# BS EN 16307-5:2023



**BSI Standards Publication** 

# Industrial trucks — Safety requirements and verification

Part 5: Supplementary requirements for pedestrianpropelled trucks



## National foreword

This British Standard is the UK implementation of EN 16307-5:2023. It supersedes BS EN 16307-5:2013, which is withdrawn.

The UK participation in its preparation was entrusted to Technical Committee MHE/7, Industrial trucks.

A list of organizations represented on this committee can be obtained on request to its committee manager.

#### **Contractual and legal considerations**

This publication has been prepared in good faith, however no representation, warranty, assurance or undertaking (express or implied) is or will be made, and no responsibility or liability is or will be accepted by BSI in relation to the adequacy, accuracy, completeness or reasonableness of this publication. All and any such responsibility and liability is expressly disclaimed to the full extent permitted by the law.

This publication is provided as is, and is to be used at the recipient's own risk.

The recipient is advised to consider seeking professional guidance with respect to its use of this publication.

This publication is not intended to constitute a contract. Users are responsible for its correct application.

This publication has been prepared under a mandate given to the European Standards Organizations by the European Commission and the European Free Trade Association. It is intended to support requirements of the EU legislation detailed in the European Foreword. A European Annex, usually Annex ZA or ZZ, describes how this publication relates to that EU legislation.

For the Great Britain market (England, Scotland and Wales), if UK Government has designated this publication for conformity with UKCA marking (or similar) legislation, it may contain an additional National Annex. Where such a National Annex exists, it shows the correlation between this publication and the relevant UK legislation. If there is no National Annex of this kind, the relevant Annex ZA or ZZ in the body of the European text will indicate the relationship to UK regulation applicable in Great Britain. References to EU legislation may need to be read in accordance with the UK designation and the applicable UK law. Further information on designated standards can be found at www.bsigroup.com/standardsandregulation.

For the Northern Ireland market, UK law will continue to implement relevant EU law subject to periodic confirmation. Therefore Annex ZA/ZZ in the European text, and references to EU legislation, are still valid for this market.

UK Government is responsible for legislation. For information on legislation and policies relating to that legislation, consult the relevant pages of [http://www.gov.uk%3c/ext-link%3e.%3c/p][http://www.gov.uk%3c/ext-link%3e.%3c/p]][http://www.gov.uk%3c/ext-link%3e.%3c/p]][http://www.gov.uk%3c/ext-link%3e.%3c/p]][http://www.gov.uk%3c/ext-link%3e.%3c/p]][http://www.gov.uk%3c/ext-link%3e.%3c/p][http://www.gov.uk%3c/ext-link%3

© The British Standards Institution 2024 Published by BSI Standards Limited 2024

ISBN 978 0 539 16642 2

#### ICS 53.060

# Compliance with a British Standard cannot confer immunity from legal obligations.

This British Standard was published under the authority of the Standards Policy and Strategy Committee on 31 January 2024.

#### Amendments/corrigenda issued since publication

Date Text affected

# EUROPEAN STANDARD NORME EUROPÉENNE EUROPÄISCHE NORM

# EN 16307-5

December 2023

ICS 53.060

Supersedes EN 16307-5:2013

**English Version** 

# Industrial trucks - Safety requirements and verification -Part 5: Supplementary requirements for pedestrianpropelled 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.

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-CENELEC Management Centre or to any CEN member.

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.

CEN members are the national standards bodies of 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 United Kingdom.



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

CEN-CENELEC Management Centre: Rue de la Science 23, B-1040 Brussels

## Contents

European foreword	3
Introduction	
1 Scope	6
2 Normative references	6
3 Terms and definitions	7
4 Safety requirements and/or protective/risk reduction measures	
4.1 General	7
4.2 Protection against crushing, shearing and trapping	7
4.2.1 General	7
4.2.2 Pedestrian-propelled trucks with mast	
4.3 Electrical requirements	
4.4 Electromagnetic immunity	
5 Verification of safety requirements and/or protective/risk reduction measures	8
6 Information for use	8
6.1 Instruction handbook(s) – Operation of truck	8
6.2 Marking – Information plates	
Annex A (informative) List of significant hazards	9
Annex ZA (informative) Relationship between this European Standard and the essentia requirements of Directive 2006/42/EC aimed to be covered	
Bibliography1	4

## **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.

### BS EN 16307-5:2023 EN 16307-5:2023 (E)

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)*.

<sup>&</sup>lt;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: Pedestrianpropelled trucks (ISO 3691-5:2014)