



National Standards Authority of Ireland

IRISH STANDARD

I.S. EN 1800:2006

ICS 23.020.30

**TRANSPORTABLE GAS CYLINDERS -
ACETYLENE CYLINDERS - BASIC
REQUIREMENTS, DEFINITIONS AND TYPE
TESTING**

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EUROPEAN STANDARD

EN 1800

NORME EUROPÉENNE

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Supersedes EN 1800:1998

English Version

Transportable gas cylinders - Acetylene cylinders - Basic requirements, definitions and type testing

Bouteilles à gaz transportables - Bouteilles d'acétylène -
Exigences fondamentales, définitions et essais de type

Ortsbewegliche Gasflaschen - Acetylenflaschen -
Grundanforderungen, Definitionen und Typprüfung

This European Standard was approved by CEN on 29 September 2006.

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 Central Secretariat 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 Central Secretariat has the same status as the official versions.

CEN members are the national standards bodies of Austria, Belgium, 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.



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Foreword

This document (EN 1800:2006) has been prepared by Technical Committee CEN/TC 23 “Transportable gas cylinders”, 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of an identical text or by endorsement, at the latest by May 2007, and conflicting national standards shall be withdrawn at the latest by May 2007.

This European Standard has been submitted for reference into the RID and/or in the technical annexes of the ADR. Therefore in this context the standards listed in the normative references and covering basic requirements of the RID/ADR not addressed within the present standard are normative only when the standards themselves are referred to in the RID and/or in the technical annexes of the ADR.

This document supersedes EN 1800:1998.

This revision has been prepared to:

- a) introduce a new subclause 4.2.4 to cover requirements for joggle welds in welded cylinders;
- b) bring the normative references up to date;
- c) bring the editorial style up to date including the correction of a hanging clause under Clause 5 with consequent renumbering of subsequent sub-clauses;
- d) add a reference to welded steel cylinders, EN 13322-1;
- e) make the figures language independent.

According to the CEN/CENELEC Internal Regulations, the national standards organizations of the following countries are bound to implement this European Standard: Austria, Belgium, 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.

EN 1800:2006 (E)

1 Scope

This European Standard specifies the basic requirements for acetylene cylinders with a maximum nominal water capacity of 150 l, including:

- a) the procedure for type testing;
- b) the procedure for production/batch testing;
- c) the methods for determining the maximum permissible settled pressure;
- d) the method for determining the porosity of the porous material;

It does not include details of designs for the cylinder shell.

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.

EN 1964-1, *Transportable gas cylinders — Specification for the design and construction of refillable transportable seamless steel gas cylinders of water capacities from 0,5 litre up to and including 150 litres — Part 1: Cylinders made from seamless steel with an R_m value of less than 1 100 MPa*

EN 1975, *Transportable gas cylinders — Specification for the design and construction of refillable transportable seamless aluminium and aluminium alloy gas cylinders of capacity from 0,5 litre up to 150 litres*

EN 13322-1, *Transportable gas cylinders — Refillable welded steel gas cylinders — Design and construction — Part 1: Carbon steel*

EN ISO 10297, *Transportable gas cylinders — Cylinder valves — Specification and type testing (ISO 10297:2006)*

prEN ISO 11117, *Gas cylinders — Valve protection caps and valve guards — Design, construction and tests (ISO/DIS 11117:2006)*

EN ISO 13769, *Gas cylinders — Stamp marking (ISO 13769:2002)*

3 Terms and definitions

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

3.1

acetylene cylinder

cylinder containing a porous material with or without solvent for the storage of acetylene

NOTE For solvent free acetylene cylinders see Clause 6.

3.2

tare weight

see EN ISO 13769 and 4.5

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