

TULETÕRJUJATE KIIVRID. KIIVRID PÄÄSTETÖÖDEKS

Firefighters helmets - Helmets for technical rescue

EESTI STANDARDI EESSÕNA

NATIONAL FOREWORD

See Eesti standard EVS-EN 16473:2015 sisaldab Euroopa standardi EN 16473:2014 ingliskeelset teksti.	This Estonian standard EVS-EN 16473:2015 consists of the English text of the European standard EN 16473:2014.
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English Version

Firefighters helmets - Helmets for technical rescue

Casques de sapeurs-pompiers - Casques pour les
opérations de secours technique

Feuerwehrhelme - Helme für technische Rettung

This European Standard was approved by CEN on 2 November 2014.

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Foreword

This document (EN 16473:2014) has been prepared by Technical Committee CEN/TC 158 “Head protection”, the secretariat of which is held by BSI.

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of an identical text or by endorsement, at the latest by June 2015 and conflicting national standards shall be withdrawn at the latest by June 2015.

Attention is drawn to the possibility that some of the elements of this document may be the subject of patent rights. CEN [and/or CENELEC] shall not be held responsible for identifying any or all such patent rights.

This document 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 document.

The purpose of this European Standard is to provide minimum performance requirements for helmets designed for use for technical rescue operations and associated activities by for example firefighters, rescue and medical personnel as described in the scope. Consequently, the protective helmet should be comfortable, light and commensurate with the risks to which the rescue personnel may be exposed in order to be effective.

According to the CEN-CENELEC Internal Regulations, the national standards organizations of the following countries are bound to implement this European Standard: Austria, Belgium, Bulgaria, Croatia, Cyprus, Czech Republic, Denmark, Estonia, Finland, Former Yugoslav Republic of Macedonia, France, Germany, Greece, Hungary, Iceland, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, Netherlands, Norway, Poland, Portugal, Romania, Slovakia, Slovenia, Spain, Sweden, Switzerland, Turkey and the United Kingdom.

1 Scope

This European Standard specifies the minimum requirements for technical rescue helmets. These helmets are intended to protect the upper head mainly against the effects of mechanical hazards such as impact and penetration, flame, electrical and chemical hazards while conducting technical rescue and associated activities.

Technical rescues involve the environments and conditions associated with operational scenarios such as but not limited to those found during road traffic collisions, railway incidents and when working in and around collapsed structures, often for extended periods of time, after natural disasters (flood, earthquake, etc.).

Requirements for marking and information to be supplied by the manufacturer are included.

Helmets for use while firefighting in buildings and other structures or in wildland firefighting environments, are not covered by this European Standard see EN 443 and EN 16471.

Helmets for use in water rescue operations using craft, such as boats, canoes etc., are also not covered by this European Standard.

Protection of the face and eyes, when not provided by visors, ears and neck might require additional items of personal protective equipment (PPE), which are not covered by this European Standard.

2 Normative references

The following documents, in whole or in part, are normatively referenced in this document and are indispensable for its application. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

EN 168:2001, *Personal eye-protection - Non-optical test methods*

EN 960:2006, *Headforms for use in the testing of protective helmets*

EN 1811, *Reference test method for release of nickel from all post assemblies which are inserted into pierced parts of the human body and articles intended to come into direct and prolonged contact with the skin*

EN 13087-1:2000, *Protective helmets - Test methods - Part 1: Conditions and conditioning*

EN 13087-2, *Protective helmets - Test methods - Part 2: Shock absorption*

EN 13087-3:2000, *Protective helmets - Test methods - Part 3: Resistance to penetration*

EN 13087-4, *Protective helmets - Test methods - Part 4: Retention system effectiveness*

EN 13087-5:2012, *Protective helmets - Test methods - Part 5: Retention system strength*

EN 13087-6, *Protective helmets - Test methods - Part 6: Field of vision*

EN 13087-7:2000, *Protective helmets - Test methods - Part 7: Flame resistance*

EN 13087-8:2000, *Protective helmets - Test methods - Part 8: Electrical properties*

EN ISO 13688:2013, *Protective clothing - General requirements (ISO 13688:2013)*

EN 14458:2004, *Personal eye-equipment - Faceshields and visors for use with firefighters' and high performance industrial safety helmets used by firefighters, ambulance and emergency services*

ISO 1817:2005¹⁾, *Rubber, vulcanized — Determination of the effect of liquids*

ISO 6344-1, *Coated abrasives — Grain size analysis — Part 1: Grain size distribution test*

ISO 17493, *Clothing and equipment for protection against heat — Test method for convective heat resistance using a hot air circulating oven*

3 Terms and definitions

For the purposes of this document, the following terms and definitions apply.

3.1
helmet for technical rescue
headwear, including all integral components supplied by the manufacturer, intended primarily to protect the upper part of a wearer's head against hazards which may occur during technical rescue activities

Note 1 to entry: Hereafter, helmets for technical rescue are referred to as helmets.

3.2
helmet shell
component in hard material with a smooth finish, which gives the helmet its general shape

3.3
protective padding
material and/or suspension system which serves to dampen impact energy

3.4
retention system
those parts which are responsible for securing the helmet in position on the head, including items which enable adjustment or improved comfort

3.5
chin strap
part of a retention system, including a strap which passes under or on the wearer's chin and which helps to ensure that the helmet is correctly maintained in place

3.6
head form
shape replacing the head which is used for testing certain characteristics

Note 1 to entry: The head form is designed in accordance with EN 960.

3.7
accessories
additional device(s) supplied or recommended by the manufacturer which may be attached to the helmet but which provide no protective function to the wearer

EXAMPLES Lamp brackets, cable clips, badges and trims.

1) ISO 1817:2005 is replaced by ISO 1817:2011, *Rubber, vulcanized or thermoplastic — Determination of the effect of liquids*.