Safety devices for protection against excessive pressure - Part 6: Application, selection and installation of device de de la constant de la const bursting disc safety devices (ISO 4126-6:2014)



# **EESTI STANDARDI EESSÕNA**

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See Eesti standard EVS-EN ISO 4126-6:2014 sisaldab Euroopa standardi EN ISO 4126-6:2014 inglisekeelset teksti.	This Estonian standard EVS-EN ISO 4126-6:2014 consists of the English text of the European standard EN ISO 4126-6:2014.
Standard on jõustunud sellekohase teate avaldamisega EVS Teatajas.	This standard has been endorsed with a notification published in the official bulletin of the Estonian Centre for Standardisation.
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# EUROPEAN STANDARD NORME EUROPÉENNE

# **EN ISO 4126-6**

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### **English Version**

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Dispositifs de sécurité pour protection contre les pressions excessives - Partie 6: Application, sélection et installation des dispositifs de sûreté à disque de rupture (ISO 4126-6:2014)

Sicherheitseinrichtungen gegen unzulässigen Überdruck -Teil 6: Berstscheibeneinrichtungen; Anwendung, Auswahl und Einbau (ISO 4126-6:2014)

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### **Foreword**

This document (EN ISO 4126-6:2014) has been prepared by Technical Committee ISO/TC 185 "Safety devices for protection against excessive pressure" in collaboration with Technical Committee CEN/TC 69 "Industrial valves" the secretariat of which is held by AFNOR.

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of an identical text or by endorsement, at the latest by December 2014, and conflicting national standards shall be withdrawn at the latest by December 2014.

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

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# **Endorsement notice**

J by CEN as The text of ISO 4126-6:2014 has been approved by CEN as EN ISO 4126-6:2014 without any modification.

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# Introduction

Safety devices for the protection of pressure equipment against excessive pressure include pressure relief devices such as safety valves and bursting disc safety devices which, dependent upon the application, may be used either as the sole pressure relieving devices or in conjunction with each other.

Operating problems frequently arise due to the use of pressure relieving devices not having been properly selected for the intended service or properly selected but whose performance is adversely affected by improper handling, wrong installation or lack of maintenance, any of which may affect the safety of the pressure equipment being protected.

It is important to consider not only the pressure relief devices but also the whole of the pressure relief system so as not to reduce the relieving capacity below that required or adversely affect the proper operation of the pressure relieving devices.

A bursting disc safety device is a non-reclosing pressure relief device which typically comprises a bursting disc, which is a pressure-containing and pressure-sensitive part designed to open by bursting at a predetermined pressure, and a bursting disc holder. There are many different types of bursting disc safety devices manufactured in corrosion resistant materials, both metallic and non-metallic, to cover a wide range of nominal sizes, burst pressures and temperatures. They are used to protect pressure equipment such as vessels, piping, gas cylinders or other enclosures from excessive pressure and/or excessive vacuum.

the req This standard covers the important considerations necessary in the application, selection and installation of bursting disc safety devices to give the required protection against excessive pressure and/or excessive vacuum.

# Safety devices for protection against excessive pressure —

# Part 6:

# Application, selection and installation of bursting disc safety devices

# 1 Scope

This International standard gives guidance on the application, selection and installation of bursting disc safety devices used to protect pressure equipment from excessive pressure and/or excessive vacuum.

Annex A provides a checklist for the information to be supplied by the purchaser to the manufacturer.

Annex B gives guidance on the replacement period of a bursting disc.

Annex C provides guidance for determining the discharge capacity, for single phase fluids, of a pressure relief system that contains a bursting disc safety device.

Annex D is a non-mandatory procedure for establishing the flow resistance of a burst bursting disc assembly.

Annex E is a non-mandatory procedure for type testing of bursting disc safety devices.

<u>Annex F</u> provides typical performance characteristics for various bursting disc safety device types.

The requirements for the manufacture, inspection, testing, marking, certification and packaging of bursting disc safety devices are given in ISO 4126-2.

# 2 Normative references

The following referenced documents, in whole or in part, are normatively referenced in this document and are indispensable for its application. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

ISO 4126-2, Safety devices for protection against excessive pressure — Part 2: Bursting disc safety devices

ISO 4126-3, Safety devices for protection against excessive pressure — Part 3: Safety valves and bursting disc safety devices in combination

# 3 Terms and definitions

For the purposes of this document, the terms and definitions given in ISO 4126-2 and the following apply.

#### 3.1

# bursting disc safety device

non-reclosing pressure relief device actuated by differential pressure and designed to function by the bursting of the bursting disc(s), and which is the complete assembly of installed components including, where appropriate, the bursting disc holder

#### 3.2

## bursting disc assembly

complete assembly of components, which are installed in the bursting disc holder to perform the desired function