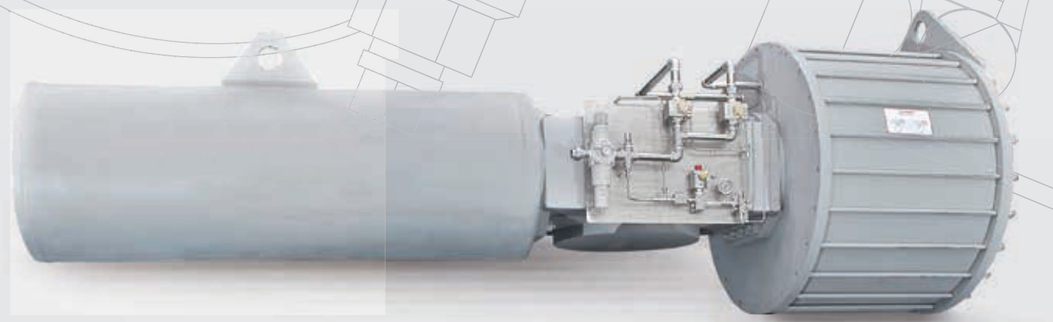
BG product data

# FLV-Pneumatic Actuator





Heavy-duty Valve
Actuators For Industrial
Process Controls

Industrial Valves

# Spring Return Pnuematic Actuator

## Design Features

BG series scotch actuator adopt the modularity design to suit to various quarter turn valves such as ball valve, butterfly valve and plug valve. All connection as per ISO5211 mounting flange standard. That can be suitable for all kinds of valves.

1.modularity design for easy stock and urgent delivery .

2.safety design for all spring with whole sealing and no one can contact the risk .

3.high accuracy to keep the lowest force of friction that will right output torque and long life cycle.

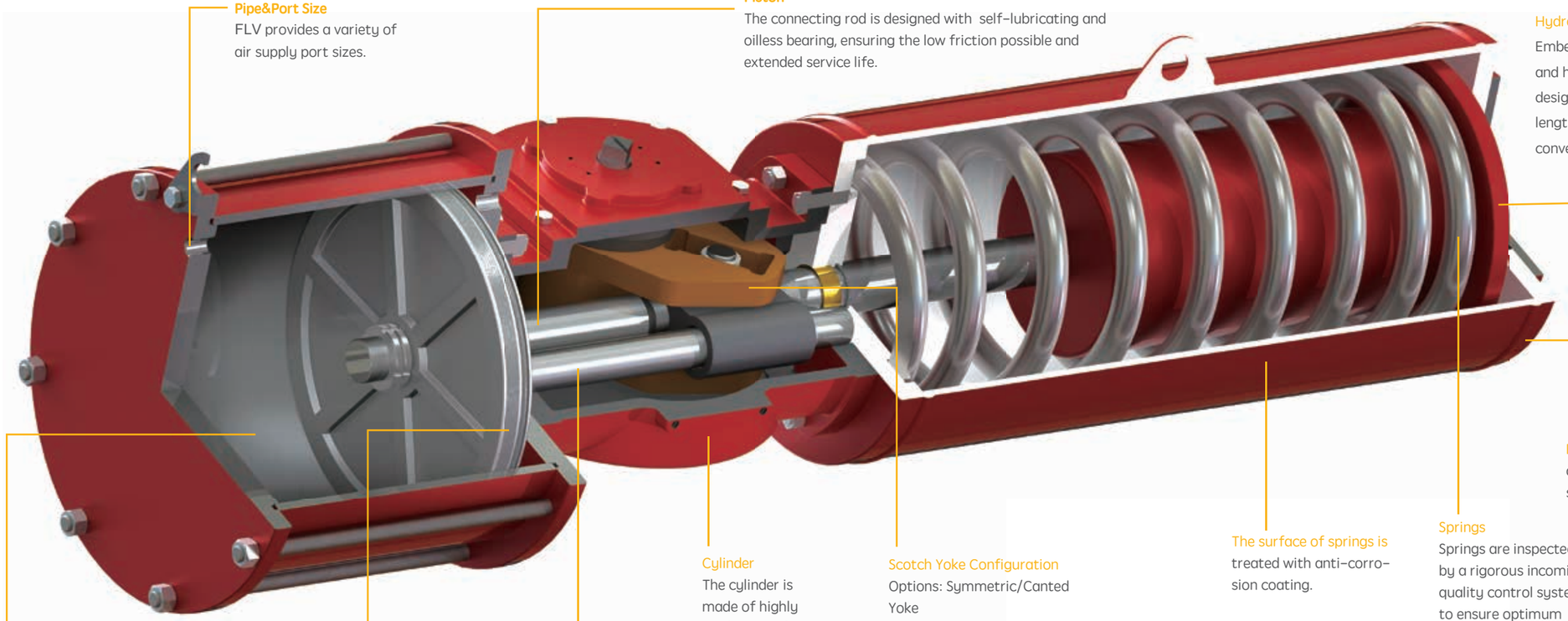
4.Nickel plated or Chrome Plated internal surface that will less the roughness and make high corrosion protection.

5.Low friction for all moving sealing that all reduction all loose of efficiency.

6.Rating output torque range: 360N.m to 110000 N.m .

7.Low Temperature Extremity: Extra-Low-60 、Low-40、Normal-20.

8.Manual override: Screw Rod、Gear Box、Manual Hydraulic Pump .



**Pipe&Port Size**
FLV provides a variety of air supply port sizes.

**Piston**
The connecting rod is designed with self-lubricating and oilless bearing, ensuring the low friction possible and extended service life.

**Hydraulic Manual Override**
Embedded screw manual and hydraulic manual design, reduce the product length to make installation convenient

**Fully enclosed welding**
design to ensure safety while operating.

**Springs**
Springs are inspected by a rigorous incoming quality control system to ensure optimum performance.

**The surface of springs is**
treated with anti-corro-sion coating.

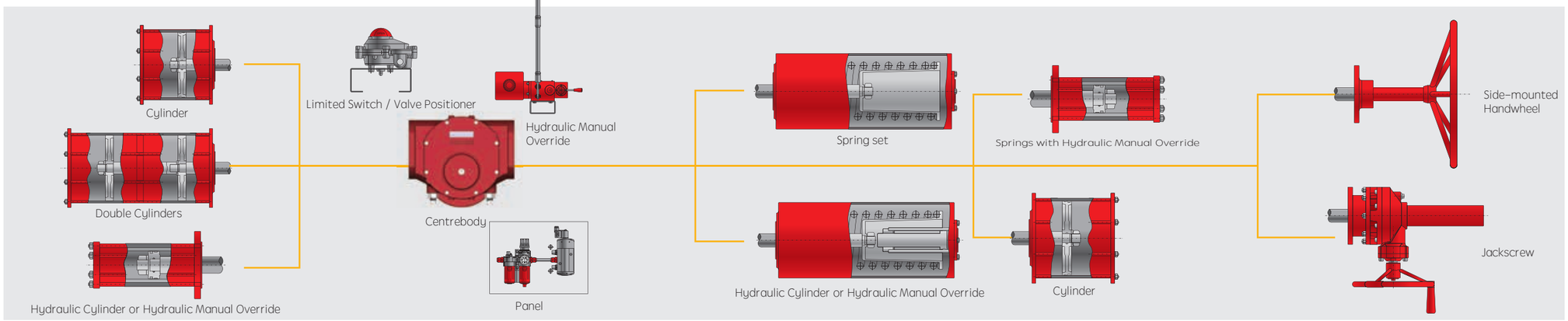
**Scotch Yoke Configuration**
Options: Symmetric/Canted Yoke

**Cylinder**
The cylinder is made of highly rigid material in an integrative molding way.

**Actuator Body**
The centre bodies are processed with three precision grinding and hard chrome plated treatments, featuring exacting durability against wear and corrosion, as well as low friction coefficient. Seals offer minimum roughness possible to ensure the high

**Double Orientation Construction**
Pistons feature excellent performance of dynamic sealing by the design with seals and durable ring of double orientation construc-tion.

**Double Thrust Bars**
To optimize the capacity of lateral loading, we enhance the design of BG range actuators with double thrust bars.




## Modular Configuration

Modular design allows for effective selection and sizing of actuators, available for online maintenance of multi-functional modules.The configuration of BG range products allows the parts which include cylinders, spring sets and manual overrides to be assembled together in various ways, from which actuators with the various sets can be complemented for control valves.

# Spring Return double action Pnuematic

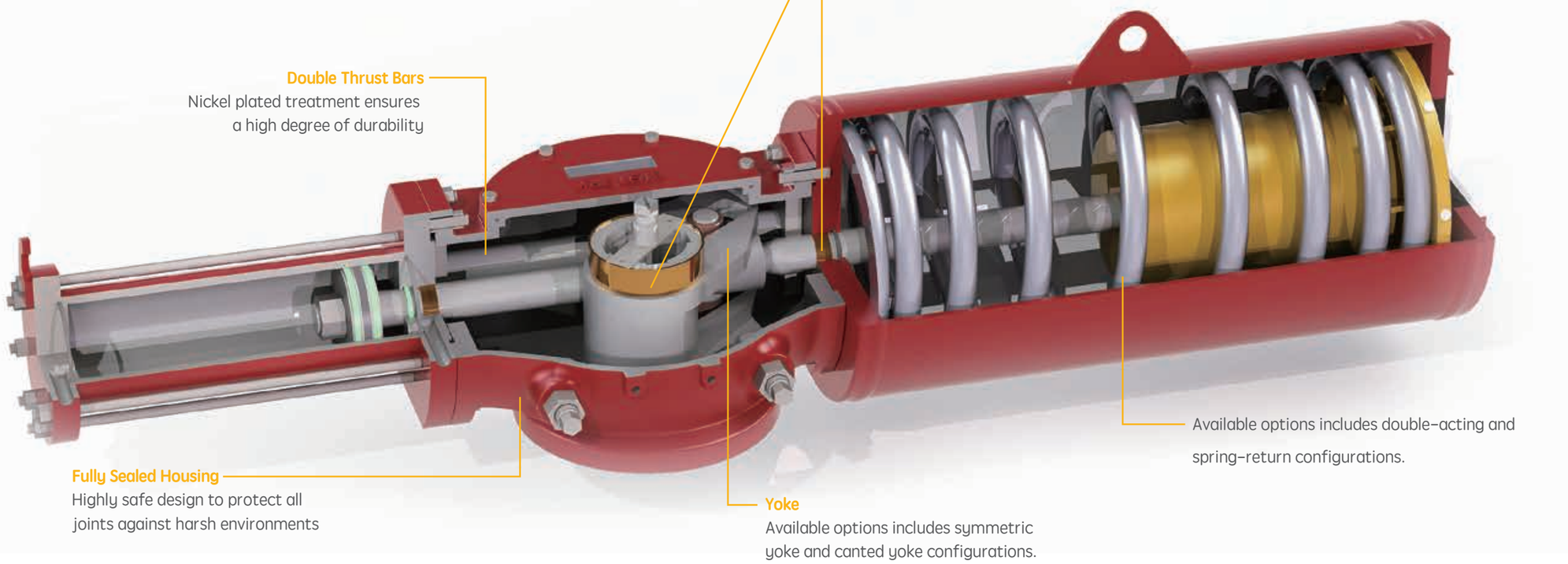
## Hydraulic Actuator Characteristics

BTS-Gxx-H series is designed with a quar-ter-turn hydraulic actuation configuration, suitable for on-off and moduating valves.

The design and materials ensure optimum perfor-mance in the harshest environments, covering the applications on both sea and land.

The design of BTS-Gxx-H series is aimed at offering high reliability and maximum flexibility to work with various valves with a full range of pressure class-es.

BTS-Gxx-H series fea-tures double torque outputs, assured safety and flexibility of mount-ing various accessories to automatically control the operation of valves.

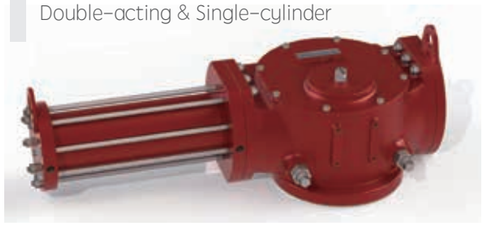



## Hydraulic Actuator

Hydraulic actuator is the type of actuator which can convert the hydraulic fluid into energy to implement preset actions and perform a variety of fuctions.

Hydraulic actuator has compact constructure and features smaller size, lighter weight as well as lower inertia force on the same outputs.

### Hydraulic Actuator – Double-acting & Single-cylinder



Double-acting actuator with single cylinder is one of the most commonly used configuration among hydraulic actuators. It has the advantages of simple structure and reliable performance.

### Hydraulic Actuator – Double-acting & Double-cylinder

With two hydraulic cylinders on each side, double-acting actuator can deliver twice the torque output and offer reliable performance as its balance of torque outputs during operation.

### Hydraulic Actuator – Spring-Return & Double-Cylinder

Spring-return actuators are capable of being fail to open and fail to close in accordance with customer requirements.

## Advantages

**Extended Life**
The processing of grinding with low coefficient of friction, along with chrome plating of cylinders provide high performance and long service life. Yoke is designed with high-strength sealing, enabling that the structure remains stable and undeformed to operate safely and reliably under high torque values.

**Modular Design**
The BG range products are compact and lightweight. Either symmetrical or canted actuator is designed to offer adequate torque values. Interchangeable power modules and spring sets allow for easy and quick spring resetting without any risks. Hydraulic seals are able to be replaced easily on site by the construction of hydraulic cylinders.

**Reliable Safety**
Spring modules with welded carbon steel housing ensure high efficiency as well as maintenance activities that can be performed safely with no unexpected operation caused by corrosion of the bolts.

**High Efficiency**
The inner surface of the housing is coated with a waterproof layer for high quality corrosion protection. Carefuly selected materials as well as the surface treatment offer high performance to resist wear and prevent torque loss during service life. All parts that require threaded connection allow thread to be rotated in position. Stroke between 85 and 95 degree is available to be adjusted.