

SAFETY ALERT

CYLINDER VALVES MISSING REQUIRED MARKINGS

Compressed gases are classified by the U.S. Department of Transportation (DOT) and Transport Canada (TC) as hazardous materials. As such, DOT and TC have regulations to ensure their safe and effective transportation. These regulations apply to the packaging of the compressed gases, including the cylinder and cylinder valve.

Recently, several cylinders were identified during prefill inspection as having what appear to be newly manufactured valves missing the required DOT/TC markings. The required markings for cylinder valves are found in Title 49 of the U.S. *Code of Federal Regulations* (49 CFR) 173.301, which incorporates by reference CGA V-9, *Standard for Compressed Gas Cylinder Valves*, 8th edition [1, 2]. Required markings for UN cylinders are found in 49 CFR 173.301b [1]. For Canada, the required markings are found in CSA B340–2025, *Selection and use of cylinders, spheres, tubes, and other containers for the transportation of dangerous goods, Class 2*, or B342–2025, *Selection and use of UN pressure receptacles, multiple element gas containers, and other pressure receptacles for the transport of dangerous goods, Class 2* for UN cylinders [3, 4]. These requirements are enforced by DOT in the United States, and by TC in Canada.

Date of manufacture has been a required marking for cylinder valves in the United States since 2019 and in Canada since 2014. Based on the date of manufacture, CGA recommends referencing the regulations and standards listed previously to determine which additional markings are required for the valve. Valves that have been in service in cylinders before these compliance dates may continue to be used.

We recommend that all companies operating cylinder filling plants and/or requalification and maintenance facilities alert and train their employees about this compliance issue. Any cylinder valves without the required DOT/TC markings pose an unacceptable safety risk. Cylinders with valves missing the required markings shall not be filled or transported, and shall be removed from service. The discovery of these cylinder valves should be reported to the DOT or TC. A copy of this safety alert should be posted in cylinder fill plants and cylinder requalification and maintenance areas.

For more information, please reference the appropriate DOT or TC regulations and standards [1, 2, 3, 4].

References

Unless otherwise specified, the latest edition shall apply.

[1] *Code of Federal Regulations*, Title 49 (Transportation) Parts 100-180, U.S. Government Printing Office. www.gpo.gov

[2] CGA V-9, *Standard for Compressed Gas Cylinder Valves, 8th Edition (2019)*, Compressed Gas Association, Inc. www.cganet.com

[3] CSA B340, *Selection and use of cylinders, spheres, tubes, and other containers for the transportation of dangerous goods, Class 2*, Canadian Standards Association. www.csagroup.org

[4] CSA B342, *Selection and use of UN pressure receptacles, multiple-element gas containers, and other pressure receptacles for the transport of dangerous goods, Class 2*, Canadian Standards Association. www.csa-group.org

PLEASE NOTE:

The information contained in this document was obtained from sources believed to be reliable and is based on technical information and experience currently available from members of the Compressed Gas Association, Inc. and others. However, the Association or its members, jointly or severally, make no guarantee of the results and assume no liability or responsibility in connection with the information or suggestions herein contained. Moreover, it should not be assumed that every acceptable commodity grade, test or safety procedure or method, precaution, equipment or device is contained within, or that abnormal or unusual circumstances may not warrant or suggest further requirements or additional procedure.

This document is subject to periodic review, and users are cautioned to obtain the latest edition. The Association invites comments and suggestions for consideration. In connection with such review, any such comments or suggestions will be fully reviewed by the Association after giving the party, upon request, a reasonable opportunity to be heard. Proposed changes may be submitted via our website, www.cganet.com.

This document should not be confused with federal, state, provincial, or municipal specifications or regulations; insurance requirements; or national safety codes. While the Association recommends reference to or use of this document by government agencies and others, this document is purely voluntary and not binding unless adopted by reference in regulations.

A listing of all publications, audiovisual programs, and safety posters is available at www.cganet.com. For more information contact CGA at Phone: 703-788-2700, ext. 799 or E-mail: customerservice@cganet.com.

Work Item 26-84
Cylinder Valve Committee

FIRST EDITION: 2026

© 2026 The Compressed Gas Association, Inc. All rights reserved. All materials contained in this work are protected by United States and international copyright laws. You may not alter or remove any trademark, copyright, or other notice from this work.

CGA GRANTS PERMISSION TO REPRODUCE THIS SAFETY ALERT