

Footwear and footwear components - Quantitative challenge test method to assess antifungal activity (ISO 20150:2019)

## EESTI STANDARDI EESSÕNA

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English Version

Footwear and footwear components - Quantitative  
challenge test method to assess antifungal activity (ISO  
20150:2019)

Chaussures et composants de chaussure - Méthode de  
test d'épreuve quantitatif pour évaluer l'activité  
antifongique (ISO 20150:2019)

Schuhe und Schuhbestandteile - Quantitatives  
Challengetestverfahren zur Bestimmung der  
antimykotischen Wirksamkeit (ISO 20150:2019)

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## European foreword

This document (EN ISO 20150:2019) has been prepared by Technical Committee ISO/TC 216 "Footwear" in collaboration with Technical Committee CEN/TC 309 "Footwear" the secretariat of which is held by UNE.

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of an identical text or by endorsement, at the latest by August 2019, and conflicting national standards shall be withdrawn at the latest by August 2019.

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

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## Endorsement notice

The text of ISO 20150:2019 has been approved by CEN as EN ISO 20150:2019 without any modification.

# Contents

	Page
Foreword .....	v
<b>1 Scope .....</b>	<b>1</b>
<b>2 Normative references .....</b>	<b>1</b>
<b>3 Terms and definitions .....</b>	<b>1</b>
<b>4 Principle .....</b>	<b>2</b>
<b>5 Safety .....</b>	<b>2</b>
<b>6 Apparatus .....</b>	<b>2</b>
<b>7 Reagents and culture medium .....</b>	<b>3</b>
7.1 General .....	3
7.2 Water .....	3
7.3 Malt medium .....	3
7.3.1 Composition .....	3
7.3.2 Preparation .....	3
7.4 Malt extract agar (MEA) medium .....	4
7.4.1 Composition .....	4
7.4.2 Preparation .....	4
7.5 Physiological saline (sodium chloride solution) .....	4
7.5.1 Composition .....	4
7.5.2 Preparation .....	4
7.6 Wetting agent (nonionic surfactant) .....	4
7.7 Buffer solution .....	4
7.7.1 Buffer stock .....	4
7.7.2 Preparation of buffer stock .....	5
7.7.3 Preparation of buffer solution .....	5
<b>8 Test microorganisms .....</b>	<b>5</b>
<b>9 Preparation of test inoculums .....</b>	<b>5</b>
9.1 Indications for use of strains .....	5
9.2 Preparation of inoculums of <i>Candida albicans</i> .....	6
9.3 Preparation of test spore suspension of filamentous micro-fungi .....	6
<b>10 Preparation of test specimens .....</b>	<b>6</b>
10.1 General .....	6
10.2 Test specimen .....	7
10.3 Pre-treatment of test specimen .....	7
<b>11 Test procedure .....</b>	<b>7</b>
11.1 Summary of test methods .....	7
11.2 Dynamic challenge tests .....	7
11.2.1 Inoculation .....	7
11.2.2 Neutralization and elution after inoculation (time 0 h) .....	8
11.2.3 Incubation .....	8
11.2.4 Neutralization and elution after incubation (time 24 h) .....	8
11.2.5 Determination of the number of viable micro-fungi .....	8
11.3 Static challenge test .....	8
11.3.1 Inoculation .....	8
11.3.2 Neutralization and elution after inoculation (time 0 h) .....	9
11.3.3 Incubation .....	9
11.3.4 Neutralization and elution after incubation (time 24 h) .....	9
11.3.5 Determination of the number of viable micro-fungi .....	9
<b>12 Expression of results .....</b>	<b>9</b>
12.1 Calculation of the number of viable micro-fungi .....	9
12.2 Judgement of test effectiveness .....	9

12.3	Calculation of antifungal activity ratio .....	10
13	Test report.....	10
	Bibliography.....	12

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## Foreword

ISO (the International Organization for Standardization) is a worldwide federation of national standards bodies (ISO member bodies). The work of preparing International Standards is normally carried out through ISO technical committees. Each member body interested in a subject for which a technical committee has been established has the right to be represented on that committee. International organizations, governmental and non-governmental, in liaison with ISO, also take part in the work. ISO collaborates closely with the International Electrotechnical Commission (IEC) on all matters of electrotechnical standardization.

The procedures used to develop this document and those intended for its further maintenance are described in the ISO/IEC Directives, Part 1. In particular, the different approval criteria needed for the different types of ISO documents should be noted. This document was drafted in accordance with the editorial rules of the ISO/IEC Directives, Part 2 (see [www.iso.org/directives](http://www.iso.org/directives)).

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This document was prepared by Technical Committee ISO/TC 216, *Footwear*.

Any feedback or questions on this document should be directed to the user's national standards body. A complete listing of these bodies can be found at [www.iso.org/members.html](http://www.iso.org/members.html).

# Footwear and footwear components — Quantitative challenge test method to assess antifungal activity

**CAUTION** — Test methods specified herein require the use of micro-fungi. These tests are only to be carried out in facilities with containment techniques for handling microorganisms and by persons with training and experience in the use of microbiological techniques.

## 1 Scope

This document specifies quantitative challenge test methods for evaluating the antifungal activity of footwear and footwear components.

This document is applicable only to footwear and components that claim to have antifungal (antimycotic) properties or antimicrobial properties.

Two methods can be applied. The choice of method depends on the material properties and test microorganisms. Dynamic challenge test method can be applied to all types of materials. For single absorbent materials, static challenge test method is recommended. Brief descriptions of each method are given in [11.2](#) and [11.3](#).

## 2 Normative references

The following documents are referred to in the text in such a way that some or all of their content constitutes requirements 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.

ISO 7218, *Microbiology of food and animal feeding stuffs — General requirements and guidance for microbiological examinations*

ISO 19952, *Footwear — Vocabulary*

## 3 Terms and definitions

For the purpose of this document, the terms and definitions given in ISO 19952 and the following apply.

ISO and IEC maintain terminological databases for use in standardization at the following addresses:

— ISO Online browsing platform: available at <https://www.iso.org/obp>

— IEC Electropedia: available at <http://www.electropedia.org/>

### 3.1

#### **antifungal activity**

antimycotic activity

efficacy of a material or finish used to prevent or mitigate the growth of micro-fungi, to reduce the number of micro-fungi or to kill micro-fungi

### 3.2

#### **control specimen**

material identical to the test material but without antifungal treatment

Note 1 to entry: If no control specimen is available, sterilized conical flask can be used as control specimen.