



GOETZE Group (GOETZE KG Armaturen)

Company Overview

GOETZE Group is a German manufacturer of safety valves, pressure reducing valves, overflow valves, vent valves, and related fittings. It operates globally across industries such as technical gases & cryogenics, clean process industries, building & water technology, chemistry, food & pharma, shipbuilding and others.

The company combines traditional craftsmanship with innovation and quality, offering customised valve solutions along with comprehensive service including spare parts, valve sizing, training, and technical know-how.

Hydrogen Involvement

GOETZE is deeply engaged in enabling safe hydrogen technologies along the entire hydrogen value chain. Its involvement covers hydrogen generation, storage, refuelling, transport, and use. Key areas of activity include:

- **Hydrogen Production & Electrolysis**
Safety valves protect both gas and liquid phases in electrolyzers. GOETZE supplies valves that are oil- and grease-free, and with ATEX-certification, suitable for both the hydrogen and oxygen sides of the electrolyser system.
- **Storage of Hydrogen**
Valve systems capable of handling high pressure and cryogenic conditions are manufactured for hydrogen storage. GOETZE offers customised safety valves (notably the 492 series) for pressures up to 1,500 bar
- **Hydrogen Refuelling**
GOETZE valves are used in hydrogen refuelling stations. For example, in the world's largest hydrogen filling station in Beijing, GOETZE's safety valves from the 492 series are applied in multiple points within the system at pressures up to 500 bar.
- **Small / Distributed Hydrogen Applications**
GOETZE integrates safety valves into compact hydrogen compression systems such as the REJOOL PIONYR hydrogen compressor, designed for local production and storage, and allied with small-scale and decentralised use including for homes, labs

and backup power applications. Valves used include 492 and 420 series for such systems.

- **Materials, Seals, and Standards for Hydrogen Compatibility**
GOETZE has expanded its production capabilities including new test benches to ensure valves perform under hydrogen conditions (issue of hydrogen embrittlement, seal permeability etc.). The company favours high-nickel stainless steels, stringent sealing materials, oil/grease-free manufacturing, and compliance with relevant standards.

Key Strengths

- **Wide product range and adaptability:** safety valves, pressure reducing valves, overflow and pressure control, etc., tailored for hydrogen environments both in small and large scales.
- **High pressure capability:** GOETZE produces valves certified up to 1,500 bar, suitable for very demanding hydrogen storage/refuelling infrastructure.
- **Strong technical understanding of hydrogen-specific challenges:** material selection, seal design, embrittlement, leak tightness, approvals and testing.
- **Proven deployments:** participation in large hydrogen filling stations, electrolysis demonstrators, and local hydrogen compressors.
- **Emphasis on safety and regulatory compliance:** oil- and grease-free production for certain valves, ATEX approvals, cryogenic/technical gas standards.

Applications & Market Position

GOETZE serves all parts of the hydrogen ecosystem:

- Hydrogen production plants (electrolysers)
- Hydrogen storage (pressurised and liquefied)
- Refuelling stations for fuel cell vehicles (cars, trucks, buses)
- Decentralised / small scale hydrogen systems (local storage/compression for homes, labs, etc.)
- Technical gases, cryogenic industries

It positions itself as a safety technology partner ensuring that components within hydrogen systems meet the demanding requirements of the hydrogen economy.