



Know-how in development – Experience in manufacture

Reed valves for refrigeration, air-conditioning, air and air brake compressors.



Maximum operating reliability, long service-life and an almost completely wear-free operation

In numerous stationary and mobile applications worldwide, HOERBIGER reed valves have proven that heavy commercial vehicles can be brought to a halt safely, coolant can stay fresh every time, compressed air is always available when you need it and air-conditioning is produced in an environmentally-friendly way



The reed valve is the heart of the compressor. During its lifetime it has to open and close over 2 billion times in a failure and maintenance-free way.



Based on decades of experience and state-of-the-art valve designs, HOERBIGER Reed valves guarantee:

- the highest levels of reliability and
- optimal efficiency

for refrigeration, air-conditioning, air and air brake compressors.

It is not without good reason that HOERBIGER is the world's number 1 for reed valves and valve systems.



**We set the standards for
a reliable and efficient
compressor operation**



Picture: Daimler



Innovation and system solution know-how

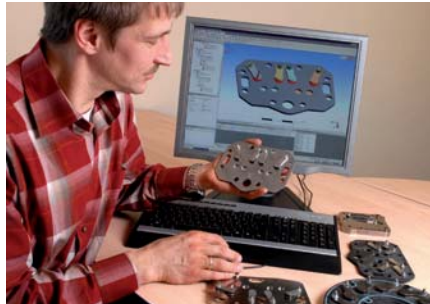
Renowned compressor manufacturers have chosen HOERBIGER as their system partner to take advantage of our specialists' broad range of experience and eye for potential to get involved in joint developments.

We advise our customers on-site, develop mutual system solutions and produce prototypes under close-to-production conditions.

HOERBIGER employs its own programs for flow and temperature simulation and the latest 3D-CAM and FEM software even during the development phase.

Even at this early stage, individual designs are tested in terms of optimal production processes and the cost-effectiveness of later series production.

Close-to-application test runs and test-bed trials as well as special simulation software enable the quick realization of results required by our customers.



Tomorrow's success

Highly-sophisticated production know-how and expertise in system solutions plus synergy effects within HOERBIGER technology centers often lead to revolutionary new directions in technology. We introduce these approaches when communicating with customers and partners. The purpose of such communication to apply our know-how to develop solutions for our customers, even in new product areas and markets, for example:

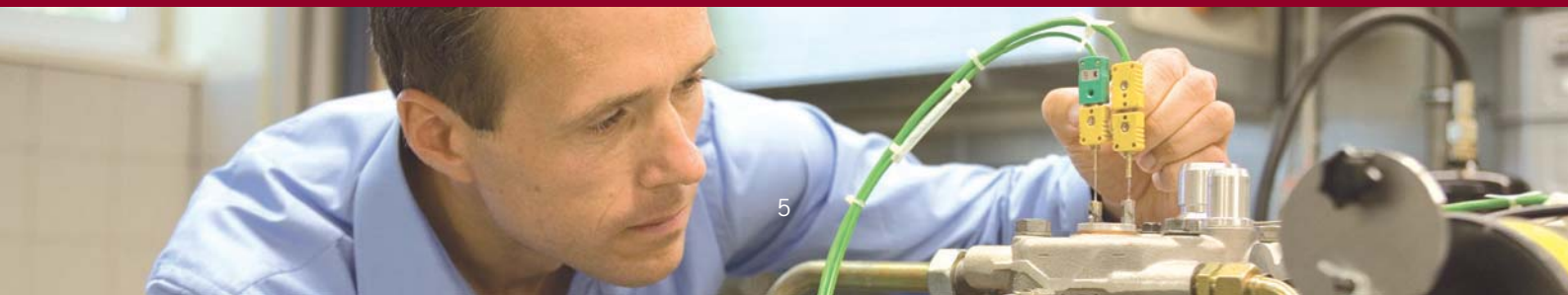
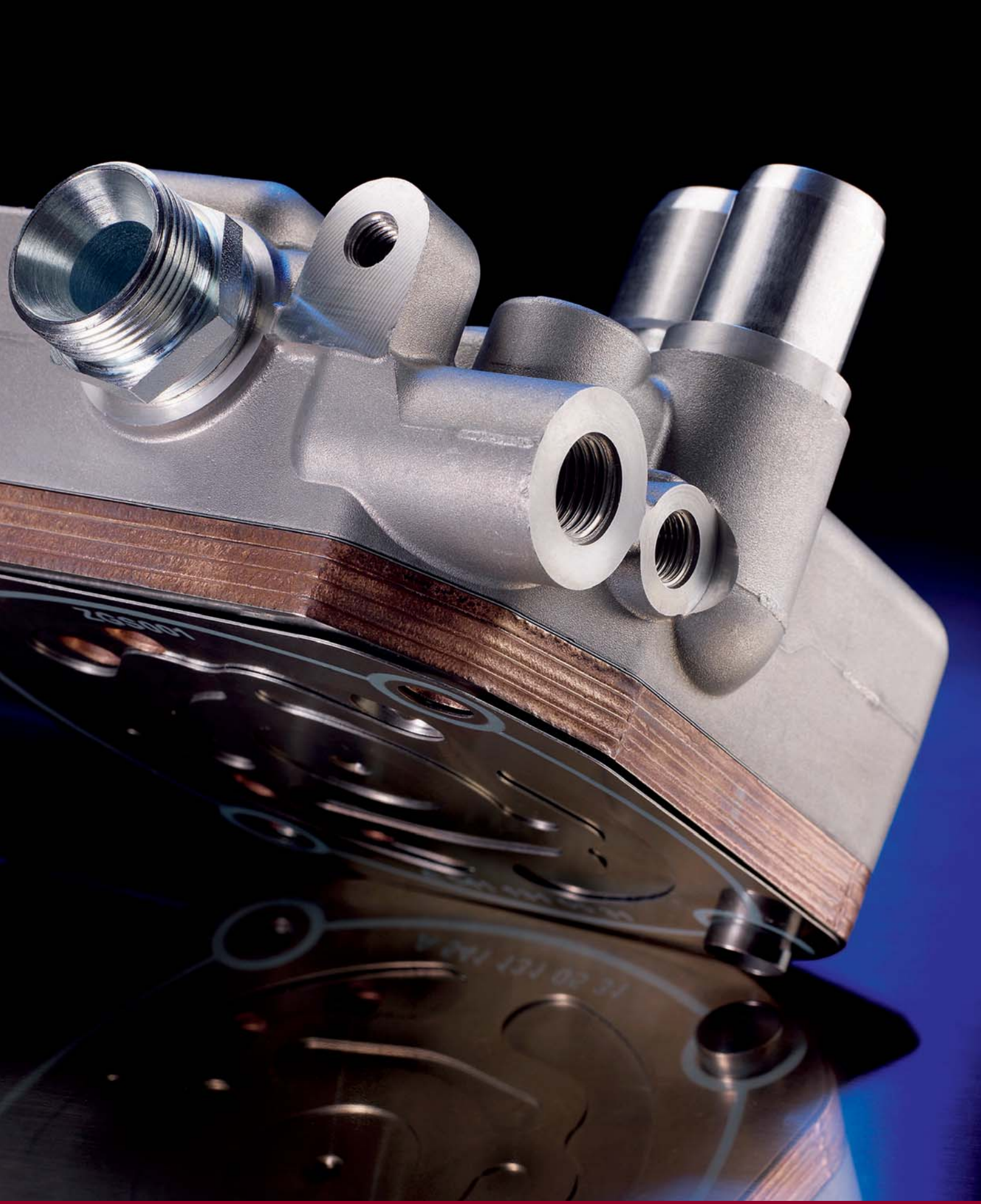
- Control Discs for axial piston pumps
- Air inlet valves for modern two-stroke engines
- Restrictors for shock absorbers.

Always one eye on the environment

Energy is getting scarcer and scarcer and thus more and more valuable. The focus at HOERBIGER is therefore on efficient compressor operation and the deployment of environmentally-friendly technologies.

Its innovative valve solutions enable HOERBIGER to offer pioneering concepts, such as:

- Oil-free compressors
- Use of alternative refrigerants (CO₂)



Process reliability, flexibility and precision in production

The extremely stringent requirements on quality, reliability and service life on HOERBIGER products demand the highest levels of precision in manufacturing and logistics. Modern machines, a remarkably high level of in-house production as well as an integrated quality management system ensure process reliability and flexibility.



A valve leaves the production line at HOERBIGER every seven seconds. Not long after it begins its long life of reliable service in a customer's compressor.

This is only possible thanks to our highly-qualified employees and the high degree of automation. Only through 100% reliable processes in production, assembly and logistics workflows is it possible to meet consistently high demands on quality demanded by our customers.

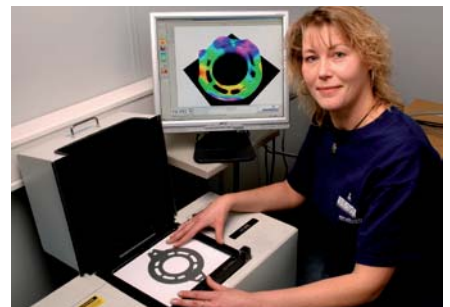
Considering the high series production to a precise hourly schedule using KANBAN calls, there is a high awareness of quality demanded and lived every day at HOERBIGER.



Highest levels of quality and efficient production are based on in-house tool making.

Customised punching and assembly tools, machining facilities and fully-automated assembly stations are designed and manufactured in close collaboration with product development.

The unique core competence of HOERBIGER tool construction makes it a sought-after partner and supplier for external customers coming from a wide variety of industries.



HOERBIGER – your partner for quality.

Quality is not possible without qualifications.

HOERBIGER's worldwide standard of quality is backed by ongoing staff training at in-house training centres and production sites.

We rely on a carefully implemented quality planning to ensure continuous process improvement (APQP, PPAP, PPF, FMEA), with a single aim in mind: Zero-defect quality.



HOERBIGER Reed valves: Targeted diversity for demanding applications.

HOERBIGER reed valves are developed in close partnership with our customers with practical use in mind. After all, customer focus and customer satisfaction are at the core of our quality philosophy. This is why HOERBIGER reed valves guarantee highest operating reliability, long service lives and an almost completely wear-free operation.



Reed valves for the supply of compressed air in motor vehicles brakes and air suspension systems.

Used in compressors in commercial vehicles and trains/trams. With or without water-cooling according to the application.

HOERBIGER reed valves are available worldwide. Wherever you are you will find us too.

We deliver our technology across the globe via our modular product family. This allows us to respond quickly to your local requirements.



Reed valves for air-conditioning and cooling:

Used in both open and semi-hermetic refrigeration and air-conditioning compressors for mobile and stationary use.

It doesn't matter if you are a global or local customer for HOERBIGER: You can always rely on our worldwide key account management. Our advisors are on hand with their knowledge and efficiency both locally and from our HQ.



Reed valves for industrial compressed air and technical gases:

Used in industrial and small workshop compressors in a wide variety of industries.

Our global production sites allow us to advise and supply you with products worldwide flexibly and on competitive terms with a consistently high level of quality.

Air brakes

Hydraulics

Air suspension

Air-conditioning

Refrigeration systems





Fresh produce

Coolants

Air pressure

Vacuum

Engines



HOERBIGER – The technology group.

The HOERBIGER Group is active throughout the world as a leading player in the fields of compression technology, automation technology and drive technology. The focus of our business activities include key components and services for reciprocating compressors, pneumatic- and hydraulic systems for vehicles and machine tools, as well as components and systems for shift and clutch operations in vehicle drivelines of all kinds. Three strategic business units ensure a sound group portfolio with a focus on stability over the long-term.

The Group

HOERBIGER has more than 100 production and service sites in over 40 countries. Innovative employees who think as entrepreneurs and focus on customers are our capital. Their qualifications and commitment are the basis for outstanding performance and top-notch products.

The major reasons for our success are our employee-oriented values:

- Pioneering spirit
- Courage
- Fairness
- Closeness

Taken in combination, these values give the HOERBIGER Group its unmistakable image.

Ambitious goals and a clear management style that both fosters and drives progress at HOERBIGER. Fairness, security and mutual trust are the cornerstones of our corporate culture.

Our strength is innovation in attractive niche markets. Our research and development projects are aligned to customers' needs and requirements. Together and in close cooperation with our customers, today we are working on the answers to tomorrow's questions.

The HOERBIGER Group's development portfolio is based on the consistent application of our technical know-how and physical methods; it is fueled by

our striving to achieve a full understanding of how things work. We apply our know-how to develop new solutions while setting standards and driving technical advances.

The result is innovation which sets trends – to the benefit of our customers. Recent examples include systems to reduce energy usage in compressors and cut hazardous emissions from large engines. We are making a contribution to increasing driving comfort and ease of operation while reducing costs by supplying the automotive industry with modular system solutions for transmissions, pneumatic seat adjustment and hydraulic boot lid adjustment systems.

HOERBIGER – because performance counts

Compression Technology



The strategic business unit of Compression Technology is the worldwide leader in the design and manufacture

of key components for compressors, diesel and gas engines. The successful development of this strategic business unit began with a steel plate valve for reciprocating compressors.

Today the product portfolio consists of valves, rings and packings, control systems as well as diagnostic and monitoring systems for reciprocating compressors, reed valves for air conditioning, refrigeration and brake compressors,

components for rotary compressors and technologies for explosion protection and emission reduction in diesel and gas engines.

A top-class service network offers HOERBIGER Compression Technology customers product, application and engineering know-how as well as innovative service models for individual requirements – worldwide.

Automation Technology



The strategic business division of Automation Technology is the leading supplier in demanding niche markets in automotive technology as well as in machinery and plant construction. Three business divisions – Automotive Comfort Systems, Industrial Pneumatics

and Application Systems – occupy attractive technological niches in promising future market segments which feature innovative products.

The business division of Automotive Comfort Systems is focussed on comfort solutions for passenger cars and commercial vehicles: from pneumatic multi-contour seats to hydraulic drives for convertible tops, tailgates and boot lids.

The business division of Industrial Pneumatics combines its pioneering product – the rodless cylinder – with

a technically attractive range of maintenance equipment, valves and accessories, an excellent delivery service and the development of customized system solutions.

The business division of Application Systems is adept in industrial hydraulic solutions: this involves precise movement of great forces. This business division also works on special test and diagnostic systems, develops corresponding software as well as piezo technology for switching and control tasks under difficult ambient conditions.

Drive Technology



The strategic business unit of Drive Technology is a global partner of the automotive industry. HOERBIGER supplies components and systems for

transmissions in passenger cars, trucks and offroad vehicles. This strategic business unit is the worldwide market leader in complete synchronizers. Its product portfolio also includes plates and clutches, electro-hydraulic control systems for drivelines as well as system solutions for transmissions, brakes and axles.

Materials for wet friction linings and components for double-clutch transmissions are among the developments which ensure the long-term position

of Drive Technology as the innovation leader in transmission components.

The HOERBIGER Group, with its dedicated employees, know-how and international alignment of the strategic business units, is in an excellent position to anticipate the needs of markets and customers. This means we can develop and provide solutions and innovations faster than others.

HOERBIGER – Globally local

HOERBIGER relies on its strategic focus, on development know-how, production know-how, certified quality management and logistics, as well as its global sales network.

This means its innovative solutions are available worldwide and are founded on “Made in Germany” know-how – at a consistently high level of quality whether you are a local or global customer.



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