

Footwear - Testmethods for heels and top pieces - Top piece retention strength

Footwear - Test methodsfor heels and top pieces Top piece retention strengtto



## NATIONAL FOREWORD

| Käesolev Eesti standard EVS-EN ISO 19958:2004 sisaldab Euroopa standardi EN ISO 19958:2004 ingliskeelset teksti. <br> Käesolev dokument on jõustatud 21.12.2004 ja selle kohta on avaldatud teade Eesti standardiorganisatsiooni ametlikus väljaandés. <br> Standard on kättesaadav Eesti standardiorganisatsioonist. | This Estonian standard EVS-EN ISO 19958:2004 consists of the English text of the European standard EN ISO 19958:2004. <br> This document is endorsed on 21.12.2004 with the notification being published in the official publication of the Estonian national standardisation organisation. <br> The standard is available from Estonian standardisation organisation. |
| :---: | :---: |
| Käsitlusala: <br> This draft International Standard specifies a test method for measuring the force required to detach the top piecefrom the underside of the shoe heel. The testis applicable to heels with the top piece already attached which have been removed from complete shoes, to heels alone with the top piece attached and, in some instances, to heels with separate push-in top pieces. All heels, except reinforced slender heels with top pieces attached by steel spigots and built stacked heels, may be tested by this method | Scope: <br> This draft International Standard specifies a test method for measuring the force required to detach the top piece from the underside of the shoe heel. The test is applicable to heels with the top piece already attached which have been removed from complete shoes, to heels atone with the top piece attached and, in some instances, to heels with separate pushtin top pieces. All heels, except reinforced slender heels with top pieces attached by steel spigots and built stacked heels, may be tested by this method |

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Võtmesõnad: definition, definitions, fitness for purpose, footwear heels, heels, operating requirements, shoe manufacture, shoes, strength of materials, testing


Schuhe - Prüfverfahren für Absätze und Oberflecken - Haltefestigkeit von Oberflecken (ISO 19958: 2004)

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## CEN

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## Foreword

This document (EN ISO 19958:2004) has been prepared by Technical Committee CEN /TC 309 "Footwear", the secretariat of which is held by AENOR, in collaboration with Fechnical Committee ISO/TC 216 "Footwear".
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 2005, and conflicting national standards shall be withdrawn at the latest by March 2005.
According to the CEN/CENELEC Internal Regulations, the national standards organizations of the following countries are bound to implement this European Standard: Austria, Belgium, Cyprus, Czech Republic, Denmark, Estonia, Finland, France, Germany, Greece, Hungary, Iceland, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, Netherlands, Norway, Poland, Portugal, Slovakia, Slovenia, Spain, Sweden, Switzerland and United Kingdom.

## 1 Scope

This European Standard specifies a test method for measuring the force required to detach the top piece from the underside of the shoe heel. The test is applicable to heels with the top piece already attached which have been removed from complete shoes, to heels alone with the top piece attached and, in some instances, to heels with separate push-in top pieces. All heels, except reinforced slender heels with top pieces attached by steel spigots and built stacked heels, can be tested by this method.

## 2 Normative references

The following referenced document is 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) appli

EN ISO 7500-1 Metallic materials - Verification of static uniaxial testing machines - Part 1: Tension/compression testing machines (ISO 7500-1:1999).

## 3 Terms and definitions

For the purposes of this European Standard, the following term and definition apply.

## top piece retention strength

maximum force, expressed in Newton, required to pull off a top piece from the heel

## 4 Apparatus and materials

4.1 The following apparatus and materials shall beused.
4.2 Tensile testing machine, complying with the requirements of EN ISO 7500-1 class 2, with a range of 0 N to 1000 N and a constant-rate-of-loading of $15 \mathrm{~N} / \mathrm{s} \pm 5 \mathrm{~N} / \mathrm{s}$. A constant-rate-of-traverse tester, for which increase of force produces an appreciable movement of the load jaw (e.g. a "pendulum" tester"), may be used if the rate of traverse is set to give, on average, the specified rate of force application when a test is carried out. Alternatively, a constant-rate-of-traverse tester for which there is little movement on the load jaw may be used if the top piece is attached to one jaw of the tester via one or more extensible cords which are substantially elastic over the force range of the test and the rate of traverse is adjusted until the specified rate of force application is obtained.
4.3 Drill, with twist drill beats of suitable sizes (see 5.2.1.4 and 5.2.1.5)
4.4 Bolt, of size M 4 or size M 3 for slender heels, and preferably of length 40 mm or more with a small metal ring or loop attached to its head by brazing. If only low heels are being tested, however, the bolt need not be longer than about 20 mm .
4.5 Rod, of diameter 2 mm and appropriate length or one or more strong extensible cords, e.g. nylon shoes laces.

## 5 Sampling and conditioning

### 5.1 General

The form of the test piece needs to be varied according to the height of the heels. For medium and high heels the type of test piece shown in Figure 1 is convenient, in which the heel is held by one cord or rod. For heels of less than about 20 mm in height this cord is likely to interfere with the bolt attached to the top piece. In such cases the form of attachment shown in Figure 2 should be used.

