BS 6400-1:2016



BSI Standards Publication

Specification for installation, exchange, relocation, maintenance and removal of gas meters with a maximum capacity not exceeding 6 m³/h –

Part 1: Low pressure (2nd family gases)



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Summary of pages

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Foreword

Publishing information

This part of BS 6400 is published by BSI Standards Limited, under licence from The British Standards Institution, and came into effect on 30 June 2016. It was prepared by Technical Committee GSE/30, Gas installations (1st, 2nd and 3rd family gases). A list of organizations represented on this committee can be obtained on request to its secretary.

Supersession

BS 6400:2016 supersedes BS 6400-1:2006, which is withdrawn.

Relationship with other publications

BS 6400, Specification for installation, exchange, relocation, maintenance and removal of gas meters with a maximum capacity not exceeding 6m3/h, is published in three parts:

- Part 1: Low pressure (2nd family gases);
- Part 2: Medium pressure (2nd family gases);
- Part 3: Low and medium pressure (3rd family gases).

Terminology in this part of BS 6400 might not necessarily be consistent with BS 6400-3, which uses terminology that is consistent with that used in the liquefied petroleum gas industry.

This standard has been prepared as a supporting document to COP/1a, the Ofgas code of practice for low pressure meter installations with capacities not exceeding 6 m³/h [1].

Information about this document

This is a full revision of the standard to bring it up to date and to include a new clause on maintenance.

Hazard warnings

WARNING. This British Standard calls for the use of substances and/or procedures that can be injurious to health if adequate precautions are not taken. It refers only to technical suitability and does not absolve the user from legal obligations relating to health and safety at any stage.

Use of this document

It has been assumed in the preparation of this British Standard that the execution of its provisions will be entrusted to appropriately qualified and experienced people, for whose use it has been produced.

Presentational conventions

The provisions of this standard are presented in roman (i.e. upright) type. Its requirements are expressed in sentences in which the principal auxiliary verb is "shall".

Commentary, explanation and general informative material is presented in smaller italic type, and does not constitute a normative element.

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Contractual and legal considerations

This publication does not purport to include all the necessary provisions of a contract. Users are responsible for its correct application.

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

In particular, attention is drawn to the following specific legislation.

- The Gas Safety (Installation and Use) Regulations 1998 [2]
- Gas Safety (Installation and Use) Regulations (Northern Ireland) 2004 [3]
- The Gas Safety (Installation and Use) Regulations 1994, as amended and applied by the Gas Safety (Application) (Isle of Man) Order 1996 [4]
- The Gas Meters (Information on Connection and Disconnection) Regulations 1996 [5]
- The Gas Safety (Management) Regulations 1996 [6]
- The Gas Safety (Management) Regulations (Northern Ireland) 1997 [7]
- The Gas (Meters) Regulations 1983, as amended [8]
- The Building Regulations 2010 (England and Wales), as amended [9]
- The Building (Scotland) Regulations 2004, as amended [10]
- The Building Regulations (Northern Ireland) 2012, as amended [11]
- The Measuring Instruments (EEC Requirements) (Gas Volume Meters) Regulations 1988, as amended [12]
- The Measuring Instruments (Gas Meters) Regulations 2006 [13]
- The Dangerous Substances and Explosive Atmopheres Regulations 2002 (DSEAR) [14]
- The Gas (Calculation of Thermal Energy) Regulations 1996, as amended [15]
- The Measuring Instruments Directive 2004/22/EU [16]
- The Measuring Instruments Directive 2014/32/EC [17]

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Scope

This British Standard specifies requirements for the installation, exchange, relocation, maintenance and removal of credit or prepayment diaphragm and ultrasonic gas meters with a maximum capacity not exceeding 6 m³/h.

NOTE 1 For the purposes of this British Standard, installation includes design, inspection and commissioning. It is recognized that each of these tasks can be performed by the same person.

This part of BS 6400 is applicable to primary and secondary meter installations:

- supplied with 2nd family gases from low pressure gas distribution systems with a maximum operating pressure not exceeding 75 mbar, a design minimum pressure of 19 mbar and a design maximum incidental pressure of 200 mbar;
- b) fitted downstream of the emergency control valve;
- c) that utilize a primary meter regulator downstream of the emergency control valve:
- d) where the operating pressure at the outlet of the meter is nominally 21 mbar. 1)

NOTE 2 Low pressure gas networks in Great Britain operate with a maximum operating pressure not exceeding 75 mbar, a design minimum pressure of 19 mbar and a design maximum incidental pressure of 200 mbar.

NOTE 3 Installation pipework is specified in BS 6891.

NOTE 4 Service pipes (including the emergency control valve) are specified in the Institution of Gas Engineers and Managers' publication on gas services, IGE/TD/4 [18].

NOTE 5 All pressures quoted in this standard are gauge pressures and all pressure absorption values are for natural gas unless otherwise specified.

NOTE 6 Additional guidance on domestic gas systems can be found in BS EN 1775, BS EN 1776 and BS EN 12279.

NOTE 7 Additional guidance on gas installations in multi-occupancy buildings is given in IGEM/G/5 [N7].

Normative references

The following documents, in whole or in part, are normatively referenced in this document and are indispensable for its application. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

Standards publications

BS 21, Specification for pipe threads for tubes and fittings where pressure-tight joints are made on the threads (metric dimensions)

BS 476-7:1997, Fire tests on building materials and structures – Part 7: Method of test to determine the classification of the surface spread of flame of products

BS 746:2014, Specification for gas meter unions and adaptors

BS 6891:2015, Specification for the installation and maintenance of low pressure gas installation pipework of up to 35 mm (R11/4) on premises

BS 7671, Requirements for electrical installations – IET Wiring Regulations

^{1) 1} bar = 10^5 N/m² = 100 kPa.