Tööstuslikud ventiilid. Terasest loogikalülitusega ventiilid

Industrial valves - Steel gate valves



EESTI STANDARDI EESSÕNA

NATIONAL FOREWORD

Käesolev Eesti standard EVS-EN 1984:2000 sisaldab Euroopa standardi EN 1984:2000 ingliskeelset teksti.

Käesolev dokument on jõustatud 17.07.2000 ja selle kohta on avaldatud teade Eesti standardiorganisatsiooni ametlikus väljaandes.

Standard on kättesaadav Eesti standardiorganisatsioonist.

This Estonian standard EVS-EN 1984:2000 consists of the English text of the European standard EN 1984:2000.

This document is endorsed on 17.07.2000 with the notification being published in the official publication of the Estonian national standardisation organisation.

The standard is available from Estonian standardisation organisation.

Käsitlusala:

This Standard specifies the requirements for steel gate valves which are wrought, cast or fabricated with: - outside screw and yoke or inside screw; - single or double obturator; - wedge or parallel seating; - full bore or reduced bore; - end connections flanged, butt welding, socket welding or threaded. The range of nominal sizes and nominal pressures is given in 4.1.

Scope:

This Standard specifies the requirements for steel gate valves which are wrought, cast or fabricated with: - outside screw and yoke or inside screw; - single or double obturator; - wedge or parallel seating; - full bore or reduced bore; - end connections flanged, butt welding, socket welding or threaded. The range of nominal sizes and nominal pressures is given in 4.1.

ICS 23.060.30

Võtmesõnad:

EUROPEAN STANDARD NORME EUROPÉENNE EUROPÄISCHE NORM

EN 1984

January 2000

Ref. No. EN 1984: 2000 E

ICS 23.060.30

English version

Industrial valves Steel gate valves

Robinetterie industrielle – Robinet-vannes en acier Industriearmaturen – Schieber aus Stahl

This European Standard was approved by CEN on 1999-11-06.

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 Central Secretariat or to any CEN member.

The European Standards exist 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 Central Secretariat has the same status as the official versions.

CEN members are the national standards bodies of Austria, Belgium, the Czech Republic, Denmark, Finland, France, Germany, Greece, Iceland, Ireland, Italy, Luxembourg, the Netherlands, Norway, Portugal, Spain, Sweden, Switzerland, and the United Kingdom.

CEN

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

Central Secretariat: rue de Stassart 36, B-1050 Brussels

Contents

Foreword		2	
1	Scope		
2	Normative references	3	
3	Definitions	4	
4 4.1 4.2	Requirements Design Functional characteristics	5 5	
5	Test Procedures	9	
6	Declaration of compliance	10	
7	Designation	10	
8 8.1 8.2	Marking and preparation for storage and transportation Marking Preparation for storage and transportation	10	
	x A (informative) Information to be supplied by the customer		
Bibliography		12	
	x ZA (informative) Clauses of this European standard addressing essential requirements or other provisions of EU Directives		

Foreword

This European Standard has been prepared by 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 July 2000, and conflicting national standards shall be withdrawn at the latest by July 2000.

This European Standard has been prepared under a mandate given to CEN by the European Commission and the European Free Trade Association, and supports essential requirements of EU Directive(s).

For relationship with EU Directive(s), see informative Annex ZA, which is an integral part of this standard.

According to the CEN/CENELEC Internal Regulations, the national standards organizations of the following countries are bound to implement this European Standard: Austria, Belgium, Czech Republic, Denmark, Finland, France, Germany, Greece, Iceland, Ireland, Italy, Luxembourg, Netherlands, Norway, Portugal, Spain, Sweden, Switzerland and the United Kingdom.

Page 3 EN 1984 : 2000

1 Scope

This European standard specifies the requirements for steel gate valves which are wrought, cast or fabricated with end connections flanged, butt welding, socket welding or threaded.

This standard is applicable to steel gate valves mainly used for industrial and general purpose applications. However they can be used for other applications provided the requirements of the relevant performance standards are met.

The ranges of nominal sizes covered is:

DN8; DN10; DN12; DN15; DN20; DN25; DN32; DN40; DN50; DN65; DN80; DN100; DN125; DN150; DN200; DN250; DN300; DN350; DN400; DN450; DN500; DN600; DN700; DN750; DN800; DN900; DN1000

DN750 is used for Class designated valves only.

DN8 and DN12 are not used for flanged end connections.

Socket welding end valves and threaded end valves are limited to the range DN8 to DN65.

The range of pressure designations covered is:

a) for flanged valves

PN10; PN16; PN25; PN40; PN63; PN100

Class 150; Class 300; Class 600

b) for butt welding end valves

PN10, PN16, PN25, PN40, PN63, PN100

Class 150, Class 300, Class 600

c) for socket welding end valves and threaded end valves

PN10; PN16; PN25; PN40; PN63; PN100

Class 600; Class 800

The progress of work of the various standards referred to in the normative references can require revision of this standard

NOTE 1 Socket welding end and threaded end valves are not normally manufactured with the pressure designations PN10, PN16, PN25 and PN40.

NOTE 2 Class 800 is an intermediate class designation widely used for socket welding and threaded end valves.

2 Normative references

This European standard incorporates by dated or undated reference provisions from other publications. These normative references are cited at the appropriate places in the text and the publications are listed hereafter. For dated references, subsequent amendments to or revision to any of these publications apply to this European standard only when incorporated in it by amendment or revision. For undated references the latest edition of the publication referred to applies.

EN 287-1, Approval testing of welders — Fusion welding — Part 1: Steels

EN 288-1, Specification and qualification of welding procedures for metallic materials – Part 1: General rules for fusion welding

Page 4

EN 1984: 2000

EN 558-1, Industrial valves — Face-to-face and centre-to-face dimensions of metal valves for use in flanged pipe systems — Part 1: PN-designated valves

EN 558-2, Industrial valves — Face-to-face and centre-to-face dimensions of metal valves for use in flanged pipe systems — Part 2: Class designated valves

EN 736-1, Valves — Terminology — Part 1: Definition of types of valves

EN 736-2, Valves — Terminology — Part 2: Definition of components of valves

EN 736-3, Valves — Terminology — Part 3: Definition of terms

EN 1418, Welding personnel - Approval testing of welding operators for fusion welding and resistance weld setters for fully mechanized and automatic welding of metallic materials

EN 10045-1, Metallic materials — Charpy impact tests — Part 1: Test Method

EN 12760, Valves — Socket welding ends for steel valves

EN 12982, Industrial valves — End-to-end and centre-to-end dimensions for butt welding end valves

EN 12627, Industrial valves — Butt welding ends for steel valves

prEN 19:1996, Industrial valves - Marking

prEN 1092-1:1997, Flanges and their joints — Circular flanges for pipes, valves, fittings and accessories - PN designated — Part 1: Steel flanges

prEN 1503-1: 1994, Valves — Materials for bodies, bonnets and covers — Part 1: Steels specified in European Standards

prEN 1503-2: 1994, Valves — Materials for bodies, bonnets and covers — Part 1: Steels other than those specified in European Standards

prEN 12266-1:1999, Industrial valves - Testing of valves - Part 1: Tests, test procedures and acceptance criteria

prEN 12266-2:1999, Industrial valves— Testing of valves — Part 2: Supplementary tests, test procedures and acceptance criteria.

prEN 12516-3:1999, Industrial valves — Shell design strength— Part 3:Experimental Method.

prEN 12570:1996, Industrial valves — Permissible manual forces for operation of valves

ISO 7-1, Pipe threads where pressure-tight joints are made on the threads — Part 1: Dimensions, tolerances and designation

ISO 228-1, Pipe threads where pressure-tight joints are not made on the threads — Part 1: Dimensions, tolerances and designation

EN ISO 5210, Industrial valves — Multi-turn valve actuator attachments (ISO 5210:1991)

ASME B1.20-1, Pipe Threads, General Purpose (Inch)

NOTE European standard EN 1984 supports some of the essential requirements of the Pressure Equipment Directive 97/23/EC. The essential requirements covered are listed in annex ZA (informative). It should be noted that this standard is not self sufficient and should be used with the normative references listed herein. Reference should also be made to the annex ZA in the relevant normative reference.

3 Definitions

For the purposes of this standard the definitions of types of valves and components and the definitions of terms given in EN 736-1, EN 736-2 and EN 736-3 apply.