SLOVENSKI STANDARD
SIST EN ISO 16972:2020

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Nadomešča:
SIST EN 132:1999

Oprema za varovanje dihal - Slovar in grafični simboli (ISO 16972:2020)

Respiratory protective devices - Vocabulary and graphical symbols (ISO 16972:2020)

Atemschutzgeräte - Begriffe und graphische Symbole (ISO 16972:2020)

Appareils de protection respiratoire - Vocabulaire et symboles graphiques (ISO 16972:2020)

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01.040.13	Okolje. Varovanje zdravja. Varnost (Slovarji)	Environment. Health protection. Safety (Vocabularies)
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EUROPEAN STANDARD

NORME EUROPÉENNE

EUROPÄISCHE NORM

EN ISO 16972

March 2020

ICS 01.040.13; 13.340.30

English Version

Respiratory protective devices - Vocabulary and graphical symbols(ISO 16972:2020)

Appareils de protection respiratoire - Vocabulaire et symboles graphiques (ISO 16972:2020)

Atemschutzgeräte - Begriffe und graphische Symbole (ISO 16972:2020)

This European Standard was approved by CEN on 23 February 2020.

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EUROPÄISCHES KOMITEE FÜR NORMUNG

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Contents

Page

European foreword

This document (EN ISO 16972:2020) has been prepared by Technical Committee ISO/TC 94 "Personal safety -- Personal protective equipment" in collaboration with Technical Committee CEN/TC 79 “Respiratory protective devices” the secretariat of which is held by DIN.

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of an identical text or by endorsement, at the latest by September 2020, and conflicting national standards shall be withdrawn at the latest by September 2020.

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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The text of ISO 16972:2020 has been approved by CEN as EN ISO 16972:2020 without any modification.

INTERNATIONAL STANDARD

ISO 16972

Second edition
2020-03

Respiratory protective devices — Vocabulary and graphical symbols

Appareils de protection respiratoire — Vocabulaire et symboles graphiques

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Contents

Page

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).

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For an explanation of the voluntary nature of standards, the meaning of ISO specific terms and expressions related to conformity assessment, as well as information about ISO's adherence to the World Trade Organization (WTO) principles in the Technical Barriers to Trade (TBT) see www.iso.org/iso/foreword.html.

This document was prepared by Technical Committee ISO/TC 94, *Personal safety — Personal protective equipment*, Subcommittee SC 15, *Respiratory protective devices*, in collaboration with the European Committee for Standardization (CEN) Technical Committee CEN/TC 79, *Respiratory protective devices*, in accordance with the Agreement on technical cooperation between ISO and CEN (Vienna Agreement).

This second edition cancels and replaces the first edition (ISO 16972:2010), which has been technically revised. The main changes compared with the previous edition are as follows:

— the terms used in the field of respiratory protective devices (RPD) have been updated;

— Clause 5, "Units of measurement", has been deleted;

— Annex A, "Terms and definitions referring to respiratory protective devices in current national standards, regulations or other national contexts", has been deleted;

— Annex B, "Abbreviations used", has been deleted.

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.

Respiratory protective devices — Vocabulary and graphical symbols

1 Scope

This document defines terms and specifies units of measurement for respiratory protective devices (RPDs), excluding diving apparatus. It indicates graphical symbols that can be required on RPDs, parts of RPD or instruction manuals in order to instruct the person(s) using the RPD as to its operation.

NOTE Terms and definitions for diving apparatus are given in EN 250.

2 Normative references

There are no normative references in this document.

3 Terms related to respiratory protective devices

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
abrasive blasting respiratory protective device
breathing apparatus (3.32) incorporating a protective *hood* (3.115) or a *blouse* (3.23) fitted with an *impact resistant* (3.119) *visor* (3.252)

Note 1 to entry: *Breathable air* (3.28) is supplied to the *wearer* (3.257) from a source of air not carried by the wearer.

3.2
accessory
item, or items, that are attached to the *respiratory protective device (RPD)* (3.203) that are not necessary for the RPD to meet the requirements of the RPD performance standard and do not compromise its protection

3.3
adequacy assessment
selection method identifying the *respiratory protective device* (3.203) is able to reduce the *wearer's* (3.257) inhalation exposure to acceptable levels

3.4
adequate respiratory protective device
adequate RPD
RPD (3.203) capable of reducing the inhalation exposure to an acceptable level

3.5
aerodynamic diameter
diameter of a unit density sphere having the same settling velocity as the *particle* (3.170) in question

3.6
aerosol
suspension of solid, liquid, or solid and liquid *particles* (3.170) in a gaseous medium, having a negligible falling velocity (generally considered to be less than 0,25 m/s)

3.7
aerosol penetration
ability of *particles* (3.170) to pass through a particle-filtering material

3.8
air flow resistance
pressure difference between upstream and downstream locations caused by the flow of air through the parts and components of a *respiratory protective device* (3.203) such as an *exhalation valve* (3.79), *inhalation valve* (3.120), *filter(s)* (3.86), and *tube* (3.245), etc.

3.9
air supply hose
fresh air supply hose
hose (3.116) for the supply of air at about atmospheric pressure

3.10
ambient air bypass
means to enable the *wearer* (3.257) to breathe the *ambient atmosphere* (3.12) before entering and after leaving a *hazardous atmosphere* (3.108)

3.11
ambient air system
device used to deliver ambient air at a *low pressure* (3.134) directly to a *breathable gas* (3.29) *respiratory protective device* (3.203) (manually or power assisted)

3.12
ambient atmosphere
air surrounding the *wearer* (3.257)

3.13
ambient concentration
concentration of a compound in the air surrounding the *wearer* (3.257)

3.14
ambient laboratory conditions
atmosphere where the temperature is between 16 °C and 32 °C and the relative humidity is between 20 % and 80 %

3.15
apertometer
extended hemispherical dome for measuring the angular area of the *field of vision* (3.85) [*peripheral isopter* (3.176)] of a *respiratory protective device* (3.203) when mounted on a *respiratory protective device headform* (3.204)

3.16
as received
not preconditioned or modified to carry out a test

3.17
assigned protection factor
APF
anticipated level of respiratory protection that would be provided by a properly functioning *respiratory protective device (RPD)* (3.203) or class of RPD within an effective *RPD programme* (3.207)

3.18
assisted filtering respiratory protective device
assisted filtering RPD
filtering RPD (3.90) where *breathable gas* (3.29) is actively supplied to the *wearer* (3.257) by the *RPD* (3.203)

3.19
averaged interactive flow rate
interactive flow rate (3.126) averaged over 10 consecutive *breathing cycles* (3.34) of the *breathing machine* (3.38)

3.20
averaged maximum interactive flow rate
average of the highest *flow rate* (3.92) within each *breathing cycle* (3.34) of 10 consecutive breathing cycles of the *breathing machine* (3.38)

3.21
averaged minimum interactive flow rate
average of the lowest *flow rate* (3.92) within each *breathing cycle* (3.34) of 10 consecutive breathing cycles of the *breathing machine* (3.38)

3.22
averaged peak interactive flow rate
average of the maximum peak *flow rate* (3.92) within each *breathing cycle* (3.34) of 10 consecutive breathing cycles of the *breathing machine* (3.38)

3.23
blouse
garment, used as a *facepiece* (3.83), that covers the head and upper part of the body to the waist and wrists and to which air is supplied

3.24
body harness
means to enable certain components of a *respiratory protective device* (3.203) to be worn on the body

3.25
body temperature pressure saturated
BTPS
standard condition for the expression of *ventilation* (4.20) parameters

Note 1 to entry: Body temperature (37 °C), atmospheric pressure 101,3 kPa and water vapour pressure (6,27 kPa) in saturated air.

3.26
breakthrough concentration
concentration of test *gas* (3.97) in effluent air at which a *gas filter* (3.98) undergoing a gas *capacity* (3.44) test is deemed exhausted

3.27
breakthrough time
t_{br}
time taken from the start of the test until the test *gas* (3.97) and specified reaction products are detected at the specified *breakthrough concentration* (3.26) at the downstream side of the *filter* (3.86) under test

3.28
breathable air
air of a quality that makes it suitable for safe respiration

Note 1 to entry: For compressed air for *breathing apparatus* (3.32), see EN 12021:2014.

3.29
breathable gas
mixture of *gases* (3.97) that is suitable for respiration without adverse effects to health