How far is the acetylene cylinder from the distribution box

Overview

46 CFR 56.50-103 -(b) The distribution piping must include a means, located as close to the supply cylinders as possible, of regulating the discharge press.

Key Takeaways

Acetylene cylinders should be stored at least 20 feet away from potential ignition sources, including distribution boxes, or separated by a noncombustible barrier at least 5 feet high with a 30-minute fire-resistance rating.

Recommended Separation

According to OSHA regulations (29 CFR 1910. 253), acetylene cylinders must be stored at a minimum distance of 20 feet from oxygen cylinders or other potential ignition sources, which includes electrical distribution boxes or panels. If maintaining a 20-foot distance is not feasible, a noncombustible barrier such as a concrete or metal wall at least 5 feet tall with a minimum 30-minute fire-resistance rating can be used to reduce risk.

Additional Safety Measures

Upright Position: Cylinders must always be secured in an upright position to prevent tipping and solvent loss. Ventilation: Store cylinders in well-ventilated areas to prevent accumulation of acetylene gas. Away from Heat Sources: Keep cylinders away from flames, sparks, or electrical equipment that could act as an ignition source.

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No Smoking Zones: Clearly mark storage areas as “No Smoking” and restrict public access. Cylinder Handling: Use trolleys or other suitable equipment to move cylinders safely, avoiding impact or rough handling.

Summary

For safety, maintain at least 20 feet between acetylene cylinders and distribution boxes. If space is limited, install a fire-resistant, noncombustible barrier. Always ensure proper ventilation, upright positioning, and restricted access to minimize the risk of fire or explosion.

Article Content

46 CFR 56.50-103 -

(b) The distribution piping must include a means, located as close to the supply cylinders as possible, of regulating the discharge pressure from the supply cylinders.

Oxygen and Acetylene Storage: OSHA Rules and

Learn how OSHA requires you to store oxygen and acetylene cylinders safely, including separation distances, indoor limits, and handling empty tanks.

Acetylene and Oxygen Storage Separation: OSHA Compliance Guide

Learn the minimum storage separation between acetylene and oxygen cylinders. Discover OSHA''s 20-foot rule and the 5-foot barrier exception for gas safety.

1910.253

Oxygen cylinders in storage shall be separated from fuel-gas cylinders or combustible materials (especially oil or grease), a minimum distance of 20 feet (6.1 m) or by a noncombustible barrier at

§ 56.50-103 Fixed oxygen-acetylene distribution piping.

(b) The distribution piping must include a means, located as close to the supply cylinders as possible, of regulating the discharge pressure from the supply cylinders.

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If there are more cylinders, there shall be one room for acetylene and one for oxygen. The cylinders are fixed to the central, and connected to high pressure mainfolds with flexible high pressure hoses.

Gas Cylinder Safety Regulations & Standards

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Inside of buildings, cylinders shall be stored in a well-protected, well-ventilated, dry location, at least 20 (6.1m) feet from highly combustible materials such as oil or excelsior. Cylinders should be stored in

1910.102

Employers must ensure that the in-plant transfer, handling, storage, and use of acetylene in cylinders comply with the provisions of CGA Pamphlet G-1-2009 (“Acetylene”) (incorporated by reference, see

How far apart do incompatible gases need to be?

Flammable gases (e.g., hydrogen, methane, propane, acetylene) and oxygen (or other oxidizing gases) must be separated by 20 feet or by a non-combustible partition extending 18 inches above and to the

How to Store Oxygen and Acetylene Cylinders

Oxygen and acetylene cylinders must be stored separately, with a minimum distance of 20 feet. Alternatively, they must be separated by a noncombustible barrier that is at least 5 feet high and

RISK MANAGEMENT PROGRAMME FOR THE SAFE USE AND STORAGE OF ACETYLENE

Acetylene is a potentially dangerous gas which, following a process of decomposition and pressure accumulation, can cause fire or explosion. Because of the possibility of this risk, Fire and Rescue

The Safe Transport, Use and Storage of Acetylene Cylinders

Safe storage of acetylene cylinders When not in use, store gas cylinders in a safe well venti-lated area that is secure and lockable. Never store acet-ylene cylinders in occupied buildings, unventilated

How to Safely Store Oxygen and Acetylene Cylinders in the Workplace

Acetylene and oxygen are used for welding and cutting applications, however, both cylinders must be disconnected and stored correctly to reduce risk.

How to Safely Store Compressed Acetylene Gas Cylinders?

This post specifically concentrates on hazards as well as safe storage of compressed acetylene gas cylinders along with some additional information.

Chapter 13 – Gas Safety

Indoor locations where acetylene cylinders are charged (per NFPA 55, Chapter 15) Hydrogen equipment enclosures other than exhausted enclosures with gas volumes exceeding 1,000

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Acetylene, Propane, Mapp and Oxygen Gases

The reason that the gas burns so hot is because of the mix of carbon and hydrogen. Acetylene is distributed in cylinders or tanks in a dissolved (in

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Acetylene / Oxygen Welding Gas Distribution System Efficient solutions for the safe handling of gas cylinders onboard ship Gas cylinders, especially those containing flammable gases, may cause

Toolbox Talk: Oxygen and Acetylene Cylinders

Acetylene: Acetylene is a pungent-smelling hydrocarbon gas that can become unstable and violently decompose when more than 15 pounds per square inch gauge (psig) is used. Free acetylene should

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This document is for preliminary research. Verify specifications against current standards, product documentation and project requirements.

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