AS 2360.1.4—1993 BS 1042: Section 1.5:1987

## Australian Standard®

# Measurement of fluid flow in closed conduits

Part 1.4: Pressure differential methods—Measurement using orifice plates, nozzles or Venturi tubes—Guide to the effect of departure from the conditions specified in Part 1.1

[BS title: Measurement of fluid flow in closed conduits— Part 1: Pressure differential devices—Section 1.5 Guide to the effect of departure from the conditions specified in Section 1.1] This Australian Standard was prepared by Committee CE/24, Measurement of Water Flow in Open Channels and Closed Conduits. It was approved on behalf of the Council of Standards Australia on 3 August 1993 and published on 20 December 1993.

The following interests are represented on Committee CE/24:

Association of Consulting Engineers of Australia

Department of Water Resources, New South Wales

Engineering and Water Supply Department, South Australia

Forestry Commission of New South Wales

Institute of Instrumentation and Control, Australia

Melbourne Water

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### **PREFACE**

This Standard was prepared by the Standards Australia Committee on Measurement of Water Flow in Open Channels and Closed Conduits. It is identical with and has been reproduced from BS 1042: Section 1.5:1987, Measurement of fluid flow in closed conduits, Part 1: Pressure differential devices, Section 1.5: Guide to the effect of departure from the conditions specified in Section 1.1.

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This Standard is one of a series, to be published progressively, which deals with methods of measurement of fluid flow in closed conduits. The following Parts were published concurrently with this Part:

- 2360 Measurement of fluid flow in closed circuits
- 2360.0 Part 0: Vocabulary and symbols
- 2360.1.1 Part 1.1: Pressure differential methods—Measurement using orifice plates, nozzles or Venturi tubes—Conduits with diameters from 50 mm to 1200 mm
- 2360.1.2 Part 1.2: Pressure differential methods—Measurement using orifice plates or nozzles—Conduits with diameters less than 50 mm
- 2360.1.3 Part 1.3: Pressure differential methods—Measurement using orifice plates, nozzles or Venturi tubes—Guide to the use of methods specified in Parts 1.1 and 1.2
- 2360.1.4 Part 1.4: Pressure differential methods—Measurement using orifice plates, nozzles or Venturi tubes—Guide to the effect of departure from the conditions specified in Part 1.1 (this Standard)
- 2360.1.5 Part 1.5: Pressure differential methods—Measurement using orifice plates, nozzles or Venturi tubes—Pulsating flow, in particular sinusoidal or square wave intermittent periodic-type fluctuations
- 2360.6.1 Part 6.1: Volumetric methods—By mass
- 2360.6.2 Part 6.2: Volumetric methods—By volume
- 2360.7.1 Part 7.1: Assessment of uncertainty in the calibration and use of flow measurement devices—Linear calibration relationships
- 2360.7.2 Part 7.2: Assessment of uncertainty in the calibration and use of flow measurement devices—Non-linear calibration relationships

At the date of publication of this Part the following parts, with the numbers of the parent international Standards in parenthesis, had not been published:

Pressure differential methods—Measurement using orifice plates, nozzles or Venturi tubes—Connections for pressure signal transmissions between primary and secondary elements (ISO 2186)

Pitot static tube methods—Measurement of velocity at a point of the cross-section of a conduit (ISO 7145)

Pitot static tube methods—Measurement using Pitot-static tubes (ISO 3966)

Pitot static tube methods—Measurement in swirling or asymmetric flow conditions using ISO 3966 or ISO 3354 (ISO 7194)

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Current meters method—Measurement of clean water in full conduits and under regular flow conditions using current meters (ISO 3354)

Non-radioactive tracer methods—Review of alternative methods (ISO 2975.1)

Non-radioactive tracer methods—Measurement using constant rate injection (ISO 2975.2)

Non-radioactive tracer methods—Measurement using transit time (ISO 2975.6)

Weighing methods—Verification of static type (ISO 9368.1)

Weighing methods—Verification of dynamic type (ISO 9368.2, not published)

When published, the details for the above unpublished Australian Standards will be listed in the Catalogue of Australian Standards and Other Products.

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