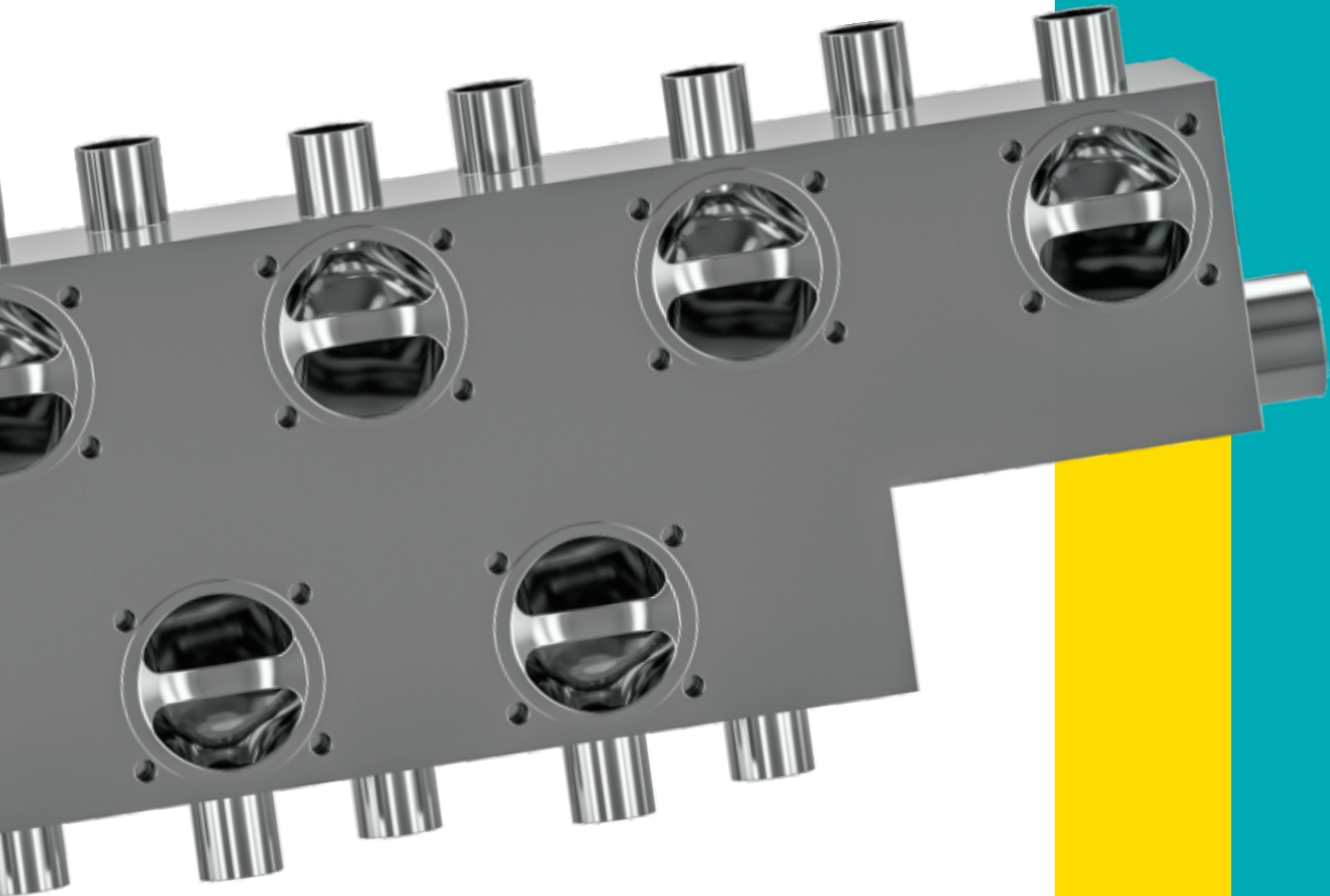



LEISUNIG

SteriPure Diaphragm Valves



Defined as



Performance power
service capacity benefit
result achievement work
effort accomplishment merit

Leistung is a forward-looking company, set up in 1993. Spearheaded by Mr. Atish Parikh, the Chairman of company, it has scaled new heights day by day with the combined force of innovation, adaption of new technology & collective skills of strong committed team. Leistung reaches various segments like food, pharma, beverages, cosmetics, bioscience, water treatment, dairy, healthcare & chemical. Leistung's product range fall broadly in four categories namely:

- Filtration systems
- Diaphragm valves
- Cryogenic valves
- Contract manufacturing for fortune 500 companies



The unshakeable desire to deliver quality products to customers has made its products acceptable in both Indian as well as international market.

Leistung believes that customer satisfaction is the driving force for progress. Such strong belief has enabled Leistung to retain its customer base. Adhering to international standards, with no laxity in any sphere, it is a successfully favoured supplier for its range of products. To consolidate this and gain international credibility, Leistung has obtained various quality certificates namely ISO 9001:2015, U stamp, Um stamp, R stamp, CE marking, US FDA, USP Class VI, REACH, RoHS, ATEX, TPED, R110 and many more.

Leistung has in house laboratory for testing Cv/Kv value, drainability, Ra value of valve as well as autoclave chamber and testing of steam sterilization cycle. The data of which will be provided on request.

Leistung also has fully automatic system for inhouse PTFE diaphragm manufacturing.

Such a strong standing & success cannot be achieved without Leistung's commitment to customer, quality & excellence along with maintaining highest standards of ethics & societal responsibilities.

Leistung's key strategy has been driven by innovation in every sphere of activity, building a robust product portfolio, exploring new markets, expanding the network & continual efforts towards brand building activities. The product range offered by Leistung is so widespread is that it seems to be endless.

Partner with Leistung and get the feel of excellence.

Certifications

LEISTUNG



ASME Authorization for ASME stamping with 'U' designator - U Stamp



ASME Authorization for ASME stamping with 'UM' designator - UM Stamp



National Board of Boilers & Pressure Vessel Inspector Certified - 'R' Stamp



National Board of Boilers & Pressure Vessel Inspector Certified - 'NB' Stamp



ISO 9001:2015 TUV Certified (Germany)



'CE' Certification for Filter Housing & Process/Storage Vessel



'CE' Certification for Diaphragm Valves



'CE' Certification for Plate & Frame Type Filter Press



'CE' Certification for Auto Cleaning Filter Housing-Brush Type



'CE' Certification for Auto Cleaning Filter Housing-Disc Type



'CE' Certification for Cryogenic Pressure Relief Valve



TPED Certification for Cryogenic Valves




ECE R110 for Cryogenic Valves





ATEX Certification for Filter Housing, Filter Press & Angle seat Valve


 Food & Drugs Administration Compliance

 REACH 1907/2003/EC (Registration, Evaluation, Authorisation & Restriction of Chemicals) Compliance


 ROHS 2011/65/EC (Restriction of the use of Certain hazardous substance) Compliance


 United States Pharmacopeia Class VI Compliance

 German Food, Feed and Consumer Goods Code (Lebensmittel-, Bedarfsgegenstände- und Futtermittelgesetzbuch) Compliance


 ISO 10993 Bio-compatibility Compliance

 Compliance to EC Regulation 1935/2004 on Materials and Articles intended to come into contact with Food

 Compliance to EU Regulation 10/2011 on Plastic Materials and articles intended to come into contact with Food

 ISO 1431-1 Compliance on Resistance to Ozone Cracking

 No Use Organic Compounds & Phthalates

 No Use Magnesium Compounds & Phthalates

 Sanitary Couplings & Fittings

SteriPure Diaphragm Valves

LEISTUNG

Aseptic Diaphragm valves are prerequisites for Ultraclean and Aseptic processes. The aseptic diaphragm valve is one of the most important control components in modern biopharmaceutical process systems. Aseptic valves are used to control processes and restrict contamination from environmental sources. As product and process safety has the highest priority within these applications, our SteriPure diaphragm valves are equipped with a hermetic sealing element to avoid any access of microorganisms into a sterile process.

Handle design gives a better grip

Enables easy identification of opening/closing of valve

Handle made of engineering plastic with glass filled for better durability and directly autoclavable

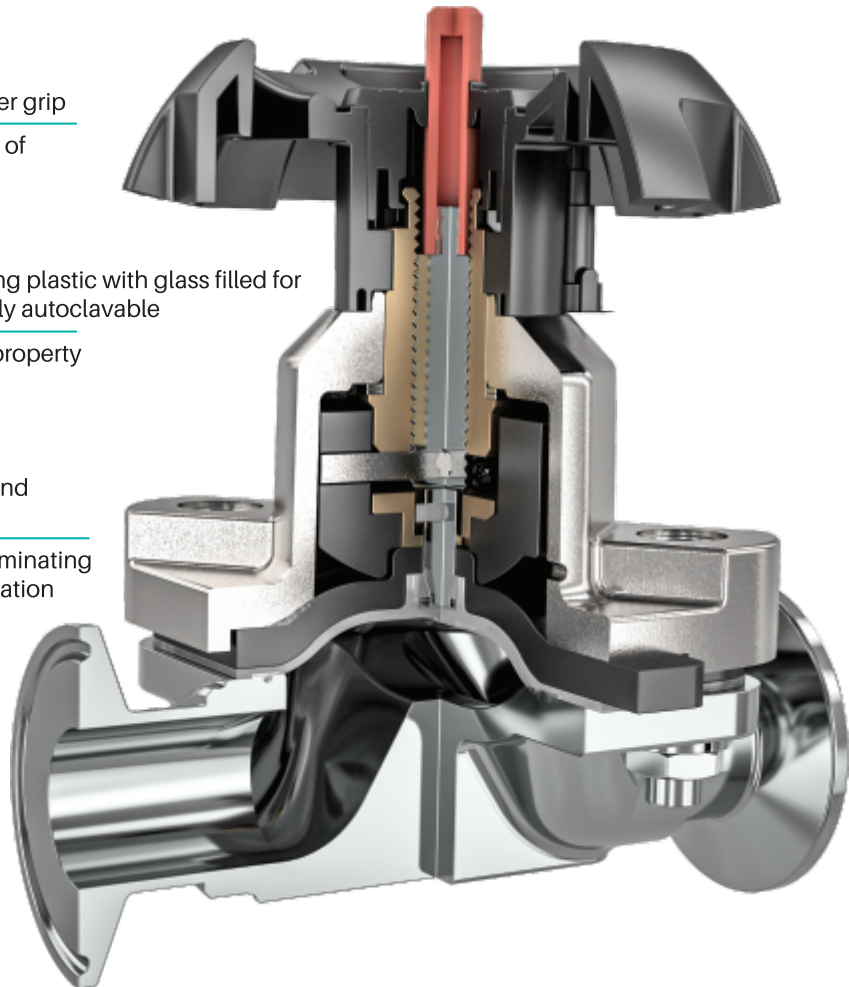
Brass bush for antigalling property

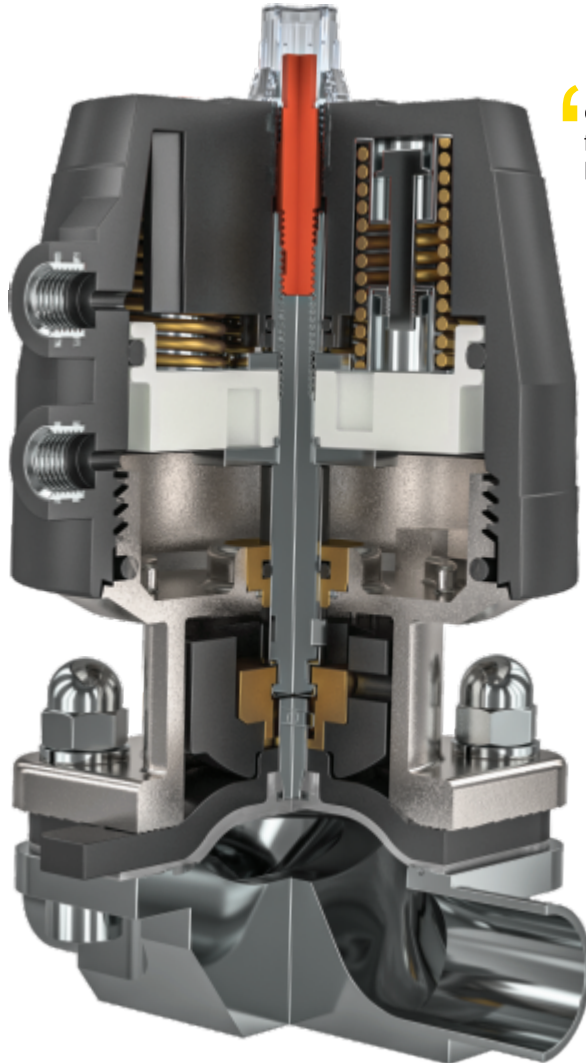
Available with both weld or clamp end as per ASME BPE guideline

Withstands pressure upto 15 bar eliminating the chances of leakage or contamination

Std material for all bodies is SS certified to 316L (ASTM A182/ ASME SA -182 or ASTM A 240 ASME SA -240) with controlled Sulphur option available

Diaphragms compliant with international certification and traceability





Compact design provides space for installation and enables to build compact system

Light weight actuator reduced the need of valve and piping support

Cylinder made of engineering plastic with glass filled to enhance durability and directly autoclavable

Available in spring close, spring open and double acting mode of operation

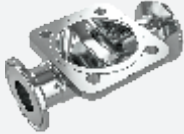
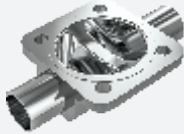

Offers direct connection to accessories including switches and positioners to eliminate inaccuracy

SS compressor, base and fasteners and brass insert for pneumatic port connection enhances functionality

Operating temperature - 10°C to + 100°C and autoclavable upto + 150°C

Valve body options

To fulfill the application specific demand, Leistung offers valve bodies in cast, forged a block type. Bodies are available with weld and clamp ends to meet global tube and pipe specifications.

Valve Bodies	 Cast body	 Forged body	 Block body
Size	DN 8 to DN 100	DN 8 to DN 100	DN 8 to DN 100
MOC	CF3M (316L)	1.4435/ 316L	1.4435 /316L
Sulphur	0.005% to 0.017%	0.005% to 0.017%	0.005% to 0.017%
Internal Finish	Less than 0.38 Ra	Less than 0.38 Ra	Less than 0.38 Ra
Connections	Clamp and Butt weld	Clamp and Butt weld	Clamp and Butt weld
Standard dimensions	As per ASME BPE, DIN and ISO	As per ASME BPE, DIN and ISO	As per ASME BPE, DIN and ISO

To check whether correct sizes of valves are mounted in a system, it is mandatory to know about the flow rate of fluid through valves under particular conditions. Hence Kv value needs to be calculated which is also known as flow co-efficient.

KVS (KV100) value is defined as the flow in cubic meters per hour of water, at a pressure drop of 1 bar across the valve, when fully open, at a temperature ranging between 5°C to 30°C.

Cv value is measured in US gallons per minute, at a differential pressure of Δp of 1 PSI with water.

$$1Cv = 1.17 \times Kv$$

$$1Kv = 0.86 \times Cv$$

Valve Size	Size DN	ASME - BPE Kv (m ³ /h)
0.5 Inch	15	1.71
0.75 Inch	20	4.42
1 Inch	25	11.50
1.5 Inch	40	28.00
2 Inch Std.	50	47.30
2.5 Inch Eco.	65	51.7
3 Inch Std.	80	91.60
4 Inch	100	188.00



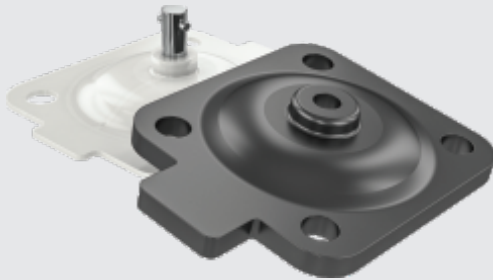
Diaphragm

PTFE Diaphragm

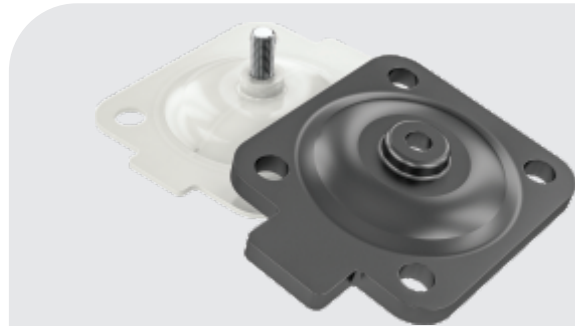
Leistung develops, compounds and manufactures all single piece elastomer and two-piece leaf style PTFE faced diaphragm inhouse. Leistung has numerous certifications pertaining to diaphragms like US FDA compliance, REACH, ROHS, tested as per USP Class VI and may more.

PTFE Diaphragm:

- 100% modified PTFE product contact face which is inert and unaffected by media - common requirement of bio process applications
- Industry conforming low levels of extractable and leachable
- EPDM backing
- Suitable for media temperature - 10°C to + 90°C
- Sterilization temperature briefly upto + 150° C
- Resistance to compression set, mechanical strength and thermal resistance properties
- PTFE type diaphragm utilize bayonet attachment to compressor to reduce point loading, improve sealing performance and facilitate installation
- Improved performance under aggressive steam sterilization and pure water-based media



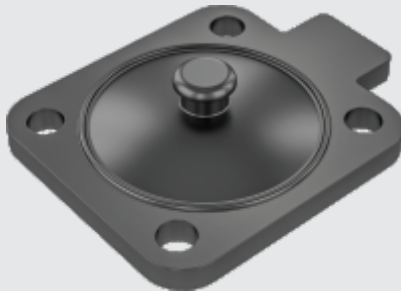
PTFE Pin type diaphragm



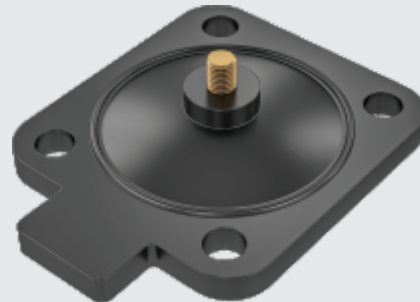
PTFE Thread type diaphragm

EPDM Diaphragm

- Button type, screw type or threaded pin type options available
- Sealing bead for reliable sealing on valve weir
- Additional sealing bead for optimum external sealing
- Suitable for media temperature - 10°C to + 75°C
- Sterilization temperature briefly upto + 130° C
- Sustains high temperature and steam for pharmaceutical and biotechnological applications as well as for the food and beverage industries
- 100% traceability of the diaphragm
- Reduced cost versus PTFE diaphragm



EPDM Button type diaphragm



EPDM Thread type diaphragm

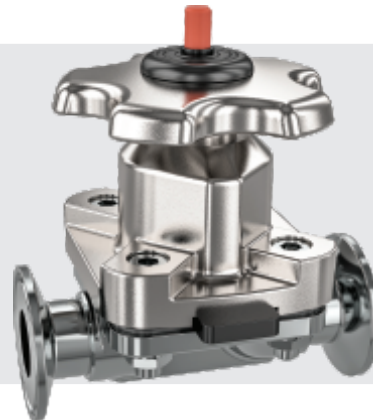
SteriPure Diaphragm Valves

LEISTUNG

Two - way Diaphragm valve

Manually operated casting & forged valve

- Available from DN 8 to DN 100
- Cavity free and self-draining
- Cast and forged bodies available
- Forged / bar stock body made from SS 316L block material - no weld components
- Hermetical separation of fluids from the operating mechanism by diaphragm
- Full traceability as per EN 10204 3.1 and ASME BPE
- Internal surface finish available with less than 0.40 Ra



Two - way Diaphragm valve

Pneumatically operating casting & forged valve

- Available from DN 8 to DN 100
- Normally close, normally open and double acting options available
- Cavity free and self-draining
- Stroke limiter, electric position indicator and position and process controller accessories available
- Hermetical separation of fluids from the operating mechanism by diaphragm
- Fully Autoclavable
- Full traceability as per EN 10204 3.1 and ASME BPE
- Internal surface finish available with less than 0.40 Ra



SteriPure T valve bodies

LEISTUNG

SteriPure T valves are machined from single block either in 316L or 1.4435 avoiding weld seams.

- Compact design
- Zero dead leg
- Internal surface finish available with less than 0.40 Ra
- Clamps and flanges available on request
- Available in manual, pneumatic and other control options
- No internal fabrication weld for forged / bar stock body
- Option of sampling / injection point available



ZDL valves offers a low-cost alternative to L pattern valves.

- Cast body available
- Zero dead leg
- Available sizes from DN 15 to DN 80
- Various internal surface finish available
- Internal surface finish of less than 0.4 Ra
- Available in manual, pneumatic and other control options

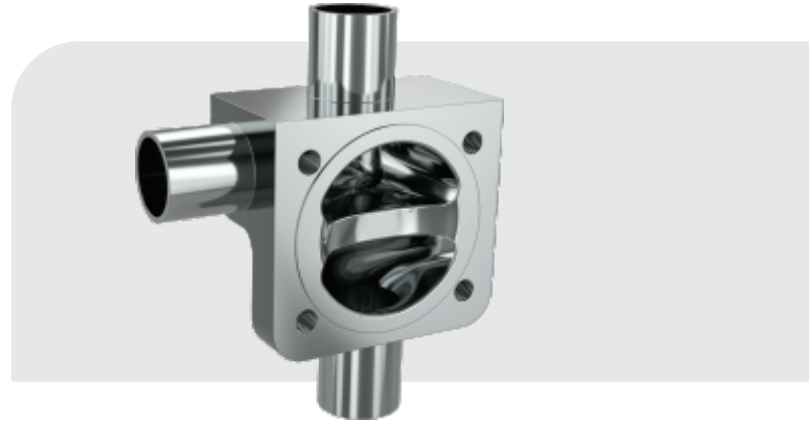


SteriPure L valve bodies

LEISTUNG

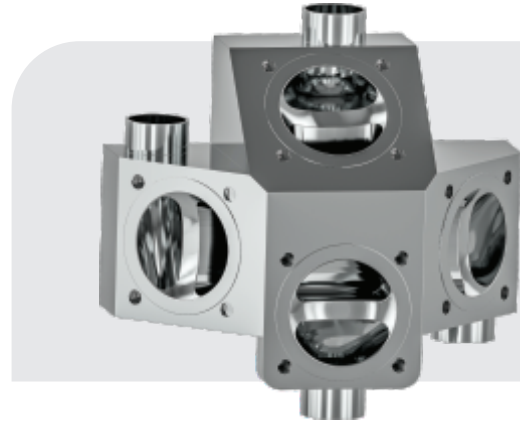
SteriPure L valves are machined from single block either in 316L or 1.4435 avoiding weld seams.

- Compact design
- Zero dead leg
- Internal surface finish available with less than 0.40 Ra
- Clamps and flanges available on request
- Available in manual, pneumatic and other control options
- No internal fabrication weld for forged / bar stock body
- Option of sampling / injection point available



SteriPure Multiport valve bodies

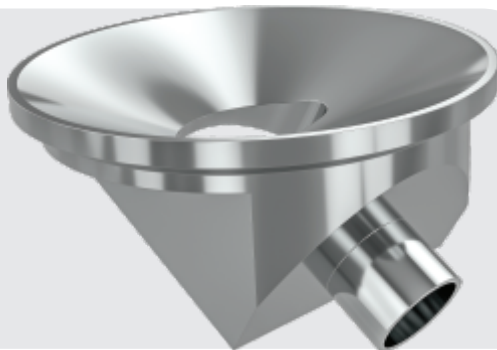
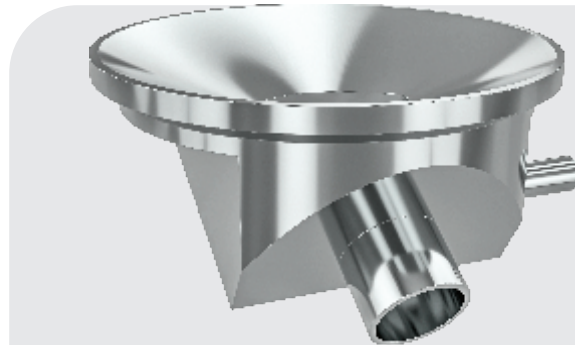
- Optimized drainability
- Reduced deadleg
- Improved system performance
- Fewer welds
- Compact design
- Reduced complex pipework
- Machined from block
- Reduced and simple validation
- Customized as per requirement
- Much more product reliability



SteriPure Tank bottom valve bodies

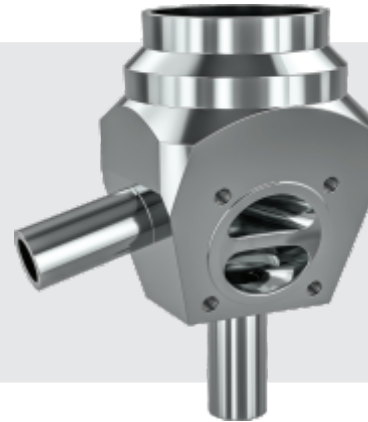
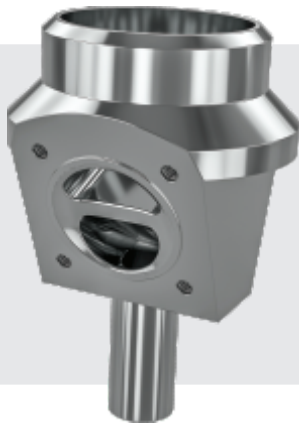
LEISTUNG

- Compact design for space restricted applications
- Simplified welding with provision of welding neck
- Optimized flow geometry
- Valve body materials is 316L or 1.4435
- Available with manual as well as pneumatic assembly
- CIP/SIP capable and crevice free
- Minimal deadleg and self-draining capabilities
- Various internal surface finish available
- Pipe connections as butt weld and clamp connections are available



SteriPure Flush mounted Sampling valve bodies

- Made from SS 316L block
- No welded components
- Zero dead leg
- Integrated port can be used as filling inlet for those who prefer to cap off the outlet and keep the valve filled with sterilizing solution when not in use for sampling
- Two manual activation options are available - PA or stainless-steel handle for on / off
- Fully autoclavable
- Available with both welding or sanitary clamp type tank connection options
- Both mechanical and electropolish surface options available with less than 0.40 Ra



Angle Seat Valve

LEISTUNG

- Compact and robust design
- Sizes available from DN 15 to DN 65
- Self-adjusting packing gland provides high sealing integrity
- Extensive range of accessories available
- Mountable in any position
- Various types of body connections available - Flange, threaded and butt weld
- Normally close, normally open and double acting modes of operation available



Signal operated controller

Features:

- Status LEDs are integrated in a controller
- Function key for calibration
- Valve position feedback output (Potential free)
- Digital input signal available for automatic calibration
- Fail safe function in case compressed air and power supply failure (Optional)
- No air consumption in idle state
- Suitable for single acting linear actuator & double acting actuator
- Direct positioner mounting to the close/open valve actuator possible



Smart PID controller

Features:

- Status LEDs are integrated in a controller
- Function Key and LED display for easy access parameters
- Actual value and set value monitored on display
- Automatic calibration mode via function key
- Fail safe function in case compressed air and power supply failure (Optional)
- No air consumption in idle state
- Suitable for single acting linear actuator
- Direct positioner mounting to valve actuator possible
- PID controlled output
- Default parameter can load and save
- Automatically optimises the valve control during initialization
- Operational/function parameters can read & write via communication
- Diagnostics, alarm codes, monitoring



Smart Process operated PID controller

Features:

- Status LEDs are integrated in a controller
- Function key and LED display for easy access parameters.
- Actual value and set value monitored on display
- Digital input signal available for automatic calibration
- Fail safe function in case compressed air and power supply failure (Optional)
- No air consumption in idle state
- Suitable for single acting linear actuator & double acting actuator
- Direct positioner mounting to valve actuator possible
- PID & Process PID control mode available
- PID and process PID tuning parameters available
- Application macro for flow/pressure/level/steam control with process feedback sensor
- Default parameter can load and save
- Automatically optimise the valve control during initialization
- Operational/function parameters can read & write via communication.
- Diagnostics, alarm codes, monitoring



- Compact and robust design
- Multi-position handle as standard feature for valve up to DN-100
- Two-position handle as standard feature for valve starting from DN-100
- Several models of easily interchangeable manual handles and pneumatic or electric actuators
- Low pressure losses
- Body halves interchangeable with any connection type
- Connections: DIN 11850
- Traceability of components



Back Pressure Control valve

LEISTUNG

Leistung's back pressure control valve is designed to maintain a constant preset inlet pressure on the main valve. It is normally closed, direct acting, spring loaded, diaphragm type control valve. The valve requires no external power to operate.

- Cost effective modular design
- Optimized for size against maximum pressure control
- Completely adjustable pressure control range
- Diaphragm available in various elastomers
- Various internal surface finish options available



Leistung's flow diverter valve meets the highest demand of your process in terms of hygiene and safety. It combines piston within a cylinder, valve bodies, stem and connected end parts. They are available in various flow types such as F type and L/L type.

Others like T/T, L/T, T, L and T/L are available on request.

- Extremely reliable and hygienic for diverting the product flow
- Available in connection size of 1", 1 ½" and 2"
- Wetted parts are available in ASTM A 351 CF3M (SS 316L) and non-wetted parts in SS 304
- The valve stem is sealed by a special seal available in PTFE and FKM/FPM materials
- Various internal surface finish available



SteriPure Side Sampling valve bodies

LEISTUNG

These sanitary sampling valves are ideal for sample collection of high purity water, beverages and liquids. Easily attached to a liquid distribution line or a storage tank, the valve directs the outflow to a sampling container or a disposal filter monitor.

- Unique design eliminates dead spaces
- Mid-stream sample collection
- Designed for production line sampling
- CIP capable and crevice free
- Self-draining operation



Leistung BPE nozzle has a stainless-steel body with tank interface surface, a gasket, a hygienic adapter and screwed fitting for adapter attachment. BPE nozzle is designed to be used as an aseptic connection to tank or vessel. Nozzle can be directly welded to the tank at the tank interface surface. Hygienic adapter is provided to connect with the flow-line. It is available in various end connections sizes and can be butt-welded directly to the tube. The gasket seal is provided to ensure completely safe and hygienic sealing of nozzle fittings.

- Excellent aseptic design
- Fully machined from SS 316L
- Unique screwed fittings
- Various internal surface finish available



Spray Ball

LEISTUNG

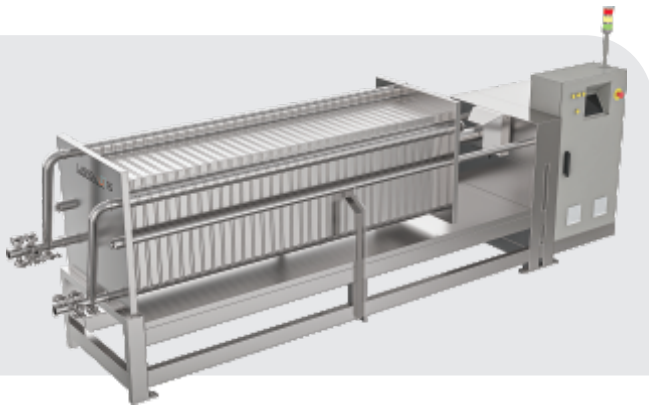
Leistung's rotary spray ball uses cleaning media to provide coverage and impact. The device represents an effective alternative to traditional static spray ball because it uses low volumes of cleaning fluid at low pressure. The double ball bearing in the Leistung's rotating head makes the device suitable for all industrial cleaning applications, including tanks, reactors, vessels and other containers.

- Self-rotating and cleaning
- Fully machined from SS 316L
- Easy mounting and inspection
- Complete 360° spray coverage
- Can be installed at any angle
- Various surface finish available



Other Filtration Products:

- Sanitary Liquid Filter Housing
- Air/Gas/Steam Filter Housing
- Vent filter housing
- Double open ended cartridge filter housing
- Single open ended cartridge filter housing
- Dual type filter housing
- Bag filter housing
- Strainer filter housing
- Module filter housing
- High flow cartridge filter housing
- Sea-water desalination filter housing
- Auto cleaning filter housing
- Plate and frame type filter press



Other Cryogenic Products:

- CRYOGENIC GLOBE VALVE - Shut-off valve
- Pressure relief valve
- Cryo Regulator
- Cryo Regulator- Pressure Builder
- Cryo Economizer
- LNG - Fill Receptacle
- LNG - Vent Receptacle
- Check Valve
- IN-LINE Ball Check Valve
- Excess Flow Valve





Our Global Reach



SteriPure Diaphragm Valves

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