

Cylinder pressure regulator FE51-SP

spectro**cem**



Cylinder regulator FE51-SP2

Specifications

- SPECTROCEM-components guarantee maximum quality by using high grade materials and a quality assurance program acc. to ISO 9001.
- All parts in the gas wetted surface area are cleaned in an ultrasonic cleaning system (CFC-free) with the special Cleaning process SPECTRO-CLEAN® and then baked out.
- SPECTROCEM-components undergo a 100% function- and Helium-leak-test.

Product features

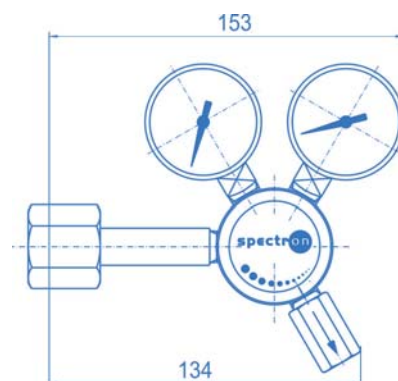
- Stainless steel cylinder pressure regulator with purge valves for process gas or purge gas purging
- Pressure regulator with very stable outlet pressure and anti-vibration device
- For corrosive, toxic gases and gas mixtures with corrosive components up to quality 6.0
- Purge valves in 3 different configurations available
- Suitable for inlet pressures up to 200 bar
- Max. outlet pressures 1.5 up to 200 bar *
- Integrated relief valve up to 100 bar
- Metal-to-metal seal to atmosphere
- Suitable for ECD-applications
- Pressure regulator can be evacuated
- Inlet filter
- Approved for use with oxygen
- Simple outlet pressure limitation by handwheel
- Easy to install
- New laboratory-style design

* 1.5 / 4 bar only for inlet pressure \leq 50 bar

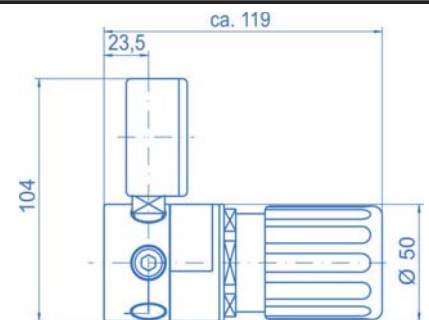
Technical data

Type	single-stage
Inlet pressure P_1	max. 200 bar
Outlet pressure P_2	1,5 / 4 bar ($P_1 \leq 50$ bar)* 10 / 20 / 50 / 100 / 200 bar ($P_1 > 50$ bar)**
Materials	
Body regulator,	SS 316L (SS 1.4404)
relief valve:	SS 316L (SS 1.4404)
Valve seat:	*PTFE / **PCTFE
Diaphragm:	Hastelloy C276
Filter:	Stainless steel 1.4404
In- and outlets	1/4" NPT-F
Temperature range	-30°C to +60°C
Leak rate (to atmosphere) (via seat)	10 ⁻⁸ mbar l/s He 10 ⁻⁶ mbar l/s He
Pressure gauge	Safety pressure gauges ISO5171/K11.6/NG50
Flow capacity	0,15

Dimensions FE51



Side view



Cylinder pressure regulator FE51-SP

spectrochem

Ordering information:

Cylinder pressure regulator FE51-SP

FE51 - SP3 - 200 - 10 - DIN 7 - SO2

Configuration

- SP2A** 2 purge valves in the outlet:
waste gas + process gas
- SP2** 2 purge valves:
purge gas in the inlet
process gas in the outlet
- SP3** 3 purge valves:
purge gas in the inlet
waste gas in the outlet
process gas in the outlet

Type of gas

Please specify type of gas (for selection of valve seat materials)

Cylinder connection

Detailed specification of cylinder connection including the relevant standard and number (e.g. BS no.3)

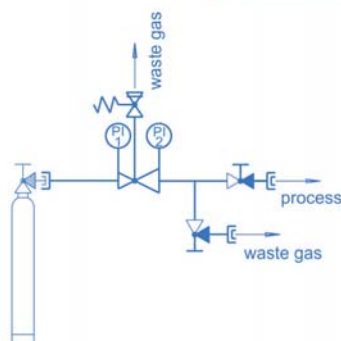
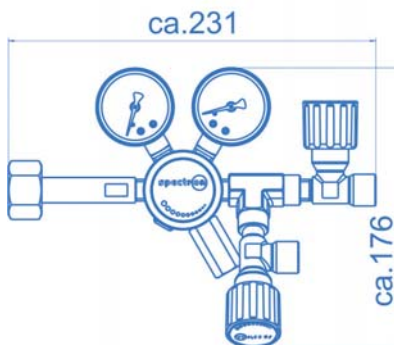
Inlet pressure P_1

- 10** - max. 10 bar
- 20** - max. 20 bar
- 50** - max. 50 bar
- 100** - max. 100 bar
- 200** - max. 200 bar

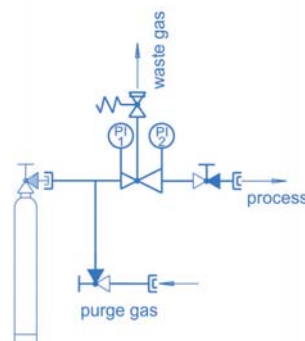
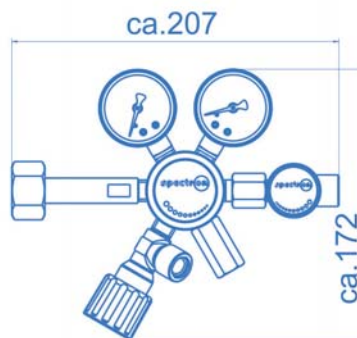
Outlet pressure P_2

- 1,5** - up to 1,5 bar ($P_1 \leq 50$ bar)
- 4** - up to 4 bar ($P_1 \leq 50$ bar)
- 10** - up to 10 bar
- 20** - up to 20 bar
- 50** - up to 50 bar
- 100** - up to 100 bar
- 200** - up to 200 bar

FE51-SP2A
Process gas purging



FE51-SP2
Purge gas purging
without waste gas valve



FE51-SP3
Inert gas purging
with waste gas valve

