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VASTAVUSKONTROLL. OSA 5: TÄIENDAVAL NÕUDED  
JALAKÄIJA POOLT JUHITAVATELE VEOKITELE

Industrial trucks - Safety requirements and  
verification - Part 5: Supplementary requirements for  
pedestrian-propelled trucks

## EESTI STANDARDI EESSÕNA

## NATIONAL FOREWORD

<p>See Eesti standard EVS-EN 16307-5:2023 sisaldab Euroopa standardi EN 16307-5:2023 ingliskeelset teksti.</p> <p>Standard on jõustunud sellekohase teate avaldamisega EVS Teatajas.</p> <p>Euroopa standardimisorganisatsioonid on teinud Euroopa standardi rahvuslikele liikmetele kättesaadavaks 20.12.2023.</p> <p>Standard on kättesaadav Eesti Standardimis-ja Akrediteerimiskeskusest.</p>	<p>This Estonian standard EVS-EN 16307-5:2023 consists of the English text of the European standard EN 16307-5:2023.</p> <p>This standard has been endorsed with a notification published in the official bulletin of the Estonian Centre for Standardisation and Accreditation.</p> <p>Date of Availability of the European standard is 20.12.2023.</p> <p>The standard is available from the Estonian Centre for Standardisation and Accreditation.</p>
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English Version

**Industrial trucks - Safety requirements and verification -  
Part 5: Supplementary requirements for pedestrian-  
propelled trucks**

Chariots de manutention - Exigences de sécurité et  
vérification - Partie 5 : Exigences supplémentaires pour  
les chariots à conducteur accompagnant

Flurförderzeuge - Sicherheitstechnische  
Anforderungen und Verifizierung - Teil 5: Zusätzliche  
Anforderungen für mitgängerbetriebene  
Flurförderzeuge

This European Standard was approved by CEN on 20 November 2023.

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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-CENELEC Management Centre has the same status as the official versions.

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EUROPEAN COMMITTEE FOR STANDARDIZATION  
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## European foreword

This document (EN 16307-5:2023) has been prepared by Technical Committee CEN/TC 150 “Industrial trucks - Safety”, the secretariat of which is held by BSI.

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 June 2024, and conflicting national standards shall be withdrawn at the latest by June 2024.

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

This document supersedes EN 16307-5:2013.

In comparison with the previous edition, the following technical modifications have been made:

- document adapted to CEN Guide 414;
- normative references updated;
- reference to EN ISO 14120:2015 added (to replace EN 953);
- reference to EN 1175:2020 added (to replace EN 1175-1);
- requirement for fixed and/or removable guard systems clarified in 4.2.1;
- for safety distances in the normal operating position – reference made to EN ISO 14120:2015;
- hazard “Electromagnetic compatibility (EMC)” modified into “Electromagnetic immunity (external radiation)” and requirement clarified in 4.4;
- Annex A: all hazards which are not covered by this document deleted;
- Annex ZA adapted according to new template and relevant Essential Requirements of Directive 2006/42/EC added.

This document has been prepared under a standardization request addressed to CEN by the European Commission. The Standing Committee of the EFTA States subsequently approves these requests for its Member States.

For the relationship with EU Legislation, see informative Annex ZA, which is an integral part of this document.

Any feedback and questions on this document should be directed to the users’ national standards body. A complete listing of these bodies can be found on the CEN website.

According to the CEN-CENELEC Internal Regulations, the national standards organisations of the following countries are bound to implement this European Standard: Austria, Belgium, Bulgaria, Croatia, Cyprus, Czech Republic, Denmark, Estonia, Finland, France, Germany, Greece, Hungary, Iceland, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, Netherlands, Norway, Poland, Portugal, Republic of North Macedonia, Romania, Serbia, Slovakia, Slovenia, Spain, Sweden, Switzerland, Türkiye and the United Kingdom.

The EN 16307 series, under the general title *Industrial trucks — Safety requirements and verification*, consists of the following parts:

- *Part 1: Supplementary requirements for self-propelled industrial trucks, other than driverless trucks, variable-reach trucks and burden-carrier trucks;*
- *Part 2: Supplementary requirements for self-propelled variable-reach trucks;*
- *Part 3: Supplementary requirements for trucks with elevating operator position and trucks specifically designed to travel with elevated loads (additional requirements to EN 16307-1);*
- *Part 5: Supplementary requirements for pedestrian-propelled trucks;*
- *Part 6: Supplementary requirements for burden and personnel carriers.*

This document is intended to be used with EN ISO 3691-5:2015<sup>1</sup>, *Industrial trucks — Safety requirements and verification — Part 5: Pedestrian-propelled trucks (ISO 3691-5:2014)*.

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<sup>1</sup> As impacted by amendment EN ISO 3691-5:2015/A1:2020.

## Introduction

This document is a type-C standard as stated in EN ISO 12100:2010.

This document is of relevance, in particular, for the following stakeholder groups representing the market players with regard to machinery safety:

- machine manufacturers (small, medium and large enterprises);
- health and safety bodies (regulators, accident prevention organizations, market surveillance, etc.).

Others can be affected by the level of machinery safety achieved with the means of the document by the above-mentioned stakeholder groups:

- machine users/employers (small, medium and large enterprises);
- machine users/employees (e.g. trade unions, organizations for people with special needs);
- service providers, e.g. for maintenance (small, medium and large enterprises).

The above-mentioned stakeholder groups have been given the possibility to participate in the drafting process of this document.

The machines concerned and the extent to which hazards, hazardous situations or hazardous events are covered are indicated in the Scope of this document.

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

The EN 16307 series of standards covers safety requirements and their verification for industrial trucks as defined in ISO 5053-1 that are not covered exhaustively by the EN ISO 3691 series.

## 1 Scope

This document specifies requirements for the types of industrial trucks specified in the scope of EN ISO 3691-5:2015<sup>1</sup>.

This document is intended to be used in conjunction with EN ISO 3691-5:2015<sup>1</sup>.

This document deals with the following significant hazards, hazardous situations or hazardous events relevant to pedestrian-propelled trucks, when used as intended and under conditions of misuse which are reasonably foreseeable by the manufacturer:

- protection against crushing, shearing and trapping;
- electrical requirements;
- electromagnetic immunity.

These requirements are supplementary to those stated in EN ISO 3691-5:2015<sup>1</sup> with the addition of requirements for the following hazard:

- electromagnetic immunity (external radiation).

This document partially replaces the following requirement of EN ISO 3691-5:2015<sup>1</sup>:

- electrical requirements.

This document specifies supplementary requirements to EN ISO 3691-5:2015<sup>1</sup>:

- protection against crushing, shearing and trapping;
- information for use (instruction handbook and marking).

This document does not specify supplementary requirements to EN ISO 3691-5:2015<sup>1</sup>:

- static electricity;
- radiation;
- general principles for the drafting of instructions;
- sales literature.

Annex A (informative) contains the list of significant hazards covered by this document.

## 2 Normative references

The following documents are referred to in the text in such a way that some or all of their content constitutes requirements of this document. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

EN 1175:2020, *Safety of industrial trucks — Electrical/electronic requirements*

EN 12895:2015+A1:2019, *Industrial trucks — Electromagnetic compatibility*

EN ISO 3691-5:2015<sup>1</sup>, *Industrial trucks — Safety requirements and verification — Part 5: Pedestrian-propelled trucks (ISO 3691-5:2014)*



EN ISO 14120:2015, *Safety of machinery — Guards — General requirements for the design and construction of fixed and movable guards (ISO 14120:2015)*

ISO 5053-1:2020, *Industrial trucks — Vocabulary — Part 1: Types of industrial trucks*

### 3 Terms and definitions

For the purposes of this document, the terms and definitions given in ISO 5053-1:2020 and EN ISO 3691-5:2015<sup>1</sup> apply.

ISO and IEC maintain terminological databases for use in standardization at the following addresses:

- IEC Electropedia: available at <https://www.electropedia.org/>
- ISO Online browsing platform: available at <https://www.iso.org/obp>

## 4 Safety requirements and/or protective/risk reduction measures

### 4.1 General

The following applies to the pedestrian-propelled trucks, dealt with in EN ISO 3691-5:2015<sup>1</sup>. These are additional to the requirements of EN ISO 3691-5:2015<sup>1</sup> and, in certain instances, replace them.

### 4.2 Protection against crushing, shearing and trapping

#### 4.2.1 General

The requirements of EN ISO 3691-5:2015<sup>1</sup>, 4.8 shall apply with the following additions:

Fixed and/or removable guard systems accordance with EN ISO 3691-5:2015<sup>1</sup>, 4.8 shall meet the requirements of EN ISO 14120:2015, 5.2, 5.3, 5.4.1, 5.4.3, 5.4.4, 5.19.

When a fixed guard is removed, its fixing system shall remain on the guard or truck. This requirement applies to any fixed guards that are liable to be removed by the user with a risk of loss of the fixings, e.g. fixed guards that are liable to be removed during routine maintenance or setting operations carried out at the place of use.

#### 4.2.2 Pedestrian-propelled trucks with mast

The mast shall be guarded on the side facing the operating controls, e.g. by a transparent cover and/or perforated sheet. The guard shall, as a minimum, cover the whole width of the hazardous zone and the full length of the non-elevated mast, or up to 2,2 m from the ground, whichever is less.

With the operator in the normal operation position safety distances according to EN ISO 14120:2015, 5.2.2 shall be ensured.

The mast guard shall comply with 4.2.1.

### 4.3 Electrical requirements

EN ISO 3691-5:2015<sup>1</sup>, 4.11.2, first paragraph is replaced with the following:

- Electrical systems and equipment shall be in accordance with EN 1175:2020, Clause 4 and Clause 6.

### 4.4 Electromagnetic immunity

The truck shall comply with EN 12895:2015+A1:2019, 4.2 for immunity.

NOTE Requirements for electromagnetic compatibility (EMC) concerning emissions are not covered by this document.