

Irish Standard I.S. EN ISO 17201-5:2010

Acoustics - Noise from shooting ranges - Part 5: Noise management (ISO 17201 -5:2010)

© NSAI 2010

No copying without NSAI permission except as permitted by copyright law.

Incorporating amendments/corrigenda issued since publication:

This document replaces:

This document is based on: EN ISO 17201-5:2010

Published: 1 February, 2010

This document was published under the authority of the NSAI and comes into effect on: 15 February, 2010 ICS number: 17.140.20 95.020 97.220.10

NSAI

1 Swift Square, Northwood, Santry Dublin 9 T +353 1 807 3800 F +353 1 807 3838 E standards@nsai.ie

W NSAl.ie

Sales:

T +353 1 857 6730 F +353 1 857 6729 W standards.ie

Údarás um Chaighdeáin Náisiúnta na hÉireann

EUROPEAN STANDARD NORME EUROPÉENNE

EUROPÄISCHE NORM

EN ISO 17201-5

February 2010

ICS 17.140.20; 95.020; 97.220.10

English Version

Acoustics - Noise from shooting ranges - Part 5: Noise management (ISO 17201-5:2010)

Acoustique - Bruit des stands de tir - Partie 5: Gestion du bruit (ISO 17201-5:2010)

Akustik - Geräusche von Schießplätzen - Teil 5: Lärmmanagement (ISO 17201-5:2010)

This European Standard was approved by CEN on 28 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.

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 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, Romania, Slovakia, Slovenia, Spain, Sweden, Switzerland and United Kingdom.



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

Management Centre: Avenue Marnix 17, B-1000 Brussels

EN ISO 17201-5:2010 (E)

| Contents | Page |
|----------|------|
| | |
| Foreword | 3 |

EN ISO 17201-5:2010 (E)

Foreword

This document (EN ISO 17201-5:2010) has been prepared by Technical Committee ISO/TC 43 "Acoustics" in collaboration with Technical Committee CEN/TC 211 "Acoustics" the secretariat of which is held by DS.

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 August 2010, and conflicting national standards shall be withdrawn at the latest by August 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.

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, Croatia, 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 the United Kingdom.

Endorsement notice

The text of ISO 17201-5:2010 has been approved by CEN as a EN ISO 17201-5:2010 without any modification.

This is a free page sample. Access the full version online.

I.S. EN ISO 17201-5:2010

This page is intentionally left BLANK.

This is a free page sample. Access the full version online.

I.S. EN ISO 17201-5:2010 INTERNATIONAL STANDARD

ISO 17201-5

First edition 2010-02-01

Acoustics — Noise from shooting ranges —

Part 5: **Noise management**

Acoustique — Bruit des stands de tir — Partie 5: Gestion du bruit



ISO 17201-5:2010(E)

PDF disclaimer

This PDF file may contain embedded typefaces. In accordance with Adobe's licensing policy, this file may be printed or viewed but shall not be edited unless the typefaces which are embedded are licensed to and installed on the computer performing the editing. In downloading this file, parties accept therein the responsibility of not infringing Adobe's licensing policy. The ISO Central Secretariat accepts no liability in this area.

Adobe is a trademark of Adobe Systems Incorporated.

Details of the software products used to create this PDF file can be found in the General Info relative to the file; the PDF-creation parameters were optimized for printing. Every care has been taken to ensure that the file is suitable for use by ISO member bodies. In the unlikely event that a problem relating to it is found, please inform the Central Secretariat at the address given below.



COPYRIGHT PROTECTED DOCUMENT

© ISO 2010

All rights reserved. Unless otherwise specified, no part of this publication may be reproduced or utilized in any form or by any means, electronic or mechanical, including photocopying and microfilm, without permission in writing from either ISO at the address below or ISO's member body in the country of the requester.

ISO copyright office
Case postale 56 • CH-1211 Geneva 20
Tel. + 41 22 749 01 11
Fax + 41 22 749 09 47
E-mail copyright@iso.org
Web www.iso.org

Published in Switzerland

ISO 17201-5:2010(E)

| Con | ntents | Page |
|--------|--|------|
| | eword | |
| Intro | oduction | v |
| 1 | Scope | 1 |
| 2 | Normative references | 1 |
| 3 | Terms and definitions | 2 |
| 4 | Management process | 7 |
| 5 | Management documentation | 11 |
| 6 | Uncertainties | 12 |
| Anne | ex A (informative) Examples | 13 |
| Anne | ex B (informative) Classification of muzzle blast (emission) | 22 |
| Biblio | iography | 25 |

Foreword

ISO (the International Organization for Standardization) is a worldwide federation of national standards bodies (ISO member bodies). The work of preparing International Standards is normally carried out through ISO technical committees. Each member body interested in a subject for which a technical committee has been established has the right to be represented on that committee. International organizations, governmental and non-governmental, in liaison with ISO, also take part in the work. ISO collaborates closely with the International Electrotechnical Commission (IEC) on all matters of electrotechnical standardization.

International Standards are drafted in accordance with the rules given in the ISO/IEC Directives, Part 2.

The main task of technical committees is to prepare International Standards. Draft International Standards adopted by the technical committees are circulated to the member bodies for voting. Publication as an International Standard requires approval by at least 75 % of the member bodies casting a vote.

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

ISO 17201-5 was prepared by Technical Committee ISO/TC 43, Acoustics, Subcommittee SC 1, Noise.

ISO 17201 consists of the following parts, under the general title *Acoustics* — *Noise from shooting ranges*:

- Part 1: Determination of muzzle blast by measurement
- Part 2: Estimation of muzzle blast and projectile sound by calculation
- Part 3: Guidelines for sound propagation calculations
- Part 4: Prediction of projectile sound
- Part 5: Noise management

ISO 17201-5:2010(E)

Introduction

The initiative to prepare a standard on impulse noise from shooting ranges was taken by the Association of European Manufacturers of Sporting Ammunition (AFEMS), in April 1996 by the submission of a formal proposal to CEN (see doc. CEN N 1085). After consultation in CEN in 1998, CEN/TC 211, *Acoustics*, asked ISO/TC 43, *Acoustics*, Subcommittee SC 1, *Noise* to prepare ISO 17201 (all parts).

This part of ISO 17201 provides guidance for noise management of shooting activity at shooting ranges. It deals with the control of the noise received outside shooting ranges at specified reception points based either on measured or calculated data.

In general, national or regional environmental authorities specify how sound from shooting ranges should comply with guidelines, rules or regulations made by the relevant authorities. In situations with no official regulations, the management of a shooting range may use the method specified in this part of ISO 17201.

NOTE Conflicting national guidelines, rules or regulations can prevent the application of methods described in this part of ISO 17201.

Looking through various regulations used worldwide, many different approaches for noise control are found. In some countries, the long-term equivalent continuous sound pressure level is used to limit sound levels from shooting. In other countries, noise control is managed by limiting the level of one shot or by the difference between the long-term rating level and background sound pressure level, etc. This part of ISO 17201 gives a method for noise management to control the equivalent continuous sound pressure level by managing the number of shots for each combination of weapon type, ammunition type, the locations of firing, and the firing direction that is used in a shooting range. The weighting of the number of shots is related to the sound exposure levels produced by each combination at the reception points. By directly relating the number of shots to the limiting values, management objectives such as minimizing the noise load in the neighbourhood can be met.

This is a free page sample. Access the full version online.

I.S. EN ISO 17201-5:2010

Acoustics — Noise from shooting ranges —

Part 5:

Noise management

1 Scope

This part of ISO 17201 gives guidelines for noise management of shooting activity at shooting ranges. The control of the noise received outside shooting ranges at specified reception points based either on measured or calculated sound exposure levels is specified. This part of ISO 17201 can also be used in the planning of new or reconstruction of existing ranges. It is intended to comply with all relevant local rules and regulations which imply a conversion of sound exposure level to other indicators as given in ISO 17201-3.

This part of ISO 17201 applies to weapons with calibres of less than 20 mm or explosive charges of less than 50 g TNT equivalent and pressures of less than 1 kPa at the reception point.

NOTE National or other regulations, which could be more stringent, can apply.

2 Normative references

The following referenced documents are indispensable for the application 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.

ISO 1996-2, Acoustics — Description, measurement and assessment of environmental noise — Part 2: Determination of environmental noise levels

ISO 17201-1:2005, Acoustics — Noise from shooting ranges — Part 1: Determination of muzzle blast by measurement

ISO 17201-2, Acoustics — Noise from shooting ranges — Part 2: Estimation of muzzle blast and projectile sound by calculation

ISO 17201-3, Acoustics — Noise from shooting ranges — Part 3: Guidelines for sound propagation calculations

ISO 17201-4, Acoustics — Noise from shooting ranges — Part 4: Prediction of projectile sound

ISO/IEC Guide 98-3:2008, Uncertainty of measurement — Part 3: Guide to the expression of uncertainty in measurement (GUM:1995)



| | This is a free preview. | Purchase the e | entire publication | at the link below: |
|--|-------------------------|----------------|--------------------|--------------------|
|--|-------------------------|----------------|--------------------|--------------------|

Product Page

- Dooking for additional Standards? Visit Intertek Inform Infostore
- Dearn about LexConnect, All Jurisdictions, Standards referenced in Australian legislation