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Varnost lesnoobdelovalnih strojev - Rezkalni stroji za štiristransko obdelavo

Safety of woodworking machines - Four sided moulding machines

Sicherheit von Holzbearbeitungsmaschinen - Fräsmaschinen für vierseitige Bearbeitung

Sécurité des machines pour le travail du bois - Machines à moulurer sur quatre faces

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Safety of woodworking machines - Four sided moulding machines

Sécurité des machines pour le travail du bois - Machines à moulurer sur quatre faces

Sicherheit von Holzbearbeitungsmaschinen - Fräsmaschinen für vierseitige Bearbeitung

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Recipients of this draft are invited to submit, with their comments, notification of any relevant patent rights of which they are aware and to provide supporting documentation.

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Contents

Page

Foreword 4

Introduction 5

1 Scope 6

2 Normative references 6

3 Terms and definitions 9

4 List of significant hazards 14

5 Safety requirements and/or measures 16
5.1 General 16
5.2 Controls 17
5.2.1 Safety and reliability of control systems 17
5.2.2 Position of controls 19
5.2.3 Starting 20
5.2.4 Normal stopping 20
5.2.5 Emergency stop 21
5.2.6 Mode selection 22
5.2.7 Speed changing 22
5.2.8 Direction of rotation 24
5.2.9 Integrated feed 24
5.2.10 Adjustment of spindles, spindle units, fences, table height, chip breakers and pressure shoes 26
5.2.11 Control duplication 27
5.2.12 Failure of the power supply 27
5.3 Protection against mechanical hazards 27
5.3.1 Stability 27
5.3.2 Risk of break-up during operation 28
5.3.3 Tool holder and tool design 28
5.3.4 Braking 30
5.3.5 Devices to minimise the possibility or the effect of ejection 31
5.3.6 Work-piece supports and guides 37
5.3.7 Prevention of access to moving parts and ejection of parts of tools 39
5.3.8 Required characteristics of tool guards 43
5.3.9 Retaining devices 44
5.4 Protection against non-mechanical hazards 44
5.4.1 Fire 44
5.4.2 Noise 44
5.4.3 Emission of chips and dust 46
5.4.4 Hot surfaces 47
5.4.5 Electricity 47
5.4.6 Ergonomics and handling 47
5.4.7 Lighting 48
5.4.8 Pneumatics 48
5.4.9 Hydraulics 48
5.4.10 Electromagnetic immunity 48
5.4.11 Static electricity 49
5.4.12 Supply disconnection (isolation) 49
5.4.13 Errors of fitting 49
5.4.14 Maintenance 49

6 Information for use 50

6.1 Warning devices **50**
6.2 Marking **50**
6.3 Instruction handbook **51**

Annex A (normative) **Spindles dimensional tolerances** **56**

Annex B (normative) **Braking tests** **57**
B.1 Conditions for all tests **57**
B.2 Unbraked run-down time **57**
B.3 Braked run-down time **57**
B.4 Run-up time **58**

Annex C (normative) **Table lip resistance test** **59**
C.1 General **59**
C.2 Test probe **59**
C.3 Measurements **61**
C.4 Tests **61**
C.5 Result **62**
C.6 Test report **62**

Annex D (normative) **Impact test method for guards** **63**
D.1 General **63**
D.2 Test method **63**
D.2.1 Preliminary remarks **63**
D.2.2 Testing equipment **63**
D.2.3 Projectile for guards **63**
D.2.4 Sampling **64**
D.2.5 Test procedure **64**
D.3 Results **64**
D.4 Assessment **64**
D.5 Test report **65**
D.6 Test equipment for impact test **65**

Annex ZA (informative) **Relationship between this European Standard and the Essential Requirements of EU Directive 2006/42/EC** **66**

Bibliography **67**

Foreword

This document (FprEN 12750:2012) has been prepared by Technical Committee CEN/TC 142 “Woodworking machines - Safety”, the secretariat of which is held by UNI.

This document is currently submitted to the Unique Acceptance Procedure.

This document will supersede EN 12750:2001+A1:2009.

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 2006/42/EC, see informative Annex ZA, which is an integral part of this document.

The most significant changes have been made in comparison with EN 12750:2001+A1:2009:

a) In Clause 1 Scope: The scope has been limited to machines having a maximum speed of the integrated work-piece feed of 200 m/min;

b) In 5.2.1 Safety and reliability of control systems: Application of EN ISO 13849, i.e. by requiring PL for the machine's safety functions;

c) In 5.2.7 Speed changing: concretion of requirements for different technologies;

d) In 5.2.9 Integrated feed: Additional requirements related to the powered adjustment of spindle position, height adjustment of the feed mechanism, fences, table height, chip breakers and pressure shoes;

e) In 5.3.4 Braking: concretion of requirements for different braking systems;

f) In 5.3.5.2 Out-feed end of the machine: Additional requirements to prevent ejection from the machine;

g) In 5.3.5.3 Use of glass bead cutting unit: Additional requirements for the glass bead cutting unit;

h) In 5.3.7 Prevention of access to moving parts and ejection of parts of tools: concretion of requirements related to the safeguarding of the tools and ejection of parts of tools;

i) In 5.4.2.1 Noise reduction at the design stage: Additional requirements related to integrated enclosures;

j) In 5.4.2.2 Noise emission measurement: Additional noise emission test for machines having a maximum feed speed > 40 m/min;

k) In 5.4.3 Emission of chips and dust: Additional requirements related to the emission of chips and dust;

l) In 6.3 Instruction handbook: The sermon to be provided by the manufacturer has been extended to a large extent.

Organisations contributing to the preparation of this European Standard include the European Manufacturers Association "EUMABOIS".

The European Standards produced by CEN/TC 142 are particular to woodworking machines and complement the relevant A and B Standards on the subject of general safety (see Introduction of EN ISO 12100:2010 for a description of A, B and C standards).

Introduction

This document has been prepared to be a harmonised standard to provide one means of conforming to the Essential Health and Safety Requirements of the Machinery Directive and associated EFTA Regulations. This document is a type C standard as defined in EN ISO 12100:2010.

The machinery concerned and the extent to which hazards, hazardous situations and events are covered is indicated in the scope of this document.

When provisions of this type C standard are different from those which are stated in type A or B standards, the provisions of this type C standard take precedence over the provisions of other standards, for machines that have been designed and built according to the provisions of this type C standard.

The requirements of this document are directed to manufacturers and their authorised representatives of four sided moulding machines. This document is also useful for designers.

This document also includes provisions and examples of information to be provided by the manufacturer to the user.

Common requirements for tooling are given in EN 847-1:2005+A1:2007.

1 Scope

This European Standard deals with all significant hazards, hazardous situations and events as listed in Clause 4, which are relevant to stationary four sided moulding machines with a maximum working width of 350 mm and a maximum speed of the integrated work-piece feed of 200 m/min, with electrical and/or electronic control system, hereafter referred to as "machines" designed to cut solid wood, chipboard, fibreboard, plywood and also these materials where these are covered with plastic laminate or edgings when they are used as intended and under the conditions foreseen by the manufacturer, including reasonably foreseeable misuse of the machine (see 6.3 c)).

For the definition of a stationary machine, see 3.22.

This European Standard deals also with hazards relating to the following optional work units:

— universal spindle;

— glass bead cutting unit.

This European Standard is not applicable to machines designed for machining logs which have not previously been machined.

This European Standard does not deal with any hazards relating to:

a) in-feed devices (magazines, hoppers, etc.);

   for mechanical in-feed devices which also prevent access to the in-feed opening, see 5.3.7.2;

b) the combination of single machines with any other machine as part of a line;

c) out-feed devices (e.g. mechanical handling systems) except for hazards related to ejection from the machine due to climb cutting.

This European Standard is not applicable to four sided moulding machines which are manufactured before the date of its publication as EN.

2 Normative references

The following 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.

EN 614-1:2006+A1:2009, *Safety of machinery — Ergonomic design principles — Part 1: Terminology and general principles*

EN 847-1:2005+A1:2007, *Tools for woodworking — Safety requirements — Part 1: Milling tools, circular saw blades*

EN 894-1:1997+A1:2008, *Safety of machinery — Ergonomics requirements for the design of displays and control actuators — Part 1: General principles for human interactions with displays and control actuators*

EN 894-2:1997+A1:2008, *Safety of machinery — Ergonomics requirements for the design of displays and control actuators — Part 2: Displays*

EN 894-3:2000+A1:2008, *Safety of machinery — Ergonomics requirements for the design of displays and control actuators — Part 3: Control actuators*