

**EN 16729-4:2018**



**NBN EN 16729-4:2019**



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**Railway applications - Infrastructure - Non-destructive testing on rails in track - Part 4: Qualification of personnel for non-destructive testing on rails**

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Valid from 30-01-2019

ICS: 93.100



EUROPEAN STANDARD

**EN 16729-4**

NORME EUROPÉENNE

EUROPÄISCHE NORM

December 2018

ICS 93.100

English Version

## Railway applications - Infrastructure - Non-destructive testing on rails in track - Part 4: Qualification of personnel for non-destructive testing on rails

Applications ferroviaires - Infrastructure - Essais non destructifs sur les rails de voie - Partie 4: Qualification du personnel en charge des essais non destructifs sur les rails

Bahnwendungen - Infrastruktur - Zerstörungsfreie Prüfung an Schienen im Gleis - Teil 4: Qualifizierung von Personal für die zerstörungsfreie Prüfung an Gleisen

This European Standard was approved by CEN on 17 September 2018.

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

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## European foreword

This document (EN 16729-4:2018) has been prepared by Technical Committee CEN/TC 256 “Railway application”, the secretariat of which is held by DIN.

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of an identical text or by endorsement, at the latest by June 2019, and conflicting national standards shall be withdrawn at the latest by June 2019.

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 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 document.

This series of European Standards EN 16729 “Railway applications – Infrastructure – Non-destructive testing on rails in track” consists of:

- Part 1: Requirements for ultrasonic inspection and evaluation principles;
- Part 2: Eddy current testing of rails in track;
- Part 3: Requirements for identifying internal and surface rail defects;
- Part 4: Qualification of personnel for non-destructive testing on rails.

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, Former Yugoslav Republic of Macedonia, France, Germany, Greece, Hungary, Iceland, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, Netherlands, Norway, Poland, Portugal, Romania, Serbia, Slovakia, Slovenia, Spain, Sweden, Switzerland, Turkey and the United Kingdom.

## EN 16729-4:2018 (E)

### Introduction

Since the effectiveness of any application of non-destructive testing (NDT) depends upon the capabilities of the persons who perform or are responsible for the test, a procedure has been developed to provide a means of evaluating and documenting the competence of personnel whose duties require the appropriate theoretical and practical knowledge of the non-destructive tests they perform, specify, supervise, monitor or evaluate. An added incentive stems from the European comparability of a wide range of industrial applications requiring common non-destructive testing approaches.

The regulatory aspects in this document follow EN ISO 9712.

## 1 Scope

This document defines the requirements for qualification of the personnel who plan, carry out and supervise non-destructive testing in industrial sector – Railway maintenance infrastructure, on rails in switches, crossings and plain track.

Safety of staff working on or near the railway track is part of the infrastructure manager safety management system and is not part of this standard.

This document applies only to rail profiles meeting the requirements of EN 13674-1 and EN 13674-2.

## 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 ISO 9712, *Non-destructive testing — Qualification and certification of NDT personnel (ISO 9712)*

## 3 Terms and definitions

For the purposes of this document, the following terms and definitions apply.

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

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

### 3.1

#### **inspector**

person who inspects the rail with different NDT-methods, interprets and reports the results

### 3.2

#### **operator**

person who captures NDT data without evaluating the results

### 3.3

#### **analyst**

person who evaluates NDT data from automatic systems without capturing and reports the results

## 4 Symbols and abbreviations

For the purposes of this European Standard, the abbreviated terms listed in Table 1 are used in the railway sector infrastructure.