:  
Méthodes de mesure des caractéristiques  
fonctionnelles des appareils de correction  
auditive dans des conditions simulées de  
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**Electroacoustics –  
Hearing aids –**

**Part 8:  
Methods of measurement of performance  
characteristics of hearing aids under  
simulated *in situ* working conditions**

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## INTERNATIONAL ELECTROTECHNICAL COMMISSION

**ELECTROACOUSTICS –  
HEARING AIDS –****Part 8: Methods of measurement of performance characteristics  
of hearing aids under simulated *in situ* working conditions**

## FOREWORD

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International Standard IEC 60118-8 has been prepared by IEC technical committee 29: Electroacoustics.

This second edition cancels and replaces the first edition published in 1983, and constitutes a technical revision. The purpose of this revision is to update the publication with a simplified method for simulated *in situ* measurements of hearing aids and a description for determination of the directivity index (DI) of directional microphones in hearing aids in the horizontal plane. Other parts of the standard are basically left unchanged.

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

FDIS	Report on voting
29/584/FDIS	29/589/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.

IEC 60118 consists of the following parts, under the general title *Electroacoustics – Hearing aids*<sup>1)</sup>:

- Part 0: Measurement of electroacoustical characteristics
- Part 1: Hearing aids with induction pick-up coil input
- Part 2: Hearing aids with automatic gain control circuits
- Part 3: Hearing aid equipment not entirely worn on the listener
- Part 4: Magnetic field strength in audio-frequency induction loops for hearing aid purposes
- Part 5: Nipples for insert earphones
- Part 6: Characteristics of electrical input circuits for hearing aids
- Part 7: Measurement of the performance characteristics of hearing aids for production, supply and delivery quality assurance purposes
- Part 8: Methods of measurement of performance characteristics of hearing aids under simulated in situ working conditions
- Part 9: Methods of measurement of characteristics of hearing aids with bone vibrator output
- Part 11: Symbols and other markings on hearing aids and related equipment
- Part 12: Dimensions of electrical connector systems
- Part 13: Electromagnetic compatibility (EMC)
- Part 14: Specification of a digital interface device.

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

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

<sup>1)</sup> Various parts of the series were published under the general title *Hearing aids*. Future editions of these parts will appear under the new general title.

## INTRODUCTION

Measurement methods that take into account the acoustical influence of the wearer on the performance of hearing aids are important, particularly when the results are to be used to assist in the fitting of hearing aids. The information obtained using this standard is likely to be more relevant to the fitting of hearing aids than that provided by publications concerned with type approval and quality control such as IEC 60118-0, and IEC 60118-7.

The methods specified in this standard require a device such as a manikin to simulate the presence of the wearer. It has been found necessary to establish certain guidelines for simulated *in situ* measurements of hearing aids. The recommended methods are described in this standard.

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