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Safety of machinery - Safety requirements for the design and Occurrence of the second of th construction of paper making and finishing machines - Part 7: Chests



EESTI STANDARDI EESSÕNA

NATIONAL FOREWORD

Käesolev Eesti standard EVS-EN 1034-7:2005+A1:2010 sisaldab Euroopa standardi EN 1034-7:2005+A1:2009 ingliskeelset teksti.

This Estonian standard EVS-EN 1034-7:2005+A1:2010 consists of the English text of the European standard EN 1034-7:2005+A1:2009.

Standard on kinnitatud Eesti Standardikeskuse 31.01.2010 käskkirjaga ja jõustub sellekohase teate avaldamisel EVS Teatajas.

This standard is ratified with the order of Estonian Centre for Standardisation dated 31.01.2010 and is endorsed with the notification published in the official bulletin of the Estonian national standardisation organisation.

Euroopa standardimisorganisatsioonide poolt rahvuslikele liikmetele Euroopa standardi teksti kättesaadavaks tegemise kuupäev on 02.12.2009.

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ICS 85.100

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EUROPEAN STANDARD

NORME EUROPÉENNE

EUROPÄISCHE NORM

December 2009

EN 1034-7:2005+A1

ICS 85,100

Supersedes EN 1034-7:2005

English Version

Safety of machinery - Safety requirements for the design and construction of paper making and finishing machines - Part 7: Chests

Sécurité des machines - Prescriptions de sécurité pour la conception et la construction de machines de fabrication et de finition du papier - Partie 7 : Cuviers

Sicherheit von Maschinen - Sicherheitstechnische Anforderungen an Konstruktion und Bau von Maschinen der Papierherstellung und Ausrüstung - Teil 7: Bütten

This European Standard was approved by CEN on 21 April 2005 and includes Amendment 1 approved by CEN on 17 November 2009.

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.

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EUROPEAN COMMITTEE FOR STANDARDIZATION COMITÉ EUROPÉEN DE NORMALISATION EUROPÄISCHES KOMITEE FÜR NORMUNG

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	ents	Page
	ord	
trodu	uction	
	Scope	4
	Normative references	4
	Terms and definitions	5
	List of significant hazards	5
	Safety requirements and/or measures	7
1	General	7
2	Power transmission elements	
3	Working platforms and means of access	
4 5	Inspection holes	
5 6	Electrical equipment	
о 7	Hydraulic and pneumatic equipment Level control devices	
, 3	Lighting	
)	Noise	
10	Equipment and measures for maintenance and clean	
11	Powered gate valves	
2	Emergency stop devices and emergency measures	9
3	Explosion protection	9
	Verification of safety requirements and/or measures.	
	Information for use	9
nnex	ZA (informative) Relationship between this European	Standard and the Essential
	Requirements of EU Directive 98/37/EC	
mex	ZB (informative) A Relationship between this Europe Requirements of EU Directive 2006/42/EC	an Standard and the Essential
	Requirements of EU Directive 2006/42/EC @	
		YX
		' O'
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		0,

Foreword

This document (EN 1034-7:2005+A1:2009) has been prepared by Technical Committee CEN/TC 198 "Printing and paper machinery - Safety", the secretariat of which is held by DIN.

This document shall be given the status of a national standard, either by publication of an identical text or by endorsement, at the latest by June 2010, and conflicting national standards shall be withdrawn at the latest by June 2010.

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.

This document includes Amendment 1, approved by CEN on 17 November 2009.

This document supersedes EN 1034-7:2005.

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

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 EU Directive(s)

For relationship with EU Directive(s), see informative Annexes ZA and ZB, which are integral parts of this document. (A1

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

This European Standard is a C type standard as stated in EN ISO 12100-1.

The extent to which hazards, hazardous situations and hazard results are covered is indicated in the scope of this standard.

For machines which have been designed and built in accordance with the stipulations of this C type standard, the following applies: where C type standard stipulations deviate from respective stipulations in A or B type standards, the stipulations made in this C type standard take precedence over stipulations in the other standards.

1 Scope

This European Standard applies to chests used in paper making and shall be applied together with [A] EN 1034-1:2000+A1:2010 [A]. It deals with all significant hazards, hazardous situations and hazard events relevant to chests when they are used as intended and under the conditions foreseen by the manufacturer (see clause 4). This European Standard does not apply to tanks for chemicals, storage tanks for starch and other additives used in paper making or basins or vessels for waste water resulting from the paper making process.

This European Standard does not apply to chests manufactured before the publication date of this European Standard.

2 Normative references

The following referenced documents are indispensable for the application of this European Standard. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

EN 294:1992, Safety of machinery — Safety distances to prevent danger zones being reached by the upper limbs.

EN 349:1993, Safety of machinery — Minimum gaps to avoid crushing of parts of the human body.

EN 418:1992, Safety of machinery — Emergency stop equipment — Functional aspects.

EN 547-2:1996, Safety of machinery — Human body measurement — Part 2: Principles for determining the dimensions required for access openings.

EN 953:1997, Safety of machinery — Guards — General requirements for the design and construction of fixed and movable guards.

EN 954-1:1996, Safety of machinery — Safety-related parts of control systems — Part 1: General principles for design.

EN 982:1996, Safety of machinery — Safety requirements for fluid power systems and components — Hydraulics.

EN 983:1996, Safety of machinery — Safety requirements for fluid power systems and components — Pneumatics.

EN 1034-1:2000+A1:2010 (A), Safety of machinery — Safety requirements for the design and construction of paper making and finishing machines — Part 1: Common requirements.

EN 1037:1995, Safety of machinery — Prevention of unexpected start-up.

EN 1050:1996, Safety of machinery — Principles for risk assessmen.t

EN 1127-1:1997, Explosive atmospheres — Explosion prevention and protection — Part 1: Basic concepts and methodology.

EN 13023:2003, Noise measurement methods for printing, paper converting, paper making machines and auxiliary equipment — Accuracy categories 2 and 3.

EN 50144-1:1998, Safety of hand-held powered electrical devices — Part 1: General requirements.

EN 60204-1:1997, Safety of machinery — Electrical equipment of machines — Part 1: General requirements (IEC 60204-1:1997).

EN 60974-1:1988, Arc welding equipment - Part 1: Welding power sources (IEC 60974-1:1998).

EN 61000-6-2:2001, Electromagnetic compatibility (EMC) — Part 6-2: Generic standards; immunity for industrial environment (IEC 61000-6-2:1999, modified).

EN ISO 12100-1:2003, Safety of machinery — Basic concepts, general principles for design — Part 1: Basic terminology, methodology (ISO 12100-1:2003).

EN ISO 12100-2:2003, Safety of machinery — Basic concepts, general principles for design — Part 2: Technical principles (ISO 12100-2:2003).

EN ISO 14122:2001 (all parts), Safety of machinery — Permanent means of access to machinery.

3 Terms and definitions

For the purposes of this European Standard, the definitions given in EN 1034-1:2000+A1:2010 (A), EN ISO 12100-1:2003, and the following definitions apply:

3.1

chast

vessel usually made of special steel or concrete and equipped with a fixed agitating device, associated measuring and control devices and necessary shutoff devices intended for storing (stacking), collecting and mixing pulp

3.2

agitator

part of the mixing device shaped as a propeller or agitating shaft for optimum distribution of the pulp components used and forming a suspension

3.3

pulp

suspension of fibre, additives and inks for the production of paper and board

4 List of significant hazards

This clause contains all the significant hazards, as far as they are dealt with in this European Standard, which are identified by risk assessment in accordance with EN 1050 as significant for this type of machinery and which require action to eliminate or reduce the risk.