

**Isiklikud silmakaitsevahendid. Laserite
ja lasersüsteemide justeerimisel
kasutatavad silmakaitsevahendid
(laserite justeerimise
silmakaitsevahendid)**

Personal eye-protection - Eye-protectors for
adjustment work on lasers and laser systems (laser
adjustment eye-protectors)

EESTI STANDARDI EESSÕNA

NATIONAL FOREWORD

<p>Käesolev Eesti standard EVS-EN 208:1999 sisaldab Euroopa standardi EN 208:1998 ingliskeelset teksti.</p> <p>Käesolev dokument on jõustatud 23.11.1999 ja selle kohta on avaldatud teade Eesti standardiorganisatsiooni ametlikus väljaandes.</p> <p>Standard on kättesaadav Eesti standardiorganisatsioonist.</p>	<p>This Estonian standard EVS-EN 208:1999 consists of the English text of the European standard EN 208:1998.</p> <p>This document is endorsed on 23.11.1999 with the notification being published in the official publication of the Estonian national standardisation organisation.</p> <p>The standard is available from Estonian standardisation organisation.</p>
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<p>Käsitlusala: Käesolev Euroopa standard kehtib laserite reguleerimisel kasutatavate silmakaitsevahendite kohta. Nendeks on normdokumendi EN 60825 - 1:1994 määratluse kohaselt filtrid ja silmakaitsevahendid, mida kasutatakse laserite ja lasersüsteemide reguleerimisel (s.t. LED (valgusdiodi) kiirgus kaasa arvatud). Standard hõlmab nähtava spektri vahemikus 400 nm kuni 700 nm esinevat kiirgust. Käesolevas standardis esitatud filtrid vähendavad seda kiirgust 2. klassi laseritele ette nähtud väärtusteni (või CW (pidevtoimelaserite) korral 1 mW-ni). Sel juhul aitavad silmi kaitsta ka ärritusreaktsioonid, kaasa arvatud pilgutusrefleks. Käesolev standard määrab kindlaks tehnilised andmed, testimismeetodid ja märgistuse. Valiku- ja kasutusjuhised on esitatud lisa B.</p>	<p>Scope:</p>
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ICS 13.340.20

Võtmesõnad: kaitsevahendid, kiirguskaitse, laserikiirgus, läbilaskvustegur, maksimaalväärtus, märgistamine, prillid, silmad, tehnilised andmed, testid, õnnetuse vältimine

EUROPEAN STANDARD

EN 208

NORME EUROPÉENNE

EUROPÄISCHE NORM

September 1998

ICS 13.340.20

Supersedes EN 208:1993

Descriptors: accident prevention, eyes, safety devices, eyeglasses, radiation protection, laser radiation, specifications, transmittance, maximal value, tests, marking

English version

Personal eye-protection - Eye-protectors for adjustment work on lasers and laser systems (laser adjustment eye-protectors)

Protection individuelle de l'oeil - Lunettes de protection pour les travaux de réglage sur les lasers et sur les systèmes laser (lunettes de réglage laser)

Persönlicher Augenschutz - Augenschutzgeräte für Justierarbeiten an Lasern und Laseraufbauten (Laser-Justierbrillen)

This European Standard was approved by CEN on 24 August 1998.

CEN 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 CEN 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 CEN member into its own language and notified to the Central Secretariat has the same status as the official versions.

CEN members are the national standards bodies of Austria, Belgium, Czech Republic, Denmark, Finland, France, Germany, Greece, Iceland, Ireland, Italy, Luxembourg, Netherlands, Norway, Portugal, Spain, Sweden, Switzerland and United Kingdom.



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Foreword

This European Standard has been prepared by Technical Committee CEN/TC 85 "Eye protective equipment", the secretariat of which is held by AFNOR.

This European Standard supersedes EN 208:1993.

This European Standard shall be given the status of a national standard, either by publication of an identical text or by endorsement, at the latest by March 1999, and conflicting national standards shall be withdrawn at the latest by March 1999.

This European Standard has been prepared under a mandate given to CEN by the European Commission and the European Free Trade Association, and supports essential requirements of EU Directive(s).

For relationship with EU Directive(s), see informative Annex ZA, which is an integral part of this standard.

Annexes A, B and ZA are informative.

According to the CEN/CENELEC Internal Regulations, the national standards organizations of the following countries are bound to implement this European Standard: Austria, Belgium, Czech Republic, Denmark, Finland, France, Germany, Greece, Iceland, Ireland, Italy, Luxembourg, Netherlands, Norway, Portugal, Spain, Sweden, Switzerland and the United Kingdom.

1 Scope

This European standard applies to laser adjustment filters and eye-protectors. These are filters and eye-protectors for use in adjustment work on lasers and laser systems as defined in EN 60825-1:1994 (i.e. LED (Light Emitting Diode) radiation is included) where hazardous radiation occurs in the visible spectral range of 400 nm to 700 nm. Filters specified in this standard reduce this radiation to values defined for lasers of class 2 ($\leq 1\text{mW}$ for CW (Continuous wave) lasers). In this case aversion responses including the blink reflex contribute to eye protection.

This standard defines the requirements, test methods and marking. A guide is given in annex B with regard to selection and use.

EN 207 applies to eye-protection against laser radiation where aversion responses including the blink reflex is not stipulated and laser radiation outside the visible spectral range.

NOTE : Before selecting eye protection according to this standard a risk assessment should first be undertaken (see annex B).

2 Normative references

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.

EN 166:1995	Personal eye-protection - Specifications
EN 167:1995	Personal eye-protection - Optical test methods
EN 168:1995	Personal eye-protection - Non-optical test methods
EN 207:1998	Personal eye-protection - Filters and eye-protectors against laser radiation (laser eye-protectors)
EN 60825-1:1994	Safety of laser products, equipment classification, requirements and user's guide
ISO/CIE 10526: 1991	CIE standard colorimetric illuminants
ISO/CIE 10527: 1991	CIE standard colorimetric observers