საქართველოს სტანდარტი

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> საქართველოს სტანდარტებისა და მეტროლოგიის ეროვნული სააგენტო თბილისი

სსტ ენ 12198-1:2000+A1:2008/2019

საინფორმაციო მონაცემები

- 1 **შემუშავებულია** საქართველოს სტანდარტების და მეტროლოგიის ეროვნული სააგენტოს სტანდარტების დეპარტამენტის მიერ
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4 პირველად

5 რეგისტრირებულია საქართველოს სტანდარტების და მეტროლოგიის ეროვნული სააგენტოს რეესტრში: 2019 წლის 6 დეკემბერი №268-1.3-016544

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Safety of machinery - Assessment and reduction of risks arising from radiation emitted by machinery - Part 1: General principles

Sécurité des machines - Estimation et réduction des risques engendrés par les rayonnements émis par les machines - Partie 1: Principes généraux

Sicherheit von Maschinen - Bewertung und Verminderung des Risikos der von Maschinen emittierten Strahlung - Teil 1: Allgemeine Leitsätze

This European Standard was approved by CEN on 25 May 2000 and includes Amendment 1 approved by CEN on 27 July 2008.

CEN members are bound to comply with the CEN/CENELEC Internal Regulations which stipulate the conditions for giving this European Standard the status of a national standard without any alteration. Up-to-date lists and bibliographical references concerning such national standards may be obtained on application to the CEN Management Centre or to any CEN member.

This European Standard exists in three official versions (English, French, German). A version in any other language made by translation under the responsibility of a CEN member into its own language and notified to the CEN Management Centre has the same status as the official versions.

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Foreword

This document (EN 12198-1:2000+A1:2008) has been prepared by Technical Committee CEN/TC 114 "Safety of machinery", 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of an identical text or by endorsement, at the latest by March 2009, and conflicting national standards shall be withdrawn at the latest by December 2009.

This document includes Amendment 1, approved by CEN on 2008-07-27.

This document supersedes EN 12198-1:2000.

The start and finish of text introduced or altered by amendment is indicated in the text by tags [A].

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 EC Directive(s).

For relationship with EC Directive(s), see informative Annexes ZA and ZB, which are integral parts of this document. (A)

This European Standard deals with the essential requirement "Radiation" (see EN 292-2, Annex A, paragraph 1.5.10).

The annexes A and B are normative, and the annex C is informative.

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, Cyprus, Czech Republic, Denmark, Estonia, Finland, France, Germany, Greece, Hungary, Iceland, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, Netherlands, Norway, Poland, Portugal, Romania, Slovakia, Slovenia, Spain, Sweden, Switzerland and United Kingdom.

Introduction

Machinery supplied by electrical power or containing radiation sources may emit radiation or generate electric and/or magnetic fields. The radiation emissions and fields will vary in frequency and magnitude.

The European Machinery Directive requires precautions to avoid or reduce risks caused by the emission of radiation from a machine. Machinery must be so designed and constructed that any emission of radiation is limited to the extent necessary for its operation and that the effects on exposed persons are non-existent or reduced to non-dangerous proportions (EN 292-2:1991/A1:1995).

To assess the risk of injury caused by radiation emissions and fields from a machine it is necessary to know the type of radiation emission, the level of the emission and the intensity of this emission with respect to possible adverse health effects.

This European Standard is intended to give manufacturers and type C-standards makers advice on how to identify radiation emissions from machinery, how to decide on their magnitude and significance, how to assess the risks and what means could be used to avoid or reduce the radiation emissions from machines.

This European Standard reflects the general principles for the identification and the assessment of radiation emission by machinery. Details of the measurement of the radiation emission will be given in part 2 of this standard. Part 3 of this standard will contain details of protective measures for avoiding or reducing radiation exposure of persons by reducing emissions and requiring the provision of information.

Radiation emitted by machinery may be intended for processing or may occur unintentionally. Clause 7 of this standard requires, that the manufacturer shall assign the machine to a design radiation emission category. For undesirable radiation emission the emission level should be reduced to values corresponding to category 0.

Functional radiation emission shall be limited to the necessary degree for the operation of the machine.

The remaining emission levels shall be assessed and an emission category shall be determined. If necessary protective measures will have to be applied.

This European Standard is a standard of B1-type in a series of standards for the safety of machinery.