# Australian/New Zealand Standard<sup>™</sup>

## Gas distribution networks

## Part 3: Plastics pipe systems





#### AS/NZS 4645.3:2018

This Joint Australian/New Zealand Standard was prepared by Joint Technical Committee AG-008, Gas Distribution. It was approved on behalf of the Council of Standards Australia on 9 February 2018 and by the New Zealand Standards Approval Board on 31 January 2018.

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The following are represented on Committee AG-008:

Access Canberra Australian Industry Group Australian Pipelines and Gas Association Department of Planning and Environment (Division of Energy, Water and Portfolio Strategy) NSW Energy Networks Australia Engineers Australia Gas Association of New Zealand Gas Energy Australia Gas Technical Regulators Committee International Copper Association Australia LPG Association of New Zealand New Zealand Institution of Gas Engineers Plastics Industry Pipe Association of Australia Plastics New Zealand Welding Technology Institute of Australia WorkSafe New Zealand (Energy Safety)

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This Standard was issued in draft form for comment as DR AS/NZS 4645.3:2017.

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### PREFACE

This Standard was prepared by the Joint Standards Australia/Standards New Zealand Committee AG-008 Gas Distribution, to supersede AS/NZS 4645.3:2008.

The objective of this Standard is to provide for the protection of the general public, operating personnel and the environment, and to ensure safe and reliable operation of gas distribution networks that reticulate gas to consumers.

This Standard covers plastics pipe systems within gas distribution networks in accordance with AS/NZS 4645.1 for operating pressures up to 1050 kPa.

AS/NZS 4645.1 provides a means by which such systems can be planned, designed, constructed and maintained.

The AS/NZS 4645 series of Standards includes the following parts:

AS/NZS

4645 Gas distribution networks

4645.1 Part 1: Network management

4645.2 Part 2: Steel pipe systems

4645.3 Part 3: Plastics pipe systems (this Standard)

This Standard is not a design handbook, nor a manual on distribution practices. It does not remove the need for qualified and experienced engineering design, installation and operation or for competent engineering judgement, and does require interpretation and implementation by competent engineers.

The Australian and New Zealand Technical Regulators have advised that this Standard will only apply to the life cycle of new gas distribution networks and modifications or augmentations to existing assets within gas distribution networks. However, the Sections on operations, maintenance, repair, decommissioning, gas quality and risk assessment may be suitable for application to existing assets in existing networks.

Statements expressed in mandatory terms in notes to tables are deemed to be requirements of this Standard. Alternative means of conformance may be acceptable provided the required safety outcomes can be demonstrated with AS/NZS 4645.1.

The terms 'normative' and 'informative' have been used in this Standard to define the application of the appendix to which they apply. A 'normative' appendix is an integral part of a Standard, whereas an 'informative' appendix is only for information and guidance.

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