



**SLOVENSKI STANDARD**  
**SIST EN 61274-1:1997**

**01-december-1997**

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**Fibre optic adaptors - Part 1: Generic specification (IEC 1274-1:1994)**

Fibre optic adaptors -- Part 1: Generic specification

Zwischenverbinder (Adapter) für Lichtwellenleiter -- Teil 1: Fachgrundspezifikation

Raccords pour fibres optiques -- Partie 1: Spécification générique

**Ta slovenski standard je istoveten z: EN 61274-1:1997**

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**ICS:**

33.180.20	Povezovalne naprave za optična vlakna	Fibre optic interconnecting devices
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English version

**Fibre optic adaptors**  
**Part 1: Generic specification**  
(IEC 1274-1:1994)

Raccords pour fibres optiques  
Partie 1: Spécification générique  
(CEI 1274-1:1994)

Zwischenverbinder (Adapter)  
für Lichtwellenleiter  
Teil 1: Fachgrundspezifikation  
(IEC 1274-1:1994)

**SIST EN 61274-1:1997**

This European Standard 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 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, 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 the International Standard IEC 1274-1:1994, prepared by SC 86B, Fibre optic interconnecting devices and passive components, of IEC TC 86, Fibre optics, was submitted to the formal vote and was approved by CENELEC as EN 61274-1 on 1996-10-01 without any modification.

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) 1997-09-01
- latest date by which the national standards conflicting with the EN have to be withdrawn (dow) 1997-09-01

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 annex A is informative.

Annex ZA has been added by CENELEC.

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### Endorsement notice

**SIST EN 61274-1:1997**  
The text of the International Standard IEC 1274-1:1994 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**

This European Standard incorporates by dated or undated reference, provisions from other publications. These normative references are cited at the appropriate places in the text and the publications are listed hereafter. For dated references, subsequent amendments to or revisions of any of these publications apply to this European Standard only when incorporated in it by amendment or revision. For undated references the latest edition of the publication referred to applies (including amendments).

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 QC 001001	1986	Basic rules of the IEC Quality Assessment System for Electronic Components (IECQ)	-	-
IEC QC 001002	1986	Rules of procedure of the IEC Quality Assessment System for Electronic Components (IECQ)	-	-
IEC 27	series	Letter symbols to be used in electrical technology	HD 245	series
IEC 68	series	Environmental testing	EN 60068 HD 323	series series
IEC 410	1973	Sampling plans and procedures for inspection by attributes	-	-
IEC 617	series	Graphical symbols for diagrams	EN 60617	series
IEC 695-2-2	1991	Fire hazard testing Part 2: Test methods Section 2: Needle-flame test	EN 60695-2-2	1994
IEC 874-1	1993	Connectors for optical fibres and cables Part 1: Generic specification	-	-
IEC 1300	series	Fibre optic interconnecting devices and passive components - Basic test and measurement procedures	-	-
ISO 129	1985	Technical drawings - Dimensioning General principles, definitions, methods of execution and special indications	-	-
ISO 286-1	1988	ISO system of limits and fits Part 1: Bases of tolerances, deviations and fits	EN 20286-1	1993
ISO 370	1975	Toleranced dimensions - Conversion from inches into millimetres and vice versa	-	-

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<u>Publication</u>	<u>Year</u>	<u>Title</u>	<u>EN/HD</u>	<u>Year</u>
ISO 1101	1983	Technical drawings - Geometrical tolerancing - Tolerancing of form, orientation, location and run-out Generalities, definitions, symbols, indications on drawings	-	-

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**Raccords pour fibres optiques**

**Partie 1:**  
**Spécification générique**

**iTeh STANDARD PREVIEW**  
**Fibre optic adaptors**  
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**Part 1:**  
**Generic specification**

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## INTERNATIONAL ELECTROTECHNICAL COMMISSION

## FIBRE OPTIC ADAPTORS

## Part 1: Generic specification

## FOREWORD

- 1) The IEC (International Electrotechnical Commission) is a worldwide organization for standardization comprising all national electrotechnical committees (IEC National Committees). The object of the IEC is to promote international cooperation on all questions concerning standardization in the electrical and electronic fields. To this end and in addition to other activities, the IEC publishes International Standards. 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. The IEC collaborates closely with the International Organization for Standardization (ISO) in accordance with conditions determined by agreement between the two organizations.
- 2) The formal decisions or agreements of the IEC on technical matters, prepared by technical committees on which all the National Committees having a special interest therein are represented, express, as nearly as possible, an international consensus of opinion on the subjects dealt with.
- 3) They have the form of recommendations for international use published in the form of standards, technical reports or guides and they are accepted by the National Committees in that sense.
- 4) In order to promote international unification, IEC National Committees undertake to apply IEC International Standards transparently to the maximum extent possible in their national and regional standards. Any divergence between the IEC Standard and the corresponding national or regional standard shall be clearly indicated in the latter.
- 5) The IEC provides no marking procedure to indicate its approval and cannot be rendered responsible for any equipment declared to be in conformity with one of its standards.

International Standard IEC 1274-1 has been prepared by sub-committee 86B: Fibre optic interconnecting devices and passive components, of IEC technical committee 86: Fibre optics.

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

DIS	Report on voting
86B(CO)141	86B(CO)169

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

IEC 1274 consists of the following parts, under the general title: *Fibre optic adaptors*

- Part 1: 1994, Generic specification;
- Part 1-1: 1994, Blank detail specification.

Annex A is for information only.

The QC number that appears on the front cover of this publication is the specification number in the IEC Quality Assessment System for Electronic Components (IECQ).

## FIBRE OPTIC ADAPTORS

### Part 1: Generic specification

#### 1 General

##### 1.1 Scope

This part of IEC 1274 relates to individual fibre optic adaptors. It covers the following types of adaptors:

- adaptors for connecting a plug connector to an identical type of plug connector;
- adaptors for connecting one type of plug connector to a different type of plug connector;
- adaptors for connecting a fibre optic connector to other optical devices such as LEDs, switches, etc.

The specification includes:

- adaptor requirements;
- quality assessment procedures.

##### 1.2 Normative references

The following normative documents contain provisions which, through reference in this text, constitute provisions of this part of IEC 1274. At the time of publication, the editions indicated were valid. All normative documents are subject to revision, and parties to agreements based on this part of IEC 1274 are encouraged to investigate the possibility of applying the most recent editions of the normative documents indicated below. Members of IEC and ISO maintain registers of currently valid International Standards.

IEC QC 001001: 1986, *Basic Rules of the IEC Quality Assessment System for Electronic Components (IECQ)*

IEC QC 001002: 1986, *Rules of Procedure of the IEC Quality Assessment System for Electronic Components (IECQ)*

IEC 27: *Letter symbols to be used in electrical technology*

IEC 68: *Environmental testing*

IEC 410: 1973, *Sampling plans and procedures for inspection by attributes*

IEC 617: *Graphical symbols for diagrams*

IEC 695-2-2: 1991, *Fire hazard testing – Part 2: Test methods – Section 2: Needle-flame test*

IEC 874-1: 1993, *Connectors for optical fibres and cables – Part 1: Generic specification*

IEC 1300: 19XX, *Basic measurement and test procedures for passive fibre optic components (under consideration)*

ISO 129: 1985, *Technical drawings – Dimensioning – General principles, definitions, methods of execution and special indications*

ISO 286-1:1988, *ISO system of limits and fits – Part 1: Base of tolerances, deviations and fits*

ISO 370: 1975, *Toleranced dimensions – Conversion from inches into millimetres and vice versa*

ISO 1101: 1983, *Technical drawings – Geometrical tolerancing – Tolerances of form, orientation, location and run-out – Generalities, definitions, symbols, indications on drawings*

### 1.3 Definitions

For the purposes of this part of IEC 1274, the following definitions apply.

**1.3.1 adaptor – fibre optic:** A fixed or free component to permit optical connection(s) between two or more optical fibre connectors or between an optical fibre connector and another optical component such as an active device or switch. The adaptor is used where direct connection between the components is mechanically impossible.

### 1.4 Abbreviations

NSI: National Supervising Inspectorate

QPL: Qualified Products List.

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## 2 Requirements

### 2.1 Qualification

Components furnished to this specification shall be authorized by the NSI for listing on the QPL under the qualification procedure in accordance with 11.3.1 of QC 001002.

### 2.2 Classification

Adaptors are classified, either totally or in part, by the following categories:

- type;
- variant;
- climatic category;
- environmental category;
- assessment level.

See table 1 for an example of a complete adaptor classification.