AS 1074—1989
Reconfirmed 2018

Australian Standard®

Steel tubes and tubulars for ordinary service

This Australian Standard was prepared by Committee WS/4, Steel Pipes and Fittings–Water and Gas. It was approved on behalf of the Council of Standards Australia on 8 February 1989 and published on 10 April 1989.

The following interests are represented on Committee WS/4:

Confederation of Australian Industry

Metal Trades Industry Association of Australia

Public Works Department, New South Wales

The Australian Gas Association

Water Resources Commission, Queensland

Additional interests participating in preparation of Standard:

Water Authority of Western Australia

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STANDARDS AUSTRALIA

RECONFIRMATION

OF
AS 1074–1989
Steel tubes and tubulars for ordinary service

RECONFIRMATION NOTICE

Major stakeholders of this publication have reviewed the content of this publication and in accordance with Standards Australia procedures for reconfirmation, it has been determined that the publication is still valid and does not require change.

Certain documents referenced in the publication may have been amended since the original date of publication. Users are advised to ensure that they are using the latest versions of such documents as appropriate, unless advised otherwise in this Reconfirmation Notice.

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NOTES

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PREFACE

This Standard was prepared by the Standards Australia's Committee on Steel Pipes and Fittings–Water and Gas to supersede AS 1074–1980, *Steel tubes and tubulars threaded or suitable for threading with pipe threads of Whitworth form*.

This edition adopts the descriptions, dimensions and masses as specified in BS 138:1985, *Specification for screwed and socketed steel tubes and tubulars and for plain end steel tubes suitable for welding or for screwing to BS 21 pipe threads.*

This Standard does not indicate the services for which the tubes are appropriate. Where the use of tubes is not controlled by by–laws or regulations, reference should be made to the appropriate Code of Practice or application Standard. Some Codes of Practice for building relating to town gas and water, and also the relevant by–laws, preclude the use of light tubes for these services. If the application is for pressure purposes, reference should be made to AS CB18, *SAA Pressure Piping Code–Part 1: Ferrous piping*.

CONTENTS

STANDARDS AUSTRALIA

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SECTION 1. SCOPE AND GENERAL

1.1 SCOPE. This Standard specifies requirements for threaded steel tubes and tubulars, and plain-end steel tubes suitable for screwing as specified in AS 1722.1, and of DN 8 to DN 150 inclusive (nominal size). Three wall thicknesses of tube, designated Light, Medium, and Heavy, are specified in Section 2.

NOTE: Guidelines on information that should be specified by the purchaser or agreed upon at the time of enquiry or order are given in Appendix A.

1.2 REFERENCED DOCUMENTS. The following documents are referred to in this Standard.

AS
1355 Glossary of terms used in connection with water and sanitary plumbing and drainage installations
1391 Methods for tensile testing of metals
1650 Galvanized coatings
1722 Pipe threads of Whitworth form
1722.1 Part 1: Sealing pipe threads
1835 Tubes for pressure purposes — Seamless steel
1836 Tubes for pressure purposes — Welded steel
2084 Non-destructive testing — Eddy current testing of metal tubes

BS
3894 Method for converting elongation values for steel
Part 1: Carbon and low alloy steels

ISO
65 Carbon steel tubes suitable for screwing in accordance with ISO 7/1

1.3 DEFINITIONS. For the purpose of this Standard, the definitions given in AS 1355 and those below apply.

1.3.1 Tube — length of uniform circular hollow section.

1.3.2 Socket — internally threaded coupling used in joining tubes.

1.3.3 Chamfer — machined or cast surface in the form of a cone at the entrance of a thread to assist assembly and prevent damage to the start of the thread.

1.3.4 Length of screwed-and-socketed tube.

1.3.4.1 *Random length* — length of tube with one socket screwed on.

1.3.4.2 *Exact length* — length of tube excluding socket.

1.3.5 Nominal size (DN) — a numerical designation of size which is common to all components in a piping system other than components designated by outside diameters or by thread size. It is a convenient round number for reference purposes and is only loosely related to manufacturing dimensions.

NOTE: It is designated by DN followed by a number, e.g. DN 32.

1.4 DESIGNATION. Tubes and tubulars shall be designated according to their nominal size.

Sockets and backnuts shall be designated according to the respective nominal sizes of the tubes for which they are intended.