

PRODUCT IDENTIFICATION



Product Name: Hydrochloric Acid 10% Technical Grade

CAS Number: 7647-01-0

Molecular Formula: ClH

Molecular Weight: 36.46 g/mol

Grade: Technical Grade

Purity / Concentration: 10%

Synonyms: Not Available

PRODUCT OVERVIEW

Alliance Chemical offers 10% Technical Grade Hydrochloric Acid, a reliable and versatile aqueous solution suitable for a wide range of industrial applications. This clear, colorless liquid is precisely formulated to maintain a concentration of 10%, ensuring consistent performance for standard chemical processes.

Grade Significance: Technical Grade indicates that the product is manufactured for industrial use where high efficiency is required but laboratory-grade purity is not strictly necessary, offering a cost-effective solution for general processes.

CERTIFICATE OF ANALYSIS — TYPICAL VALUES

Certificate of Analysis data not available for this product.

PHYSICAL & CHEMICAL PROPERTIES

Appearance	Clear, colorless liquid with faint HCl odor	Form	Liquid
Boiling Point	108°C (20.2% azeotrope)	Melting / Freezing Point	-74°C (-101°F)
Flash Point	Not applicable	Specific Gravity	1.047
Solubility	Fully soluble in water	Molecular Formula	ClH
Molecular Weight	36.46 g/mol		

APPLICATIONS

- Water Treatment** — Used for pH adjustment in municipal and industrial water systems to maintain optimal chemical balance.
- Metal Processing** — Utilized in pickling baths to remove rust and scale from steel surfaces prior to coating or fabrication.
- Chemical Manufacturing** — Serves as a fundamental reagent in the synthesis of organic and inorganic compounds for various industrial products.
- Laboratory Research** — Provides a consistent, diluted acid source for analytical testing, sample preparation, and educational laboratory experiments.
- Textile Industry** — Applied in the processing and finishing of fabrics to ensure proper dye penetration and material texture.

STORAGE & HANDLING

Proper storage is critical because hydrochloric acid is highly corrosive to metals and can cause severe skin burns or respiratory irritation. Containers must be kept in a cool, well-ventilated area, away from incompatible substances like bases and oxidizing agents to prevent hazardous chemical reactions.

AVAILABLE PACKAGING

- 1 Quart
- 1 Gallon
- 5 Gallon
- 15 Gallon
- 55 Gallon
- 275 Gallon
- 330 Gallon

SAFETY SUMMARY (CROSS-REFERENCE TO SDS)

Signal Word: Danger



Hazard Statements:

- H290: May be corrosive to metals
- H314: Causes severe skin burns and eye damage
- H335: May cause respiratory irritation

Emergency Contact: CHEMTEL - 800-255-3924 (24 Hours/Day, 7 Days/Week)

For complete safety information, refer to the Safety Data Sheet (SDS) for this product.

Alliance Chemical | 204 South Edmond St, Taylor, Texas 76574 | 512-365-6838 | www.alliancechemical.com

Disclaimer: The information contained herein is believed to be accurate and represents the best information currently available to us. However, Alliance Chemical makes no warranty of merchantability or any other warranty, express or implied, with respect to such information, and we assume no liability resulting from its use. Users should make their own investigations to determine the suitability of the information for their particular purposes.