SVENSK STANDARD SS-EN IEC 63203-201-3

Fastställd	Utgåva	Sida	Ansvarig kommitté
2022-01-26	1	1 (1+15)	SEK TK IoT

Bärbar elektronik – Del 201-3: Elektroniska textiler – Bestämning av elektrisk resistans i ledande textiler vid simulerade mikroklimat

Wearable electronic devices and technologies – Part 201-3: Electronic textile – Determination of electrical resistance of conductive textiles under simulated microclimate

Som svensk standard gäller europastandarden EN IEC 63203-201-3:2021. Den svenska standarden innehåller den officiella engelska språkversionen av EN IEC 63203-201-3:2021.

Nationellt förord

Europastandarden EN IEC 63203-201-3:2021

består av:

– **europastandardens ikraftsättningsdokument,** utarbetat inom CENELEC
– **IEC 63203-201-3, First edition, 2021 - Wearable electronic devices and technologies - Part 201-3: Electronic textile - Determination of electrical resistance of conductive textiles under simulated microclimate**

utarbetad inom International Electrotechnical Commission, IEC.

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EUROPEAN STANDARD

NORME EUROPÉENNE

EUROPÄISCHE NORM

EN IEC 63203-201-3

May 2021

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English Version

Wearable electronic devices and technologies - Part 201-3: Electronic textile - Determination of electrical resistance of conductive textiles under simulated microclimate (IEC 63203-201-3:2021)

Technologies et dispositifs électroniques prêts-à-porter - Partie 201-3: Textile électronique - Détermination de la résistance électrique des textiles conducteurs sous microclimat simulé (IEC 63203-201-3:2021)

Tragbare elektronische Geräte und Technologien - Teil 201-3: Elektronische Textilien - Bestimmung des elektrischen Widerstandes von leitfähigen Textilien unter simuliertem Mikroklima (IEC 63203-201-3:2021)

European Committee for Electrotechnical Standardization
Comité Européen de Normalisation Electrotechnique
Europäisches Komitee für Elektrotechnische Normung

CEN-CENELEC Management Centre: Rue de la Science 23, B-1040 Brussels

Ref. No. EN IEC 63203-201-3:2021 E

SEK Svensk Elstandard SS-EN IEC 63203-201-3, utg 1:2022

European foreword

The text of document 124/136/FDIS, future edition 1 of IEC 63203-201-3, prepared by IEC/TC 124 "Wearable electronic devices and technologies" was submitted to the IEC-CENELEC parallel vote and approved by CENELEC as EN IEC 63203-201-3:2021.

The following dates are fixed:

- latest date by which the document has to be implemented at national level by publication of an identical national standard or by endorsement (dop) 2022-02-12
- latest date by which the national standards conflicting with the document have to be withdrawn (dow) 2024-05-12

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

Endorsement notice

The text of the International Standard IEC 63203-201-3:2021 was approved by CENELEC as a European Standard without any modification.

In the official version, for Bibliography, the following note has to be added for the standard indicated:

ISO 8388:1998 NOTE Harmonized as EN ISO 8388:2003 (not modified)

Annex ZA
(normative)

Normative references to international publications with their corresponding European publications

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.

NOTE 1 Where an International Publication has been modified by common modifications, indicated by (mod), the relevant EN/HD applies.

NOTE 2 Up-to-date information on the latest versions of the European Standards listed in this annex is available here: www.cenelec.eu.

Publication	Year	Title	EN/HD	Year
ISO 139	-	Textiles - Standard atmospheres for conditioning and testing	EN ISO 139	-
ISO 11092	2014	Textiles - Physiological effects - Measurement of thermal and water-vapour resistance under steady-state conditions (sweating guarded-hotplate test)	EN ISO 11092	2014
ISO 21232	2018	Textiles - Determination of moisturizing effect of textile materials by measurement of microclimate between textiles and simulated human skin using sweating guarded hotplate	-	-
-	-	Textiles and textile products - Electrically conductive textiles - Determination of the linear electrical resistance of conductive tracks	EN 16812	2016

IEC 63203-201-3

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INTERNATIONAL STANDARD

NORME INTERNATIONALE

Wearable electronic devices and technologies – Part 201-3: Electronic textile – Determination of electrical resistance of conductive textiles under simulated microclimate

Technologies et dispositifs électroniques prêts-à-porter – Partie 201-3: Textile électronique – Détermination de la résistance électrique des textiles conducteurs sous microclimat simulé

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INTERNATIONAL ELECTROTECHNICAL COMMISSION

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WEARABLE ELECTRONIC DEVICES AND TECHNOLOGIES –

Part 201-3: Electronic textile – Determination of electrical resistance of conductive textiles under simulated microclimate

FOREWORD

1) The International Electrotechnical Commission (IEC) is a worldwide organization for standardization comprising all national electrotechnical committees (IEC National Committees). The object of IEC is to promote international co-operation on all questions concerning standardization in the electrical and electronic fields. To this end and in addition to other activities, IEC publishes International Standards, Technical Specifications, Technical Reports, Publicly Available Specifications (PAS) and Guides (hereafter referred to as "IEC Publication(s)"). 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. IEC collaborates closely with the International Organization for Standardization (ISO) in accordance with conditions determined by agreement between the two organizations.
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International Standard IEC 63203-201-3 has been prepared by IEC technical committee 124: Wearable electronic devices and technologies.

The text of this International Standard is based on the following documents:

FDIS	Report on voting
124/136/FDIS	124/142/RVD

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

This document has been drafted in accordance with the ISO/IEC Directives, Part 2.

A list of all parts in the IEC 63203 series, published under the general title *Wearable electronic devices and technologies*, can be found on the IEC website.

The committee has decided that the contents of this document will remain unchanged until the stability date indicated on the IEC website under "http://webstore.iec.ch" in the data related to the specific document. At this date, the document will be

- reconfirmed,
- withdrawn,
- replaced by a revised edition, or
- amended.

WEARABLE ELECTRONIC DEVICES AND TECHNOLOGIES –

Part 201-3: Electronic textile – Determination of electrical resistance of conductive textiles under simulated microclimate

1 Scope

This part of IEC 63203-201 specifies a test method for determination of the electrical resistance of conductive fabrics under simulated microclimate within clothing. The microclimate is the climate of the small air layer between the skin and clothing having a specific temperature and humidity. This test method can be applied to conductive fabrics including multilayer assemblies for use in clothing.

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 139, *Textiles – Standard atmospheres for conditioning and testing*

ISO 11092:2014, *Textiles – Physiological effects – Measurement of thermal and water-vapour resistance under steady-state conditions (sweating guarded-hotplate test)*

ISO 21232:2018, *Textiles – Determination of moisturizing effect of textile materials by measurement of microclimate between textiles and simulated human skin using sweating guarded hotplate*

EN 16812:2016, *Textiles and textile products – Electrically conductive textiles – Determination of the linear electrical resistance of conductive tracks*