

**OCCUPATIONAL SAFETY
AND HEALTH STANDARDS BOARD**

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Attachment No. 2

INITIAL STATEMENT OF REASONS

CALIFORNIA CODE OF REGULATIONS

TITLE 8: Chapter 4, Subchapter 1, Article 1, Sections 450 and 453; and
Article 5, Sections 471, 475, 477, 486, 487, 494 and New Appendix D

Liquefied Petroleum Gas Systems

SUMMARY

This rulemaking action is being initiated by the Division at the verbal recommendation of the Western Propane Gas Association to replace the existing reference to the National Fire Protection Association (NFPA) 58, 1992 Edition, LP-Gas code as part of the Unfired Pressure Vessel Safety Orders with the current 1998 Edition. The 1992 Edition of NFPA 58 was adopted by reference January 3, 1997. The Division convened an LP-Gas advisory committee to review the changes in NFPA 58, 1998 Edition that may affect the Safety Orders. This proposal reflects the consensus opinion of that advisory committee.

SPECIFIC PURPOSE AND FACTUAL BASIS OF PROPOSED ACTION

The proposed revisions to the existing regulations will provide the regulated public with a set of standards consistent with current equipment, techniques, and work practices.

This rulemaking action contains requirements found in the NFPA 58, 1998 Edition document entitled "LP-Gas Code", proposed for incorporation by reference. In order to prevent duplication, sections of the Unfired Pressure Vessel Safety Orders are proposed for repeal when identical requirements contained in the NFPA document exist. Otherwise, the proposed revisions may incorporate NFPA requirements into existing regulatory text.

This proposed rulemaking action also contains several nonsubstantive, editorial, and grammatical revisions. These nonsubstantive revisions are not all discussed in this Informative Digest. However, these proposed revisions are clearly indicated in the regulatory text in underline and strikeout format. In addition, the following actions are proposed to reflect current practices, techniques, and equipment used in the liquefied petroleum industry:

Section 450. Application of the Unfired Pressure Vessel Safety Orders.

Section 450 outlines the application of the Unfired Pressure Vessel Safety Orders. Subsection (a)(1) states that these Orders establish minimum standards for the design, construction, and installation of LP-Gas containers. The second sentence of existing subsection (a)(1) states that the National Fire Protection Association (NFPA) 58, Standard for the Storage and Handling of Liquefied Petroleum Gases, 1992 Edition, is hereby incorporated by reference.

A revision is proposed in subsection (a)(1) to replace the existing reference to the NFPA 58, 1992 Edition document incorporated by reference with the current 1998 Edition, entitled "LP-Gas Code". The proposed revision is necessary to ensure that the minimum standards for the design, construction, and installation of LP-Gas containers, including the storage and handling of LP-Gas, meet NFPA requirements.

Existing subsection (a)(6) addresses the establishment of minimum standards for the installation, use, repair, and alteration of LNG and NH₃ storage tanks for operation at 15 psig or less. A revision is proposed to include LPG storage containers which was inadvertently omitted from the text when the subsection was last revised. The proposed revision is necessary to clarify to the regulated public that LPG storage containers are included in these standards.

The existing "Exception" to Section 450 pertains to existing installations and equipment which were and remain in compliance with the Safety Orders, or variances therefrom, that were in effect prior to the effective date of these Safety Orders. A revision is proposed to relocate the exception to subsection (b), for clarity purposes, and replace the phrase "in effect prior to the effective date of these Safety Orders" with "in effect at the time of manufacture or installation." The proposed revisions will provide clarity to the regulation and assist the regulated public in identifying which standards affect their existing LP-Gas installations and equipment.

Section 453. Definitions.

Section 453 provides definitions applicable to the Unfired Pressure Vessel Safety Orders. A revision is proposed to replace the existing NFPA 58, 1992 Edition reference with 1998 Edition and to cite the correct section of NFPA 58, Section 1-6, versus the existing reference to Section 1-7. The proposed revision is necessary to clarify which definitions are directly relevant and applicable to the LP-Gas industry and will ensure that the current section of the NFPA 58 document is referenced.

Section 471. Control of Products in Tanks and Cylinders.

Section 471 addresses the control of products in tanks and cylinders. Existing subsection (a) states that the requirement that all LP-Gases be odorized by the addition of a warning agent may be waived by the Division upon written application when the LP-Gas is to be used exclusively in a process where the presence of an odorant would make the LP-Gas unfit for use in the process and for deliveries between refineries or between producing wells and refineries.

It is proposed to adopt a new subsection (a) which will require that no LP-Gas be transported or delivered into any vessel covered by these Orders until first odorized using a warning agent of such character that the gases are detectable, by distinct odor, down to a concentration in air of not over one-fifth of the lower limit of flammability. It is also proposed that existing subsection (a) be rephrased and made the “exception” to the new subsection. The proposed revisions are necessary to clarify that odorizing agents are required when transporting or delivering LP-Gas, except when the addition of such agents makes the gas unfit for use and when deliveries are made between refineries or between producing wells and refineries, and a waiver is obtained from the Division.

Existing subsection (b) states that any tank used to transport or store unodorized LP-Gas shall have a warning sign reading “NOT ODORIZED” on both sides (and rear of transportation tanks), in letters at least 4 inches high. A revision is proposed to repeal this subsection since this requirement is duplicative of that found in section 2-2.6.5 of the NFPA 58, 1998 Edition document proposed for incorporation by reference.

Section 475. Location of Storage Containers and Regulating Equipment.

Section 475 addresses the location parameters where containers and regulating equipment can and/or cannot be stored. It is proposed to adopt a new subsection (c) which prohibits the installation of stationary LP-Gas containers on rooftops. The 1998 Edition of NFPA 58 allows for the installation of ASME LP-Gas containers under such highly restricted conditions that installation of these containers on rooftops would be unfeasible. The proposed revision is necessary to ensure that LP-Gas containers are not installed on rooftops and to clarify that this requirement takes precedence over the NFPA 58, 1998 Edition document proposed for incorporation by reference.

Section 477. Installation of Containers.

Section 477 addresses the installation requirements for various types of containers. Existing subsection (a)(1) requires that metallic structural supports, when used, shall be encased in concrete or other material having a fire-resistant rating of at least 1 hour when the distance between the lower surface of the tank and the top of the concrete or masonry exceeds 18 inches. A revision is proposed to change the fire-resistant rating to at least 2 hours to conform with the requirements contained in Section 2-2.5.3 of the NFPA 58, 1998 Edition document proposed for incorporation by reference. The revision is necessary to ensure consistency with the requirements mandated by the State Fire Marshal and other local fire prevention agencies.

Subsection (a)(2) addresses the protection requirements of aboveground storage containers from impact from vehicles by means of crashposts, curbs, fences, railings or similar barriers. This subsection further details the requirements of the use of crashposts as a means of protecting aboveground storage containers from vehicle impact. Subsection (a)(2) also contains a paragraph which states that the effective date for new crashpost installations shall be 12 months after date of filing. A revision is proposed to delete this paragraph since it has been more than 12 months since the revised crashpost installation requirement was filed with the Secretary of

State (December 4, 1996) and since the regulated public must install new crashposts in accordance with the requirements of the current safety orders.

Existing subsection (a)(3) requires that when container installations are manifolded together, the 86½% levels shall be in substantially the same horizontal plane. A revision is proposed to repeal this subsection to prevent duplication since this requirement is contained in Section 3-2.4.2 of the NFPA 58, 1998 Edition document proposed for incorporation by reference.

Existing subsection (b)(1)(C) states that the relief-valve capacity and installation shall be that which is required for aboveground containers and shall comply with NFPA 58, Section 3-2.5.3(b), as measured from the tank shell. A revision is proposed to change the NFPA reference section to Section 3-2.6.3 due to the change in the numbering in the NFPA 58, 1998 Edition document proposed for incorporation by reference.

Section 486. Regulators.

Existing Section 486 covers the specification requirements for regulators. A revision is proposed to repeal this section in order to prevent duplication since these requirements are contained under Section 2-5.7 of the NFPA 58, 1998 Edition document proposed for incorporation by reference.

Section 487. Regulator Installation.

Existing Section 487 covers the installation requirements for regulators. A revision is proposed to repeal this section in order to prevent duplication since these requirements are contained under Section 3-2.7 of the NFPA 58, 1998 Edition document proposed for incorporation by reference.

Section 494. Repairs and Alterations.

Section 494 outlines the requirements for repairs or alterations made to containers or cylinders. Existing subsection (b) requires that no repair or alteration affecting the safety of any container or cylinder shall be made until the contemplated repair or alteration has been authorized by a qualified inspector. It further states that nothing in this order shall prohibit the exchange or interchange of valves, fittings, and accessories intended for the same purpose. A revision is proposed that will require the owner or user of the LP-Gas container to ensure that any repair or alteration to the container be performed by a company that possesses a valid ASME "U" or a National Board "R" Certificate of Authorization. This proposed revision is necessary to prevent any unauthorized repairs/alterations from being performed on LP-Gas containers and to ensure that all repairs/alterations are performed in accordance with the requirements of the original code of construction. An additional revision is proposed to rephrase the last sentence to read, "The exchange or interchange of valves, fittings, and accessories intended for the same purpose shall not be considered a repair or alteration." The proposed revision will provide clarification to the regulation and permit the exchange or interchange of valves, fittings or accessories to be made by a company that does not possess an ASME "U" or a National Board "R" Certificate of Authorization.

Existing subsection (e) requires that all repairs affecting the safety of LP-Gas containers be reported to the Division within 21 days by a qualified inspector authorizing such repairs. It also requires that the qualified inspector stamp his certificate of competency number adjacent to all welded repairs authorized by him, except for repairs to quenched and tempered steels, and that this exception is to be noted in the inspector's report. A revision is proposed that will require the owner or user of LP-Gas containers to ensure that all authorized repairs/alterations affecting the safety of the container be reported to the Division within 21 days by the ASME "U" or National Board "R" certificate holder performing the repair/alteration using the appropriate National Board Form R-1, Report of Welded Repair, or R-2, Report of Alteration, or equivalent (See Appendix D). Samples of these forms are provided in proposed new Appendix D of these safety orders. The proposed revision is necessary to ensure that all repairs/alterations to LP-Gas containers are performed in accordance with the requirements of the original code of construction and that these repairs are properly documented and filed with the Division.

The second paragraph of existing subsection (f) requires that repairs to DOT cylinders be made under DOT regulations and control in accordance with the requirements of 49 CFR Section 173.34. It is proposed to reformat the second paragraph of subsection (f) as proposed new subsection (g) and add the phrase "and cargo containers" to include all LP-Gas cylinders and containers under the jurisdiction and control of DOT. The proposed revision is necessary to ensure that DOT cylinders and cargo containers are repaired in accordance with DOT requirements and regulations.

Appendix D

Proposed new Appendix D contains samples of the National Board Forms R-1, Report of Welded Repair, and R-2, Report of Alteration, as referenced in the proposed revisions to Section 494, Repairs and Alterations. These forms, or an equivalent, are required to be completed by the ASME "U" or National Board "R" certificate holder performing authorized repairs or alterations to LP-Gas containers, and are required to be submitted to the Division within 21 days of the completed repairs/alterations. The proposed new Appendix is necessary for reference purposes and the information provided will ensure that all repairs or alterations effecting the safety of LP-Gas containers are performed in accordance with the requirements of the original code of construction and that these repairs are properly documented and reported to the Division

DOCUMENTS INCORPORATED BY REFERENCE

1. National Fire Protection Association, NFPA 58, 1998 Edition, LP-Gas Code.

This document is too cumbersome or impractical to publish in Title 8. Copies of this document are available for review Monday through Friday from 8:00 a.m. to 4:30 p.m. at the Standards Board Office located at 2520 Venture Way, Suite 350, Sacramento, CA 95833.

REASONABLE ALTERNATIVES THAT WOULD LESSEN ADVERSE ECONOMIC IMPACT ON SMALL BUSINESSES

The proposal will not have an adverse economic impact on owners or users of LP-Gas containers. The proposal may, however, have an adverse economic impact on businesses that conduct repairs and/or alterations on LP-Gas containers and do not already possess a valid ASME “U” or National Board “R” Certificate of Authorization. These businesses must first obtain the ASME “U” or National Board “R” Certificate of Authorization from the ASME or National Board, respectively, as proposed in Section 494, in order to perform any needed repairs and/or alterations on LP-Gas containers. No reasonable alternatives were identified by the Board and no reasonable alternatives identified by the Board or otherwise brought to its attention would lessen the impact on small businesses.

SPECIFIC TECHNOLOGY OR EQUIPMENT

This proposal will not mandate the use of specific technologies or equipment.

COST ESTIMATES OF PROPOSED ACTION

Costs or Savings to State Agencies

No costs or savings to state agencies will result as a consequence of the proposed action.

Impact on Housing Costs

The Board has made an initial determination that this proposal will not significantly affect housing costs.

Impact on Businesses

See “Reasonable Alternatives That Would Lessen Adverse Economic Impact on Small Businesses.” The Board has made an initial determination that this proposal will not result in a significant, statewide adverse economic impact directly affecting businesses, including the ability of California businesses to compete with businesses in other states.

Cost Impact on Private Persons or Businesses

The Board is not aware of any cost impacts that a representative private person or business would necessarily incur in reasonable compliance with the proposed action.

Costs or Savings in Federal Funding to the State

The proposal will not result in costs or savings in federal funding to the State.

Costs or Savings to Local Agencies or School Districts Required to be Reimbursed

No costs to local agencies or school districts are required to be reimbursed. See explanation under "Determination of Mandate."

Other Nondiscretionary Costs or Savings Imposed on Local Agencies

This proposal does not impose nondiscretionary costs or savings on local agencies.

DETERMINATION OF MANDATE

The Occupational Safety and Health Standards Board has determined that the proposed regulations do not impose a local mandate. Therefore, reimbursement by the state is not required pursuant to Part 7 (commencing with Section 17500) of Division 4 of the Government Code because the proposed amendments will not require local agencies or school districts to incur additional costs in complying with the proposal. Furthermore, these regulations do not constitute a "new program or higher level of service of an existing program within the meaning of Section 6 of Article XIII B of the California Constitution."

The California Supreme Court has established that a "program" within the meaning of Section 6 of Article XIII B of the California Constitution is one which carries out the governmental function of providing services to the public, or which, to implement a state policy, imposes unique requirements on local governments and does not apply generally to all residents and entities in the state. (County of Los Angeles v. State of California (1987) 43 Cal.3d 46.)

These proposed regulations do not require local agencies to carry out the governmental function of providing services to the public. Rather, the regulations require local agencies to take certain steps to ensure the safety and health of their own employees only. Moreover, these proposed regulations do not in any way require local agencies to administer the California Occupational Safety and Health program. (See City of Anaheim v. State of California (1987) 189 Cal.App.3d 1478.)

These proposed regulations do not impose unique requirements on local governments. All employers - state, local and private - will be required to comply with the prescribed standards.

EFFECT ON SMALL BUSINESSES

The Board has determined that the proposed amendments may effect small businesses.

ASSESSMENT

The adoption of the proposed amendments to these regulations will neither create nor eliminate jobs in the State of California nor result in the elimination of existing businesses or create or expand businesses in the State of California.

ALTERNATIVES THAT WOULD AFFECT PRIVATE PERSONS

No reasonable alternatives have been identified by the Board or have otherwise been identified and brought to its attention that would be more effective in carrying out the purpose for which the action is proposed or would be as effective and less burdensome to affected private persons than the proposed action.