



SLOVENSKI STANDARD SIST EN 60793-1-47:2009

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Optical fibres - Part 1-47: Measurement methods and test procedures - Macrobending loss (IEC 60793-1-47:2009)

Lichtwellenleiter - Teil 1-47: Messmethoden und Prüfverfahren - Makrobiegeverlust (IEC 60793-1-47:2009)

Fibres optiques - Partie 1-47: Méthodes de mesure et procédures d'essai - Pertes dues aux macrocourbures (CEI 60793-1-47:2009)

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Ta slovenski standard je istoveten z: EN 60793-1-47:2009

ICS:

33.180.10 QJ]ã}æÄ|æ}æÁæ|ã Fibres and cables

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EUROPEAN STANDARD
NORME EUROPÉENNE
EUROPÄISCHE NORM

EN 60793-1-47

June 2009

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Supersedes EN 60793-1-47:2007

English version

**Optical fibres -
Part 1-47: Measurement methods and test procedures -
Macrobending loss
(IEC 60793-1-47:2009)**

Fibres optiques -
Partie 1-47: Méthodes de mesure
et procédures d'essai -
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Lichtwellenleiter -
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und Prüfverfahren -
Makrobiegeverlust
(IEC 60793-1-47:2009)

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This European Standard was approved by CENELEC on 2009-05-01. CENELEC members are bound to comply with the CEN/CENELEC Internal Regulations which stipulate the conditions for giving this European Standard 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 European Standard 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, Bulgaria, Cyprus, the Czech Republic, Denmark, Estonia, Finland, France, Germany, Greece, Hungary, Iceland, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, the Netherlands, Norway, Poland, Portugal, Romania, Slovakia, Slovenia, Spain, Sweden, Switzerland and the United Kingdom.

CENELEC

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

Central Secretariat: Avenue Marnix 17, B - 1000 Brussels

Foreword

The text of document 86A/1207/CDV, future edition 3 of IEC 60793-1-47, prepared by SC 86A, Fibres and cables, of IEC TC 86, Fibre optics, was submitted to the IEC-CENELEC parallel vote and was approved by CENELEC as EN 60793-1-47 on 2009-05-01.

This European Standard supersedes EN 60793-1-47:2007.

The main change from EN 60793-1-47:2007 is listed below:

- introduction of the Annex A describing small bend radius phenomena.

This standard is to be read in conjunction with EN 60793-1-1.

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) 2010-02-01
- latest date by which the national standards conflicting with the EN have to be withdrawn (dow) 2012-05-01

Annex ZA has been added by CENELEC.

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Endorsement notice

The text of the International Standard IEC 60793-1-47:2009 was approved by CENELEC as a European Standard without any modification.

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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 When 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 60793-1-1	- ¹⁾	Optical fibres - Part 1-1: Measurement methods and test procedures - General and guidance	EN 60793-1-1	2008 ²⁾
IEC 60793-1-40 (mod)	- ¹⁾	Optical fibres - Part 1-40: Measurement methods and test procedures - Attenuation	EN 60793-1-40	2003 ²⁾
IEC 60793-1-46	- ¹⁾	Optical fibres - Part 1-46: Measurement methods and test procedures - Monitoring of changes in optical transmittance	EN 60793-1-46	2002 ²⁾
IEC 61280-4-1	- ¹⁾	Fibre-optic communication subsystem test procedures Part 4-1: Cable plant and links - Multimode fibre-optic cable plant attenuation measurement	EN 61280-4-1	2004 ²⁾

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¹⁾ Undated reference.

²⁾ Valid edition at date of issue.

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Part 1-47: Measurement methods and test procedures – Macrobending loss
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CONTENTS

FOREWORD.....	3
INTRODUCTION.....	5
1 Scope.....	6
2 Normative references	6
3 Specimen	7
3.1 Specimen length.....	7
3.1.1 Method A – Fibre winding	7
3.1.2 Method B – Quarter circle bends	7
3.2 Specimen end face.....	7
4 Apparatus.....	7
4.1 Method A – Fibre winding	7
4.2 Method B – Quarter circle bends	7
5 Procedure	8
5.1 Method A – Fibre winding	8
5.1.1 General	8
5.1.2 Single-mode fibres	9
5.1.3 Multimode (A1) fibres	10
5.2 Method B – Quarter circle bends	10
6 Calculations	12
7 Results	12
7.1 Information available with each measurement.....	12
7.2 Information available upon request.....	12
8 Specification information	13
Annex A (informative) Small bend radius phenomena	14
Bibliography.....	16
Figure 1 – Quarter circle guide groove in plate.....	8
Figure 2 – Multiple bends using stacked plates	11
Figure A.1 – Loss curves versus curve fits.....	14

INTERNATIONAL ELECTROTECHNICAL COMMISSION

OPTICAL FIBRES –

**Part 1-47: Measurement methods and test procedures –
Macrobending loss**

FOREWORD

- 1) The International Electrotechnical Commission (IEC) is a worldwide organization for standardization comprising all national electrotechnical committees (IEC National Committees). The object of IEC is to promote international co-operation on all questions concerning standardization in the electrical and electronic fields. To this end and in addition to other activities, IEC publishes International Standards, Technical Specifications, Technical Reports, Publicly Available Specifications (PAS) and Guides (hereafter referred to as "IEC Publication(s)"). Their preparation is entrusted to technical committees; any IEC National Committee interested in the subject dealt with may participate in this preparatory work. International, governmental and non-governmental organizations liaising with the IEC also participate in this preparation. IEC collaborates closely with the International Organization for Standardization (ISO) in accordance with conditions determined by agreement between the two organizations.
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International Standard IEC 60793-1-47 has been prepared by subcommittee 86A: Fibres and cables, of IEC technical committee 86: Fibre optics.

This third edition cancels and replaces the second edition published in 2006. It constitutes a technical revision. The main change is listed below:

- Introduction of the Annex A describing small bend radius phenomena.

This standard is to be read in conjunction with IEC 60793-1-1.

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

CDV	Report on voting
86A/1207/CDV	86A/1240/RVC

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 parts of IEC 60793 series, published under the general title *Optical fibres*, can be found on the IEC website.

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.

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

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INTRODUCTION

Publications in the IEC 60793-1 series concern measurement methods and test procedures as they apply to optical fibres.

Within the same series, several different areas are grouped, but all numbers are possibly not used, as follows:

- Parts 1-10 to 1-19: General
- Parts 1-20 to 1-29: Measurement methods and test procedures for dimensions
- Parts 1-30 to 1-39: Measurement methods and test procedures for mechanical characteristics
- Parts 1-40 to 1-49: Measurement methods and test procedures for transmission and optical characteristics
- Parts 1-50 to 1-59: Measurement methods and test procedures for environmental characteristics

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