

**SLOVENSKI STANDARD**  
**oSIST prEN ISO 10462:2012**  
**01-oktober-2012**

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**Plinske jeklenke - Jeklenke za acetilen - Periodični pregledi in vzdrževanje**

Gas cylinders - Acetylene cylinders - Periodic inspection and maintenance (ISO/DIS 10462:2012)

Gasflaschen - Acetylenflaschen - Wiederkehrende Inspektion und Wartung (ISO/DIS 10462:2012)

Bouteilles à gaz - Bouteilles d'acétylène - Contrôles et entretien périodiques (ISO/DIS 10462:2012)

**Ta slovenski standard je istoveten z: prEN ISO 10462**

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**ICS:**

23.020.30	Tlačne posode, plinske jeklenke	Pressure vessels, gas cylinders
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**en,fr,de**



EUROPEAN STANDARD  
NORME EUROPÉENNE  
EUROPÄISCHE NORM

**DRAFT**  
**prEN ISO 10462**

May 2012

ICS 23.020.30

English Version

**Gas cylinders - Acetylene cylinders - Periodic inspection and  
maintenance (ISO/DIS 10462:2012)**

Bouteilles à gaz - Bouteilles d'acétylène - Contrôles et  
entretien périodiques (ISO/DIS 10462:2012)

Gasflaschen - Acetylenflaschen - Wiederkehrende  
Inspektion und Wartung (ISO/DIS 10462:2012)

This draft European Standard is submitted to CEN members for parallel enquiry. It has been drawn up by the Technical Committee CEN/TC 23.

If this draft becomes a European Standard, 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.

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

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## Foreword

This document (prEN ISO 10462:2012) has been prepared by Technical Committee ISO/TC 58 "Gas cylinders" in collaboration with the Technical Committee CEN/TC 23 "Transportable gas cylinders" the secretariat of which is held by BSI..

This document is currently submitted to the parallel Enquiry.

### Endorsement notice

The text of ISO/DIS 10462:2012 has been approved by CEN as a prEN ISO 10462:2012 without any modification.

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## DRAFT INTERNATIONAL STANDARD ISO/DIS 10462

ISO/TC 58/SC 4

Secretariat: **ANSI**Voting begins on  
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**2012-10-10**

INTERNATIONAL ORGANIZATION FOR STANDARDIZATION • МЕЖДУНАРОДНАЯ ОРГАНИЗАЦИЯ ПО СТАНДАРТИЗАЦИИ • ORGANISATION INTERNATIONALE DE NORMALISATION

# Gas cylinders — Acetylene cylinders — Periodic inspection and maintenance

*Bouteilles à gaz — Bouteilles d'acétylène — Contrôles et entretien périodiques*

[Revision of second edition (ISO 10462:2005)]

ICS 23.020.30

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## ISO/CEN PARALLEL PROCESSING

This draft has been developed within the International Organization for Standardization (ISO), and processed under the **ISO-lead** mode of collaboration as defined in the Vienna Agreement.

This draft is hereby submitted to the ISO member bodies and to the CEN member bodies for a parallel five-month enquiry.

Should this draft be accepted, a final draft, established on the basis of comments received, will be submitted to a parallel two-month approval vote in ISO and formal vote in CEN.

**To expedite distribution, this document is circulated as received from the committee secretariat. ISO Central Secretariat work of editing and text composition will be undertaken at publication stage.**

**Pour accélérer la distribution, le présent document est distribué tel qu'il est parvenu du secrétariat du comité. Le travail de rédaction et de composition de texte sera effectué au Secrétariat central de l'ISO au stade de publication.**

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## 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 10462 was prepared by Technical Committee ISO/TC 58, *Gas cylinders*, Subcommittee SC 4, *Operational requirements for gas cylinders*.

This third edition cancels and replaces the second edition (ISO 10462:2005), with the following main technical revisions:

- a) ISO 10462:2005 was revised taking into account EN 12863.
- b) For the removal of the valve, reference to ISO 25760 is included and consequently the former Annex B was deleted.
- c) For the external visual inspection, reference to the respective Annex of ISO 6406 (for seamless steel cylinders), ISO 10460 (for welded steel cylinders) or ISO 10461 (for seamless aluminium-alloy cylinders) is included and consequently the former Annex C was deleted.
- d) The inspection of monolithic porous materials with regard to cracking, crumbling or cavitation is further detailed in order to be clearer.
- e) For the inspection of the valve, reference to ISO 22434 is included and consequently the former Annex F was deleted.

## Introduction

Acetylene cylinders differ from all other cylinders transporting compressed or liquefied gases in that they contain a porous material and normally a solvent in which the acetylene is dissolved. Only for some special applications are acetylene cylinders used that contain only a porous material without solvent used. For the periodic inspection cycle, due regard is to be given to the different types of construction of cylinders and porous materials. This International Standard should be read considering these differences.

The primary objective of the presence of the porous material is to limit an acetylene decomposition, should it be initiated, and thus prevent a cylinder incident. If some porous material is missing, or if a defect (e.g. a cavity, crack or void of significant size) exists as a result of breakdown or subsidence of the porous material, then the decomposition could progress at a rate that can cause a violent failure of the cylinder accompanied by an explosion.

The requirements in this International Standard are mainly those that are specific for acetylene cylinders; for more general requirements related to the periodic inspection of gas cylinders, reference is made to the relevant ISO documents.

The periodic inspection of acetylene cylinders is to be performed only by competent persons and, in those jurisdictions requiring it, persons authorized by the regulatory authority.

Where there is any conflict between this International Standard and any applicable regulation, the regulation always takes precedence.

In International Standards, weight is equivalent to a force, expressed in Newton. However, in common parlance (as used in terms defined in this International Standard), the word "weight" continues to be used to mean "mass", but this practice is deprecated (ISO 80000-4).

In this International Standard the unit bar is used, due to its universal use in the field of technical gases. It should, however, be noted that bar is not an SI unit, and that the according SI unit for pressure is Pa.

Pressure values given in this International Standard are given as gauge pressure (pressure exceeding atmospheric pressure) unless noted otherwise.