

Formal Interpretations/ Interprétation formelle

This section lists questions that individuals have submitted about a particular standard. Each question has been reviewed and answered by the appropriate committee. If you would like to submit a question about a particular standard, please see the end notes in the preface of that standard.

Posted February 23, 2024

The following interpretation regarding clause 5.1.8 of CSA Standard B137.1:23, Polyethylene (PE) Pipe, Tubing, and Fittings for Cold-Water Pressure Services, has been approved by the Members of the CSA Standards Technical Committee on *Plastic Pressure Piping (B219)*.

Question: Is the ductility requirement in B137.1, clause 5.1.8 also applicable to tubing?

Answer: No

The following interpretation regarding clause 5.1.7.2 of CSA Standard B137.1:23, Polyethylene (PE) Pipe, Tubing, and Fittings for Cold-Water Pressure Services, has been approved by the Members of the CSA Standards Technical Committee on *Plastic Pressure Piping (B219)*.

Question: Is the ovality requirement in B137.1, clause 5.1.7.2 also applicable to tubing?

Answer: No

Posted January 15, 2024

The following interpretation regarding Clause 6.5.4 and in the Scope, Clause 1, sub clause 1.1 of CSA Standard A440.4-19, Window, door, and skylight installation, has been approved by the Members of the CSA Standards Technical Committee on *Performance Standard for Windows* (A119).

Question 1: Does the requirements of Clause 6.5.4 of CSA A440.4-19 apply to non-metallic frame windows and doors cast into concrete foundations?

Answer 1: No

Question 2: Does non-metallic frame windows and doors cast into concrete foundations considered and included in the Scope, Clause 1 and Sub Clause 1.1, of CSA A440.4-19?

Answer 2: No



Posted December 22, 2023

The following interpretation regarding Clause 4.4 of CSA Standard Z662:23, Oil and gas pipeline systems, has been approved by the Members of the CSA Standards Technical Committee on Petroleum and Natural Gas Industry Pipeline Systems and Materials (K110).

Question 1: Since the required valve spacing in Table 4.7 is not specified for all Class 1 locations, and all Classes for LVP pipelines, and Note 1 states that the company shall demonstrate the suitability of valve spacing as described in Clauses 4.4.4 and 4.4.7, if a valve is to be relocated with similar release volumes and the same controls are in place for its operation, can the valve be relocated as needed without further evaluation?

Answer 1: No

Question 2: If a valve, such as in all Class 1 locations or anywhere on an LVP pipeline, is to be relocated, must the demonstration as described in Clauses 4.4.4 and 4.4.7 be completed to confirm suitability of the revised valve spacing?

Answer 2: Yes

The following interpretation regarding Clause 10.11.4.3 of CSA Standard Z662:23, Oil and gas pipeline systems, has been approved by the Members of the CSA Standards Technical Committee on Petroleum and Natural Gas Industry Pipeline Systems and Materials (K110).

Question: Is Clause 10.11.4.3 a) i) supposed to read "All tests shall be in accordance with the procedures of ASME PCC-2, Article 401"?

Answer: Yes

The following interpretation regarding Clauses 6.3.4.2 and 8.1.7 of CSA Standard Z662:23, Oil and gas pipeline systems, has been approved by the Members of the CSA Standards Technical Committee on Petroleum and Natural Gas Industry Pipeline Systems and Materials (K110).

Question 1: Was the intent of the reference in Clause 6.3.4.2 to Clause 4.1.10 actually intended to refer to Clause 4.1.12?

Answer 1: Yes

Question 2: Was the intent of the reference in Clause 8.1.7 to Clause 4.1.10 actually intended to refer to Clause 4.1.12?

Answer 2: Yes

The following interpretation regarding Figure 1.1 and Table 4.2 of CSA Standard Z662:23, Oil and gas pipeline systems, has been approved by the Members of the CSA Standards Technical Committee on Petroleum and Natural Gas Industry Pipeline Systems and Materials (K110).

Question 1: In accordance with Figure 1.1, are all types of dense phase or liquid CO2 stations (measuring, pressure regulating, pumping) excluded from the scope of CSA Z662?



Answer 1: Yes

Question 2: Table 4.2 provides location factors for CO2 "stations" (see Note 3 to Table 4.2). Are these location factors intended to be used for dense phase or liquid CO2 station design?

Answer 2: No

Question 3: Does metering (including piping, valves, measurement equipment and related instrumentation) installed for the purposes of leak-detection (in accordance Clause 10.3.4) meet the definition of a "measuring station" as shown in Figure 1.1?

Answer 3: Yes

Question 4: Does metering installed for the purposes of leak-detection, where this piping is installed as part of a dense phase or liquid CO2 pipeline system, require the use of station isolation valves?

Answer 4: Yes

Question 5: Is the piping between the isolation valves, as part of a dense phase or liquid CO2 pipeline system, surrounding metering for leak detection, within the CSA Z662 scope (as shown in Figure 1.1)?

Answer 5: No

The following interpretation regarding Clause 4.10 of CSA Standard Z662:23, Oil and gas pipeline systems, has been approved by the Members of the CSA Standards Technical Committee on Petroleum and Natural Gas Industry Pipeline Systems and Materials (K110).

Question 1: Clause 4.10 makes mention of requirements for "welded attachments" that are being welded directly to pipe. Would a welded lifting lug meet the definition of a "welded attachment" in this clause?

Answer 1: Yes

Question 2: Clause 4.10 states "Where welded attachments are required for pipelines designed to operate at hoop stress levels of more than 50% of the specified minimum yield strength of the pipe, such attachments shall be welded to a separate cylindrical member that completely encircles the pipe...".

If the lifting lug were to be welded on piping where design hoop stress levels exceed 50% of the SMYS of the pipe, would the lifting lug need to follow this requirement of being welded to a separate cylindrical member? This is taking into consideration that a lifting lug will not be under additional stress during pipeline operations – it is only under stress during above-ground piping transportation and assembly.

Answer 2: Yes



The following interpretation regarding Clause 4.5.2 d) of CSA Standard Z662:23, Oil and gas pipeline systems, has been approved by the Members of the CSA Standards Technical Committee on Petroleum and Natural Gas Industry Pipeline Systems and Materials (K110).

Question 1: Where non-sour HVP station piping is designed by ASME B31.3, as allowed by Clause 4.14.3.8 d), do the requirements of Clause 4.5.2 d) apply?

Answer 1: No

Question 2: If the answer to question 1 is "Yes", then in the case where drain piping is isolated by a root valve from process and piping internal pressure after root valve is near atmospheric, are threaded joints in these cases allowed?

Answer 2: N/A

Question 3: If the answer to question 1 is "Yes", some piping flanges may not be practical such as cavity drain system of DIB/DBB ball valve or TRV of DIB-1 or equipment drains on pumps, compressors, or similar. In these cases, are threaded joints allowed?

Answer 3: N/A

The following interpretation regarding Clause 16.9.3.1 of CSA Standard Z662:23, Oil and gas pipeline systems, has been approved by the Members of the CSA Standards Technical Committee on Petroleum and Natural Gas Industry Pipeline Systems and Materials (K110).

Question 1: Clause 16.9.3.1 Partial-penetration welds states that partial-penetration welds are not allowed in sour service applications. When attaching scraper bars, either directly to a barred tee or welding them to a connecting plate/bar to help shorten the length of unsupported scraper bars in a larger size branch outlet, which are technically considered non-pressure-retaining attachments, does Clause 16.9.3.1 restrict the welding to a full-penetration design only?

Answer 1: No, Clause 16.9.3.1 is intended to be specific to butt welds.

Question 2: Does Clause 16.9.3.1 prohibit use of partial penetration welds for welds other than butt welds (e.g., fillets for scrapper bar attachments).

Answer 2: No

The following interpretation regarding Clause 10.3.2.1 and Table 4.9 of CSA Standard Z662:23, Oil and gas pipeline systems, has been approved by the Members of the CSA Standards Technical Committee on Petroleum and Natural Gas Industry Pipeline Systems and Materials (K110).

Question: For an operating pipeline, if it is found that the depth of cover is less than the requirements in Table 4.9, could it be determined to be acceptable, using Clause 10.3.2.1

Answer: Yes



The following interpretation regarding Clause 8.5.2.2 and Table C.1 of CSA Standard Z245.1:22, Steel pipe, has been approved by the Members of the CSA Standards Technical Committee on Petroleum and Natural Gas Industry Pipeline Systems and Materials (K110).

Question: Clause 8.5.2.2 states that Charpy V-notch impact test shall be performed at -5 C or lower, Table C.1 (Informative) states that tests shall be performed at temperatures lower than -5 C. Does the verbiage in the main body of the standard take precedence over the verbiage in the informative Annex C?

Answer: Yes

The following interpretation regarding Clauses 7.2.5.2, 17.2, and 17.3 of CSA Standard Z245.1:22, Steel pipe, has been approved by the Members of the CSA Standards Technical Committee on Petroleum and Natural Gas Industry Pipeline Systems and Materials (K110).

Question: Is cold flattening allowed for a round bar tension test specimen used for the elevated temperature transverse weld tension test?

Answer: Yes

The following interpretation regarding Clauses 5.5.3 and 12.10 of CSA Standard Z245.17:22, Cold bends, has been approved by the Members of the CSA Standards Technical Committee on Petroleum and Natural Gas Industry Pipeline Systems and Materials (K110).

Question: In Clause 5.5.3: "For bends intended for sour service, relieving shall be required if the fiber strain exceeds 5%."

In Clause 12.10: "Bends with a fiber strain of 5% or greater shall be subject to a post-bend heat treatment in accordance with Clause 7.2."

If a cold bend exhibits a fiber strain of 5% exactly, should the bend be subjected to a post bend heat treatment?

Answer: Yes

The following interpretation regarding Clause 5.5 f) of CSA Standard Z245.15:22, Steel valves, has been approved by the Members of the CSA Standards Technical Committee on Petroleum and Natural Gas Industry Pipeline Systems and Materials (K110).

Question: In accordance with CSA Z245.15 Clause 5.5 f), a sealant fitting shall be furnished with a vented cap. Is it the intent of Clause 5.5 f) that all sealant fittings have caps?

Answer: No. If caps are installed, they shall comply with Clause 5.5 f).

The following interpretation regarding Clause 5.2.1 of CSA Standard Z245.21:22, Plant-applied external polyethylene coating for steel pipe, has been approved by the Members of the CSA Standards Technical Committee on Petroleum and Natural Gas Industry Pipeline Systems and Materials (K110).



Question 1: In accordance with CSA Z245.21:22, is the PE virgin resin manufacturer required to perform Table 3 property testing on every lot produced?

Answer 1: No

Question 2: Is the PE virgin resin manufacturer required to report CSA Z245.21:22 Table 3 properties on every certification document (COA) that is provided to the customer with each lot? Answer 2: Yes

The following interpretation regarding Clause 6.1.1 of CSA Standard Z245.22:22, Plant-applied external polyurethane foam insulation coating for steel pipe, has been approved by the Members of the CSA Standards Technical Committee on Petroleum and Natural Gas Industry Pipeline Systems and Materials (K110).

Question: When reagent grade (>=95%) cyclopentane (i.e., a single molecule chemical whose molecular and structural formula don't change regardless of manufacturer) is used as a blowing agent in the polyurethane foam insulation system, it is not required to re-qualify the insulation system if there is only a change in cyclopentane manufacturer providing the formulation of polyol/isocyanate and the amount of cyclopentane stay the same.

Answer: Agree.