



**SLOVENSKI STANDARD**  
**SIST EN 61096:1999/A1:1999**  
**01-julij-1999**

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**Methods of measuring the characteristics of reproducing equipment for digital audio compact discs (IEC 61096:1992/A1:1996)**

Methods of measuring the characteristics of reproducing equipment for digital audio compact discs

Meßverfahren für die Eigenschaften von Wiedergabegeräten für Digital-Audio-Compactplatten

Méthodes de mesure des caractéristiques des appareils de lecture pour les disques compacts audionumériques

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**Ta slovenski standard je istoveten z: EN 61096:1993/A1:1996**

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**ICS:**

33.160.30      Avdio sistemi                      Audio systems

**SIST EN 61096:1999/A1:1999                      en**

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UDC 621.396.7:681.85CD  
ICS 33.160.30

Descriptors: Disk readers, compact disks, characteristics, measurement

English version

**Methods of measuring the characteristics of  
reproducing equipment for digital audio compact discs  
(IEC 1096:1992/A1:1996)**

Méthodes de mesure des  
caractéristiques des appareils  
de lecture pour les disques  
compacts audionumériques  
(CEI 1096:1992/A1:1996)

Meßverfahren für die Eigenschaften  
von Wiedergabegeräten für  
Digital-Audio-Compactplatten  
(IEC 1096:1992/A1:1996)

This amendment A1 modifies the European Standard EN 61096:1993; it was approved by CENELEC on 1996-10-01. CENELEC members are bound to comply with the CEN/CENELEC Internal Regulations which stipulate the conditions for giving this amendment the status of a national standard without any alteration.

Up-to-date lists and bibliographical references concerning such national standards may be obtained on application to the Central Secretariat or to any CENELEC member.

This amendment exists in three official versions (English, French, German). A version in any other language made by translation under the responsibility of a CENELEC member into its own language and notified to the Central Secretariat has the same status as the official versions.

CENELEC members are the national electrotechnical committees of Austria, Belgium, Denmark, Finland, France, Germany, Greece, Iceland, Ireland, Italy, Luxembourg, Netherlands, Norway, Portugal, Spain, Sweden, Switzerland and United Kingdom.

**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 100B/28/FDIS, future amendment 1 to IEC 1096:1992, prepared by SC 100B, Recording, of IEC TC 100, Audio, video and multimedia systems and equipment, was submitted to the IEC-CENELEC parallel vote and was approved by CENELEC as amendment A1 to EN 61096:1993 on 1996-10-01.

The following dates were fixed:

- latest date by which the amendment has to be implemented at national level by publication of an identical national standard or by endorsement (dop) 1997-07-01
- latest date by which the national standards conflicting with the amendment have to be withdrawn (dow) 1997-07-01

Annexes designated "normative" are part of the body of the standard.

Annexes designated "informative" are given for information only.

In this standard, annex ZA is normative and annexes A, B (EN 61096) and C (A1) are informative.

Annex ZA has been added by CENELEC.

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### Endorsement notice

The text of amendment 1:1996 to the International Standard IEC 1096:1992 was approved by CENELEC as an amendment to the European Standard without any modification.

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Annex ZA (normative)

Normative references to international publications  
with their corresponding European publications

Addition:

<u>Publication</u>	<u>Year</u>	<u>Title</u>	<u>EN/HD</u>	<u>Year</u>
IEC 68-2-27	1987	Basic environmental testing procedures Part 2: Tests - Test Ea and guidance: Shock	EN 60068-2-27	1993
IEC 651	1979	Sound level meters	EN 60651	1994
IEC 721-3-5	1985	Classification of environmental conditions Part 3: Classification of groups of environmental parameters and their severities -- Ground vehicle installations	EN 60721-3-5 <sup>1)</sup>	1993
ISO 532	1975	Acoustics - Methods for calculating loudness levels	-	-
ISO 1996	series	Acoustics - Description and measurement of environmental noise	-	-
ISO 3740	1980	Acoustics - Determination of sound power levels of noise sources - Guidelines for the use of basic standards and for the preparation of noise test codes	-	-
ISO 3741	1988	Acoustics - Determination of sound power levels of noise sources - Precision methods for board-band sources in reverberation rooms	EN 23741	1991
ISO 3742	1988	Acoustics - Determination of sound power levels of noise sources - Precision methods for discrete-frequency and narrow-band sources in reverberation rooms	EN 23742	1991
ISO 3743-1	1994	Acoustics - Determination of sound power levels of noise sources - Engineering methods for small, movable sources in reverberant fiels Part 1: Comparison method for hard-walled test rooms	EN ISO 3743-1	1995
ISO 3743-2	1994	Part 2: Methods for special reverberation test rooms	-	-

1) EN 60721-3-5 includes A1:1991 to IEC 721-3-5.

<u>Publication</u>	<u>Year</u>	<u>Title</u>	<u>EN/HD</u>	<u>Year</u>
ISO 3744	1994	Acoustics - Determination of sound power levels of noise sources using sound pressure - Engineering method in an essentially free field over a reflecting plane	EN ISO 3744	1995
ISO 3745	1977	Acoustics - Determination of sound power levels of noise sources - Precision methods for anechoic and semi-anechoic rooms	-	-

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NORME  
INTERNATIONALE  
INTERNATIONAL  
STANDARD

CEI  
IEC  
1096

1992

AMENDEMENT 1  
AMENDMENT 1

1996-10

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Amendement 1

**Méthodes de mesure des caractéristiques  
des appareils de lecture pour les disques  
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iTeh STANDARD PREVIEW  
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Amendment 1

SIST EN 61096-1999/A1:1999  
<https://standards.iteh.ai/catalog/standards/sist/6b748c07-d21f-49c2-9ac7-665d1e110006/iec-61096-1-1992-amd-1-1996>  
**Methods of measuring the characteristics  
of reproducing equipment for digital  
audio compact discs**

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Bureau central de la Commission Electrotechnique Internationale 3, rue de Varembe Genève, Suisse



Commission Electrotechnique Internationale  
International Electrotechnical Commission  
Международная Электротехническая Комиссия

CODE PRIX  
PRICE CODE

K

● Pour prix, voir catalogue en vigueur  
For price, see current catalogue

## FOREWORD

This amendment has been prepared by subcommittee 100B: Recording, of IEC technical committee 100: Audio, video and multimedia systems and equipment.

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

FDIS	Report on voting
100B/28/FDIS	100B/50/RVD

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

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## 2 Normative references

*Insert, in the existing list, the titles of the following standards:*

IEC 68-2-27: 1987, *Environmental testing – Part 2: Tests – Test Ea and guidance: Shock*

IEC 651: 1979, *Sound level meters*

IEC 721-3-5: 1985, *Classification of environmental conditions – Part 3: Classification of groups of environmental parameters and their severities. Ground vehicle installations*

ISO 532: 1975, *Acoustics – Methods for calculating loudness levels*

ISO 1996: *Acoustics – Description and measurement of environmental noise*

ISO 3740: 1980, *Acoustics – Determination of sound power levels of noise sources – Guidelines for the use of basic standards and for the preparation of noise test codes*

ISO 3741: 1988, *Acoustics – Determination of sound power levels of noise sources – Precision methods for broad-band sources in reverberation rooms*

ISO 3742: 1988, *Acoustics – Determination of sound power levels of noise sources – Precision methods for discrete-frequency and narrow-band sources in reverberation rooms*

ISO 3743-1: 1994, *Acoustics – Determination of sound power levels of noise sources – Engineering methods for small, movable sources in reverberant fields – Part 1: Comparison method for hard-walled test rooms*

ISO 3743-2: 1994, *Acoustics – Determination of sound power levels of noise sources using sound pressure – Engineering methods for small, movable sources in reverberant fields – Part 2: Methods for special reverberation test rooms*

ISO 3744: 1994, *Acoustics – Determination of sound power levels of noise sources using sound pressure – Engineering method in an essentially free field over a reflecting plane*

ISO 3745: 1977, *Acoustics – Determination of sound power levels of noise sources – Precision methods for anechoic and semi-anechoic rooms*



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#### 4.3.1 Mechanical performance claims

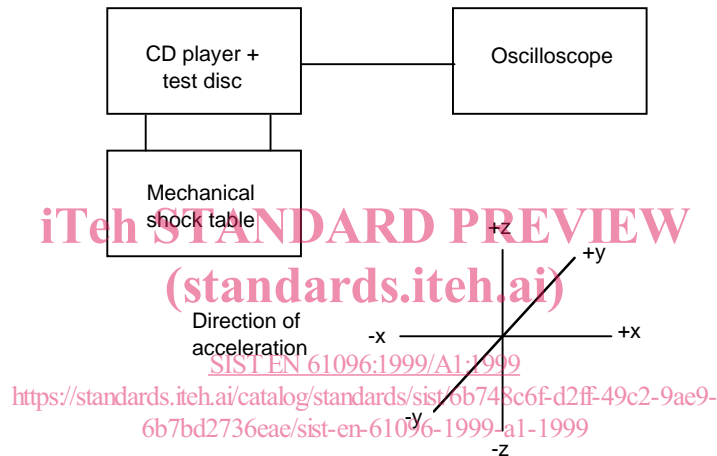
Replace the text of this subclause by the following:

##### 4.3.1.1 Shock and vibration resistance

###### Definition

The player insensitivity against direct or indirect mechanical shocks and vibrations as caused by the supporting surface in vertical (z-direction) or in horizontal direction (x and y directions) on the player cabinet.

###### a) Shock test



Shock table: according to IEC 68-2-27.

Oscilloscope: input A, LF direct;  
input B LF 90° out of phase with A;  
x-deflection via input B.

CD player: line output, left channel, directly connected to oscilloscope input A.

Test signal: 1 kHz left and right

Table excitation: according to IEC 68-2-27, figure 2: D = 3 ms, A = variable.

Test CD: according to annexes A and C of this standard for restricted CD parameters.

###### Method

Place the player on a board horizontally.

Apply shocks with increasing severity and observe the circle on the scope.

Set oscilloscope sensitivity of A and B input so that a circle will be displayed.

Observe the circle during the shock test run.

The distortion of the circle is a measure for the shock influence.

It is advised to also listen for audible effects.

The test should be repeated three times in all directions (+/-X, +/-Y +/-Z) for every severity level.