

# MANLEY® COMPRESSOR VALVES

*Custom-engineered for reliable performance*

*The compressor valve that revolutionized the industry — continually enhanced for durability and efficiency*

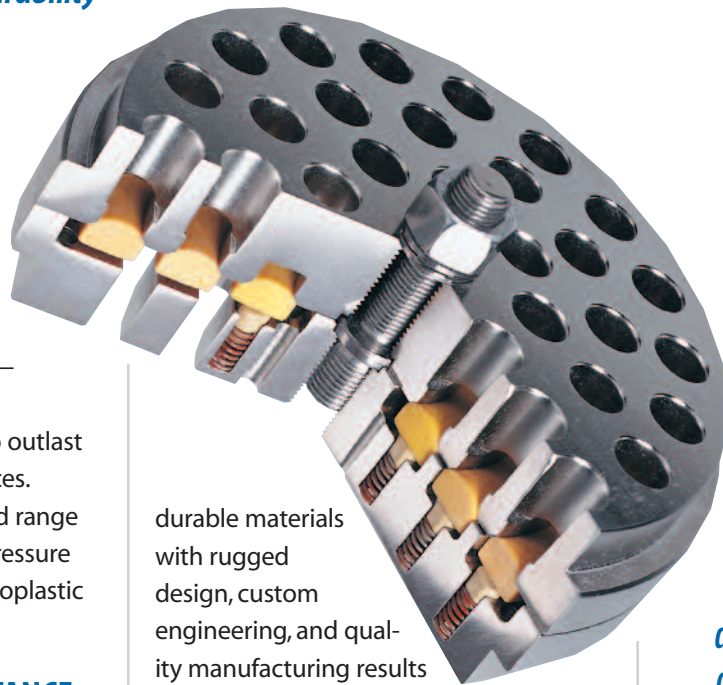
## ROBUST DESIGN

With over 35 years of success, the original Manley valve remains the world standard for reliability and performance. The distinctive Manley valve design — featuring radiused thermoplastic elements — gives it the ability to outlast other valves in demanding services. Manley valves are used in a broad range of applications, including high-pressure services that conventional thermoplastic ring valves cannot withstand.

## SUPERIOR DAMAGE RESISTANCE

Manley valve elements feature robust geometry for longer service life. Their radiused surfaces deflect debris to minimize the effects of impacts from entrained liquids and foreign matter. Manley elements are also significantly thicker than conventional elements, providing greater structural strength.

Manley valve bodies, springs, and centerbolts are constructed from carefully selected alloys that exhibit high resistance to wear and corrosion. Combining



Manley valves are made of durable materials with rugged design, custom engineering, and quality manufacturing results in valves that deliver the longest possible run times in the most hostile operating environments.

## ENHANCED EFFICIENCY

The Manley design features a highly streamlined flow path through the valve. Improved aerodynamics lowers pressure drop, dramatically reducing compressor power consumption.



Conventional valve



Manley valve

*Radiused elements deflect foreign matter and improve gas flow*

## ADVANTAGES

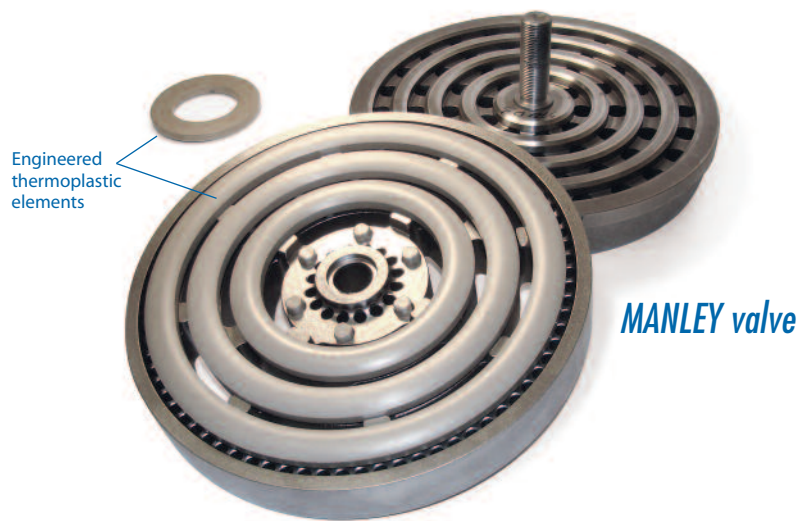
- ▶ EXTREME DURABILITY IN CHALLENGING APPLICATIONS
- ▶ CUSTOM ENGINEERING FOR OPTIMAL PERFORMANCE
- ▶ AERODYNAMIC FLOW REDUCES POWER CONSUMPTION
- ▶ BROAD APPLICATION RANGE
- ▶ COMPATIBLE WITH FINGER AND PLUG UNLOADERS
- ▶ GENUINE MANLEY VALVE REPLACEMENT PARTS ASSURE PEAK PERFORMANCE

## ENGINEERED WITH EXPERIENCE

The Manley valve is frequently imitated, but never equaled in performance. The difference is the result of superior manufacturing and custom engineering. Manley valves are produced according to rigorous quality standards in ISO-9001:2000-certified facilities. Every aspect of manufacturing has been continuously refined, including the use of thermoplastic internal components that are injection-molded in-house.

Cook Compression customizes valves more extensively than any other manufacturer. Using computer-simulated dynamics and industry-leading experience with radiused- element technology, Cook Compression engineers each valve to maximize flow area, optimize performance, and incorporate the most durable thermoplastic internals and metal alloy bodies.

This level of customization delivers dramatic improvements in efficiency and reliability — especially in applications with dirty gases, varying gas composition, fluctuating operating conditions, or other challenging variables. Custom-engineering is also why Manley valves have provided superior performance in hydrogen service for over 35 years.



## OPERATIONAL FEATURES

- **Extended run times.** Advanced design, rugged materials, and extensive customization provide maximum compressor availability.
- **Durability in harsh applications.** Thick, radiused thermoplastic elements withstand foreign matter in the gas stream.
- **Aerodynamic flow.** Radiused discs streamline flow and reduce power consumption.
- **Unloader compatibility.** Can be used with plug or finger unloaders for greater operating flexibility.

## A GENUINE SOLUTION

No other manufacturer can offer the expertise gained from over three decades of continuous research, application and worldwide technical support. Simply put, Manley valves are the most technically advanced, thoroughly proven solutions in the industry.

To discover how Manley valves will reduce life cycle costs in your compressors, contact your Cook Compression representative.



*One Name, a World of Solutions*

**CookCompression.com**

Compressor Valves | Capacity Control | Valve Restraining Systems | Rod Rings | Packing Cases | Piston Rings | Rider Rings  
Pistons | Rods | Cylinder Liners | Compressor and Engine Repair Services | Diagnostics and Analysis Services | Online Monitoring  
and Response Systems | Lubrication Systems and Services | Control and Automation | Engineering and Technical Support