CAPITAL PARTS
HIGHEST QUALITY FOR
LOWEST LIFE CYCLE COSTS

Compressors for a Lifetime®
AS A LEADING OEM WE ARE YOUR RELIABLE SOURCE FOR HIGH QUALITY CAPITAL PARTS FOR ANY RECIPROCATING COMPRESSOR.

RELIABLE SOLUTIONS FOR HIGHEST AVAILABILITY
CAPITAL PARTS FROM A LEADING OEM

BURCKHARDT COMPRESSION

Burckhardt Compression is one of the market leaders in the field of reciprocating compressors. As the only manufacturer that offers a complete range of reciprocating compressor technologies, we are ideally suited to support you in every situation.

With more than 170 years of experience, we are committed to producing continuous innovative solutions for highest reliability and lowest life cycle costs for new or improved compressors.

YOUR ADVANTAGE: MOST RELIABLE CAPITAL PARTS

Reliable performance of capital parts is crucial for the trouble-free operation of your compressor systems.

Manufacturing, replacement and repair of these parts require comprehensive know-how of every aspect of a compressor’s technological and operational correlations. With thorough analysis and competent in-house engineering capabilities we support you in all circumstances, no matter if with troublesome parts or parts from an OEM that no longer exist.

To ensure fast replacement and dependable compressor availability, our proven approach incorporates:
– Comprehensive requirements evaluation
– (On-site) situation analysis
– Experienced engineering services
– In-house manufacturing of all parts at highest quality standards
– Fast track production processes
– Professional installation by our highly skilled compressor specialists
– Strategic spare parts management

Burckhardt Compression provides a fully documented and certified service for its customers. We are experts at meeting demanding design guidelines such as:
– API 618
– NACE
– Individual customer specifications
SERVING EVERY APPLICATION WITH HIGHEST QUALITY STANDARDS

APPLICATIONS

- Upstream oil & gas
- Gas transport & storage
- Refinery
- Petrochemical/Chemical industry
- Industrial gases
- Food & beverage industry
- Wood & charcoal industry
- Mining industry
- Power stations
- Hydro-electric power plants
- Nuclear power plants

GASES

- Hydrogen, nitrogen, argon, helium
- Hydrocarbons, ethylene, ethylene oxides
- Chlorine, ammonia
- Air, oxygen
- Nitrous oxides, carbon dioxide, carbon monoxide, sulfur dioxide
- Hydrogen sulphide, hydrogen chloride, sulfur hexafluorides, vinyl chlorides
- Gas mixtures and flare gases

COMPRESSIONS

- Lubricated and non-lubricated
- Cooled and non-cooled
- Horizontal, balanced opposed, vertical in-line, V-type, W-type
- Labyrinth piston compressors
- Integral compressor design

MORE THAN SUITABLE PARTS FOR COMPRESSORS OF ANY KIND OR BRAND

With our broad in-house expertise we are ideally suited to provide integrated solutions for retrofit, reengineered or repaired capital parts – designed to maximize the reliability and availability of your equipment.

The necessary know-how and experience to design and manufacture perfect solutions for the replacement of supposedly ordinary capital parts is often underestimated. In most cases it is not only the individual component that needs to be replaced or repaired. Often the interaction with other components, the process parameters, the environment of the parts and even auxiliary equipment must also be inspected and subsequently reengineered.

In close collaboration with our customers, we define the necessary scope in order to meet the requirements placed on the performance of the entire compressor.

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OUR OFFERING

- Repair of damaged components
- Upgrade/optimization/modification
- Retrofit/reverse engineering
- Reconditioning of worn parts
- 1:1 replacement of parts
- Replace parts of inexistent OEM

OUR IN-HOUSE EXPERTISE

- Tribology expertise
- Material analysis expertise
- Know-how
- Lubrication technology
- High-precision manufacturing
- Extensive parts assembly
- Full quality assurance
CAPITAL PARTS OVERVIEW
PROFOUND TECHNOLOGICAL KNOW-HOW AND EXPERIENCE

PROCESS GAS COMPRESSORS API 618

- CRANKSHAFT
- COMPRESSOR FRAME
- DISTANCE PIECE
- PISTON ROD
- CROSSHEAD & PIN, PISTON ROD COUPLING
- SLIDE BEARINGS
- CONNECTION ROD
- CONNECTION TECHNOLOGIES
- CYLINDER
- CYLINDER LINER

LABYRINTH PISTON COMPRESSORS

- CYLINDER
- PISTON
- CONNECTION TECHNOLOGIES
- DISTANCE PIECE
- GUIDE BEARINGS
- CROSSHEAD & PIN, PISTON ROD COUPLING
- SLIDE BEARINGS
- CRANKSHAFT
- CONNECTING ROD
OEM CAPABILITIES
FOR EVERY RECIPROCATING COMPRESSOR

REQUIREMENTS & SITUATION ANALYSIS
- Process Compressor condition change
- Damaged parts/failure
- Worn out parts
- Troublesome parts
- Improved design to replacement parts with excessive wear
- Precarious or unsafe operating condition
- Maintenance or spare parts logistic scheduling

EVALUATION
- Root cause analysis/failure analysis
- Risk analysis
- Condition analysis
- Material analysis
- Feasibility studies
- FEA studies
- Non-destructive testing (NDT)
- Stock recommendations

ENGINEERING
- On-site, and/or in-house measurements of components
- Reverse engineering
- Retrofit
- Recalculation and dimensioning
- Engineering for repair procedures
- Material selection and sizing

MANUFACTURING
- Highest quality assurance
- In-house precision manufacturing of capital parts
- Fast track production upon request
- Reproduction (1:1 replacement incl. integration of latest quality standards)
- OEM guarantee

FIELD ACTIVITIES
- Extensive service network with our specialized field service engineers/troubleshooters
- Dismantling/Reassembly of parts
- Large parts stock
- Spare parts frame agreements
- Worldwide distribution and service center network
- Burckhardt e-shop spare parts identification and ordering system

INTERACTION WITH CUSTOMER REGARDING SPECIFICATIONS AND SCOPE OF WORK
INCORPORATING FULL DOCUMENTATION OF REQUIRED GUIDELINES AND STANDARDS (API 618/NACE ETC.) INC. CERTIFICATION

FOR EVERY RECIPROCATING COMPRESSOR
“After an immediate temporary solution, Burckhardt Compression started a thorough analysis and offered us a technically improved and sustainable solution. The result was an incredible 50% increase in MTBO.”

Technical Service Manager, United Kingdom