

Australian/New Zealand Standard™

Explosive atmospheres

Part 0: Equipment—General requirements



AS/NZS 60079.0:2012

This Joint Australian/New Zealand Standard was prepared by Joint Technical Committee EL-014, Equipment for Explosive Atmospheres. It was approved on behalf of the Council of Standards Australia on 3 February 2012 and on behalf of the Council of Standards New Zealand on 31 January 2012.
This Standard was published on 22 February 2012.

The following are represented on Committee EL-014:

Auckland Regional Chamber of Commerce
Australian Chamber of Commerce and Industry
Australian Coal Association
Australian Industry Group
Australian Institute of Petroleum
Australian Institute of Refrigeration, Air Conditioning and Heating
Australian Petroleum Production and Exploration Association
Australian Pipeline Industry Association
Bureau of Steel Manufacturers of Australia
Consult Australia
Department of Employment, Economic Development and Innovation, Qld
Department of Trade and Investment, Regional Infrastructure and Services, NSW
Electrical Compliance Testing Association
Electrical Contractors Association of New Zealand
Electrical Regulatory Authorities Council
Energy Networks Association
Engineers Australia
Environmental Risk Management Authority New Zealand
Institute of Electrical Inspectors
Institute of Instrumentation, Control and Automation Australia
Institution of Professional Engineers New Zealand
Mining Electrical and Mining Mechanical Engineering Society
Ministry of Economic Development, New Zealand
National Electrical and Communications Association
New Zealand Employers and Manufacturers Association (Central)
The Aviation and Marine Engineers Association
WorkCover New South Wales

Keeping Standards up-to-date

Standards are living documents which reflect progress in science, technology and systems. To maintain their currency, all Standards are periodically reviewed, and new editions are published. Between editions, amendments may be issued. Standards may also be withdrawn. It is important that readers assure themselves they are using a current Standard, which should include any amendments which may have been published since the Standard was purchased.

Detailed information about joint Australian/New Zealand Standards can be found by visiting the Standards Web Shop at www.saiglobal.com.au or Standards New Zealand web site at www.standards.co.nz and looking up the relevant Standard in the on-line catalogue.

For more frequent listings or notification of revisions, amendments and withdrawals, Standards Australia and Standards New Zealand offer a number of update options. For information about these services, users should contact their respective national Standards organization.

We also welcome suggestions for improvement in our Standards, and especially encourage readers to notify us immediately of any apparent inaccuracies or ambiguities. Please address your comments to the Chief Executive of either Standards Australia or Standards New Zealand at the address shown on the back cover.

This Standard was issued in draft form for comment as DR AS/NZS 60079.0.

Australian/New Zealand Standard™

Explosive atmospheres

Part 0: Equipment—General requirements

Originated as AS/NZS 60079.0:2000.
Third edition 2008.
Fourth edition 2012.

COPYRIGHT

© Standards Australia Limited/Standards New Zealand

All rights are reserved. No part of this work may be reproduced or copied in any form or by any means, electronic or mechanical, including photocopying, without the written permission of the publisher, unless otherwise permitted under the Copyright Act 1968 (Australia) or the Copyright Act 1994 (New Zealand).

Jointly published by SAI Global Limited under licence from Standards Australia Limited, GPO Box 476, Sydney, NSW 2001 and by Standards New Zealand, Private Bag 2439, Wellington 6140

PREFACE

This Standard was prepared by the Joint Standards Australia/Standards New Zealand Committee EL-014, Equipment for Explosive Atmospheres, to supersede AS/NZS 60079.0:2008.

The objective of this Standard is to specify the general requirements for construction, testing and marking of electrical equipment and Ex Components intended for use in explosive atmospheres.

This Standard is identical with, and has been reproduced from IEC 60079-0, Ed. 6.0 (2011), *Explosive atmospheres, Part 0: Equipment—General requirements*.

As this Standard is reproduced from an International Standard, the following applies:

- (a) Its number appears on the cover and title page while the International Standard number appears only on the cover.
- (b) In the source text ‘this part of IEC 60079’ and ‘IEC 60079-0’ should read ‘this part of AS/NZS 60079’ and ‘AS/NZS 60079.0’ respectively.
- (c) A full point substitutes for a comma when referring to a decimal marker.

References to International Standards should be replaced by references to Australian or Australian/New Zealand Standards, as follows:

<i>Reference to International Standard</i>		<i>Australian/New Zealand Standard</i>	
IEC		AS	
60034	Rotating electrical machines	60034	Rotating electrical machines
60034-1	Part 1: Rating and performance	60034.1	Part 1: Rating and performance
60034-5	Part 5: Degrees of protection provided by the integral design of rotating electrical machines (IP Code)—Classification	60034.5	Part 5: Degrees of protection provided by the integral design of rotating electrical machines (IP Code)—Classification
60529	Degrees of protection provided by enclosures (IP Code)	60529	Degrees of protection provided by enclosures (IP Code)
60947	Low-voltage switchgear and controlgear	60947	Low-voltage switchgear and controlgear
60947-1	Part 1: General rules	60947.1	Part 1: General rules
IEC		AS/NZS	
60079	Explosive atmospheres	60079	Explosive atmospheres
60079-1	Part 1: Equipment protection by flameproof enclosures “d”	60079.1	Part 1: Equipment protection by flameproof enclosures ‘d’
60079-2	Part 2: Equipment protection by pressurized enclosures “p”	60079.2	Part 2: Equipment protection by pressurized enclosures ‘p’
60079-5	Part 5: Equipment protection by powder filling “q”	60079.5	Part 5: Equipment protection by powder filling ‘q’
60079-6	Part 6: Equipment protection by oil-immersion “o”	60079.6	Part 6: Equipment protection by oil-immersion ‘o’
60079-7	Part 7: Equipment protection by increased safety “e”	60079.7	Part 7: Equipment protection by increased safety ‘e’
60079-11	Part 11: Equipment protection by intrinsic safety “i”	60079.11	Part 11: Equipment protection by intrinsic safety ‘i’
60079-15	Part 15: Equipment protection by type of protection “n”	60079.15	Part 15: Equipment protection by type of protection ‘n’
60079-18	Part 18: Equipment protection by encapsulation “m”	60079.18	Part 18: Equipment protection by encapsulation ‘m’

<i>Reference to International Standard</i>		<i>Australian/New Zealand Standard</i>	
IEC		AS/NZS	
60079-25	Part 25: Intrinsically safe electrical systems	60079.25	Part 25: Intrinsically safe electrical systems
60079-26	Part 26: Equipment with equipment protection level (EPL) Ga	60079.26	Part 26: Equipment with equipment protection level (EPL) Ga
60079-28	Part 28: Protection of equipment and transmission systems using optical radiation	60079.28	Part 28: Protection of equipment and transmission systems using optical radiation
60079-30-1	Part 30-1: Electrical resistance trace heating—General and testing requirements	60079.30.1	Part 30.1: Electrical resistance trace heating—General and testing requirements.
60079-31	Part 31: Equipment dust ignition protection by enclosure ‘t’	60079.31	Part 31: Equipment dust ignition protection by enclosure ‘t’
60896-2	Stationary lead-acid batteries—General requirements and test methods Part 2: Valve regulated types	4029.2	Stationary batteries—Lead-acid Part 2: Valve regulated types
61241-4	Electrical apparatus for use in presence of combustible dust— Part 4: Type of protection ‘pD’	61241.4	Electrical apparatus for use in presence of combustible dust— Part 4: Type of protection ‘pD’
62013-1	Caplights for use in mines susceptible to firedamp— Part 1: General requirements— Construction and testing in relation to the risk of explosion	62013.1	Caplights for use in mines susceptible to firedamp— Part 1: General requirements— Construction and testing in relation to the risk of explosion
ISO		AS	
4014	Hexagon head bolts—Product grades A and B	1110.1	ISO metric hexagon bolts and screws—Product grades A and B— Part 1: Bolts
4017	Hexagon head screws—Product grades A and B	1110.2	ISO metric hexagon bolts and screws—Product grades A and B— Part 2: Screws
ISO		AS/NZS	
4026	Hexagon socket set screws with flat point	1421	ISO metric hexagon socket set screws
4027	Hexagon socket set screws with cone point	1421	ISO metric hexagon socket set screws
4028	Hexagon socket set screws with dog point	1421	ISO metric hexagon socket set screws
4029	Hexagon socket set screws with cup point	1421	ISO metric hexagon socket set screws

It should be noted that many other parts of IEC 60079 and IEC 61241 are now published as identically numbered parts of AS/NZS 60079 and AS/NZS 61241 respectively. The latter should be referenced when necessary.

The terms ‘normative’ and ‘informative’ are used to define the application of an annex to which they apply. A normative annex is an integral part of a standard, whereas an informative annex is only for information and guidance.

This is a free preview. Purchase the entire publication at the link below:

[Product Page](#)

-
- [Looking for additional Standards? Visit Intertek Inform Infostore](#)
 - [Learn about LexConnect, All Jurisdictions, Standards referenced in Australian legislation](#)
-