

Cylinder Regulators

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pressure regulators

GO Regulator

405 Centura Court • PO Box 4866 • Spartanburg, SC 29303

Phone (864) 574-7966 Fax (864) 574-5608

www.goreg.com • sales@goreg.com

CC2 Series

Compact Two-stage Cylinder Pressure Regulator



The CC2 Series compact two-stage precision pressure regulator is well suited for instrumentation applications requiring a precise and stable delivery pressure. This regulator was originally designed to meet the needs of the instrumentation industry; however, it would also be very useful in many other applications that require a compact two-stage pressure regulator to supply a precise delivery pressure with fluctuating supply pressures.

Another benefit of using the CC2 Series is that internally, it shares some of its design features and options with the time proven CPR-1 Series pressure regulator. These features and options allow the customer to essentially tailor this regulator to accommodate virtually any application requiring low to moderate flow rates. The unit will also be offered with inlet/outlet pressure gauges, CGA connections and relief valves.

The CC2 Series regulator is manufactured in aluminum as a standard option. Please consult GO Regulator for any optional materials of construction that might be required for toxic or corrosive process gas applications.

Features & Specifications

- Compact size
- Two-stage regulation
- Stainless steel diaphragm
- Gas or liquid service
- Low internal volumes
- Maximum inlet pressure up to 3600 psig
- Outlet pressure ranges: 0–10 psig, 0–25 psig, 0–50 psig, 0–100 psig, 0–250 psig and 0–500 psig
- Cv flow coefficients: 0.06, 0.025, 0.2
- Leak rate, bubble-tight
- Operating temperatures: –40° F to +175° F (–40° C to +80° C)
- Inlet/outlet connections: 1/8" FNPT, 1/4" tube

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CC2 Series

How to Order

Standard items in bold

CC2 - 3 F 0 C 1 1 1 1 CGA Fitting **1 A 3 A 3**

BODY MATERIAL

- 1 316L stainless steel
- 2 Brass
- 3 **Aluminum**

PORT CONFIGURATIONS

F Standard

For more port configurations, see page 19.

PROCESS PORT TYPES

(GAUGE PORT TYPE, IF NECESSARY)

- 0 1/8" FNPT (1/8" FNPT gauge ports)
- 2 1/4" tube stub, 2" long (1/8" FNPT gauge ports)

OUTPUT RANGE

- C 0-10 psig
- D 0-25 psig
- E 0-50 psig
- G 0-100 psig
- I 0-250 psig
- J 0-500 psig

DIAPHRAGM TYPE, 1ST STAGE

- 1 **Standard**

DIAPHRAGM TYPE, 2ND STAGE

- 1 **Standard**

CAP ASSEMBLY, 1ST STAGE

- 1 **Tamper-proof**
- 4 Tamper-proof, panel mount
- 5 Tamper-proof, captured vent

For a full list of options, visit the selection matrix for this product on www.goreg.com

2ND STAGE Cv FLOW

- 3 **0.06**
- 5 0.2
- C 0.025

2ND STAGE SEAT MATERIAL

- A **Tefzel®**
- H PCTFE (Formerly Kel-F81)
- Q PEEK™

1ST STAGE Cv FLOW

- 3 **0.06**
- 5 0.2
- C 0.025

1ST STAGE SEAT MATERIAL

- A **Tefzel®**
- H PCTFE (Formerly Kel-F81)
- Q PEEK™

GAUGES

- 1 Include gauges
- 2 Omit gauges
- 3 Customer-supplied

CGA FITTING

Use '000' to omit CGA
Use 'CUS' for customer-supplied CGA

CAP ASSEMBLY, 2ND STAGE

- 1 **Standard, aluminum**
- 4 Panel mount, aluminum
- 5 Captured vent, aluminum
- 7 Captured vent, stainless steel
- 8 Tamper-proof, aluminum
- 9 Fine adjust, 1/2" panel mount, aluminum
- 0 Fine adjust, 1 3/8" panel mount, aluminum
- D Captured vent, tamper-proof, stainless steel

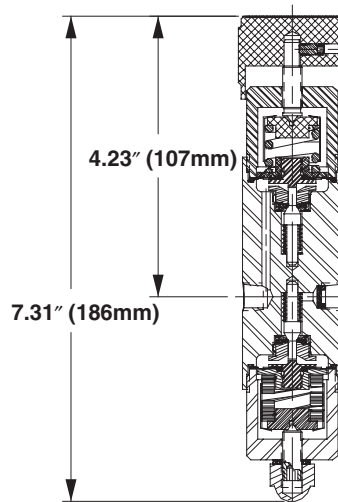
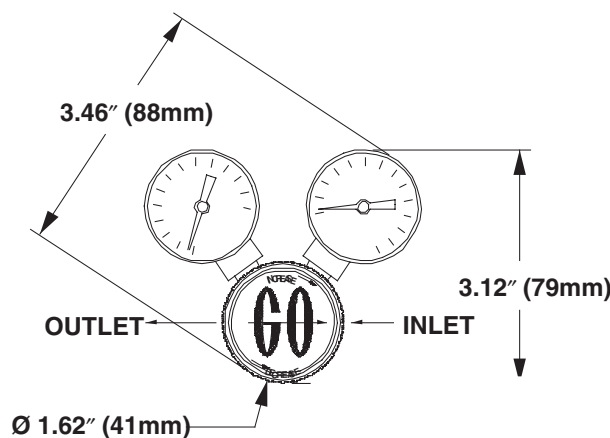
Maximum Temperature & Operating Inlet Pressures

| SEAT MATERIAL | MAXIMUM TEMPERATURE | MAXIMUM OPERATING INLET PRESSURE |
|----------------------------|---------------------|----------------------------------|
| Tefzel® | 150° F (66° C) | @ 3600 psig (24.82 MPa) |
| PEEK™ | 175° F (80° C) | @ 3600 psig (24.82 MPa) |
| PCTFE (formerly Kel-F® 81) | 175° F (80° C) | @ 3600 psig (24.82 MPa) |

NOTE: The choices above represent an abbreviated list of the more commonly ordered options. For a complete listing of all available options, please see the Selection Wizard on the GO website at www.goreg.com or contact the factory.

Outline & Mounting Dimensions

Weight = 2.1 lbs (0.95 kg)



Weight - 2.1 lbs (0.95 kg)

Tefzel® is a registered trademark of the DuPont Company.

Kel-F® is a registered trademark of 3M Company.

PEEK™ is a trademark of Victrex PLC.

CYL-1 Series

Single Stage Brass Cylinder; Gas Pressure Reducing Regulator



(Shown with optional outlet valve)

The CYL-1 Series is designed as a complete compact pressure control module. The basis of this unit is the economical PR-2 Series pressure control valve which is widely used in instrumentation sample systems as well as many other applications requiring maximum reliability. This regulator, when ordered with appropriate gauges and CGA inlet fitting, is designed for use as a compressed gas cylinder regulator for those applications where the corrosion resistance of stainless steel is not a requirement.

Features & Specifications

- CGA inlet fitting
- Integral inlet filter
- 2" diameter brass gauges
- Teflon®-lined stainless steel diaphragm
- Maximum inlet pressure: 3600 psig
- Outlet pressure ranges: 0–10 psig, 0–25 psig, 0–50 psig, 0–100 psig, 0–250, 0–500 and 0–750 psig
- Fluid media; non-corrosive gases
- Operating temperatures: –40° F to +175° F (–40° C to +80° C)
- Cv flow coefficients: 0.025, 0.06, 0.20

pressure regulators

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CYL-1 Series

How to Order

Standard items in bold

C1 - 2 F 1 1 A 3 C 1 CGA Fitting **0 0 0** **1**

BODY MATERIAL

2 Brass

PORT CONFIGURATION

F Standard

For more port configurations, see page 19.

PROCESS PORT TYPES

(GAUGE PORT TYPES, IF SPECIFIED)

1 1/4" FNPT (1/4" FNPT gauge ports)

4 3/8" FNPT (1/4" FNPT gauge ports)

DIAPHRAGM TYPE

1 Standard diaphragm

2 Diaphragm-attached poppet

3 Self-relieving

4 Vacuum-assist spring, standard diaphragm

5 Vacuum-assist spring, diaphragm-attached poppet

8 Tefzel® ring/stainless steel

SEAT MATERIAL

A Tefzel®

B CF Teflon®

C Polyimide

H PCTFE (formerly Kel-F® 81)

I High density Teflon®

Q PEEK™

GAUGES

1 Include gauges

2 Omit gauges

3 Customer-supplied

CGA FITTING

Use '000' to omit CGA

Use 'CUS' for customer-supplied CGA

CAP ASSEMBLY

1 Standard

4 Panel mount

OUTPUT RANGE

C 0-10 psig

D 0-25 psig

E 0-50 psig

G 0-100 psig

I 0-250 psig

J 0-500 psig

W 0-750 psig

FLOW COEFFICIENT (Cv)

3 0.06

5 0.2

C 0.025

For a full list of options, visit the selection matrix for this product on www.goreg.com

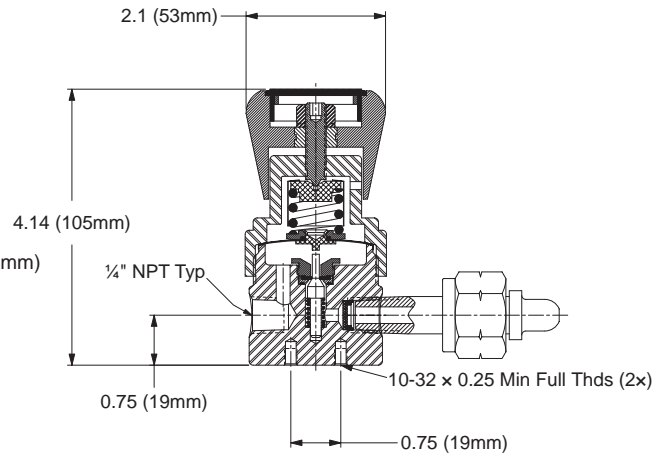
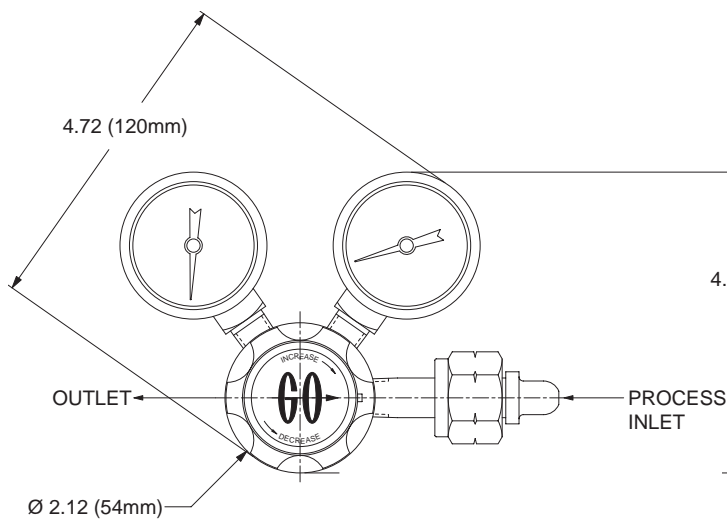
Maximum Temperature & Operating Inlet Pressures

| SEAT MATERIAL | MAXIMUM TEMPERATURE | | MAXIMUM OPERATING INLET PRESSURE |
|----------------------------|---------------------|---|----------------------------------|
| Tefzel® | 150° F (66° C) | @ | 3600 psig (24.82 MPa) |
| High density Teflon® | 150° F (66° C) | @ | 3600 psig (24.82 MPa) |
| PCTFE (formerly Kel-F® 81) | 175° F (80° C) | @ | 3600 psig (24.82 MPa) |
| Polyimide | 175° F (80° C) | @ | 3600 psig (24.82 MPa) |
| PEEK™ | 175° F (80° C) | @ | 3600 psig (24.82 MPa) |

NOTE: The choices above represent an abbreviated list of the more commonly ordered options. For a complete listing of all available options, please see the Selection Wizard on the GO website at www.goreg.com or contact the factory.

Outline & Mounting Dimensions

Weight = 1.9 lbs (0.86 kg)



Teflon® and Tefzel® are registered trademarks of the DuPont Company.
 Kel-F® is a registered trademark of 3M Company.
 PEEK™ is a trademark of Victrex PLC.

CYL-2 Series

Two-stage Brass Cylinder Gas Pressure Reducing Regulator



The CYL-2 Series is a precision two-stage regulator well suited for instrumentation applications requiring a precise and stable pressure source. This pressure regulator was developed to meet the needs of the instrumentation industry, but is also well suited for other applications requiring precision pressure supply.

The development of this series provides the maximum flexibility that is available in any cylinder regulator. This means that you can select optional diaphragm materials for maximum sensitivity with Teflon®-lined stainless steel being standard.

Features & Specifications

- Brass construction
- 1st stage integral 20 micron filter and 2nd stage integral 40 micron filter
- Teflon®-lined stainless steel diaphragm in both stages
- Tefzel® seats are standard
- 2" diameter brass gauges
- CGA inlet fitting
- Optional relief valves and shut off valves
- Maximum inlet pressure: 3600 psig
- Outlet pressure ranges 0–10 psig, 0–25 psig, 0–50 psig, 0–100 psig, 0–250 psig and 0–500 psig
- Fluid media; non-corrosive gases
- Cv flow coefficients: 0.06, 0.025, 0.20, 0.50
- Operating temperatures: –40° F to +175° F (–40° C to +80° C)
- ¼" FNPT inlet/outlet connections

pressure regulators

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CYL-2 Series

How to Order

Standard items
in bold

C2 - 2 F 1 C 1 1 1 1 1 CGA Fitting **1 A 3 A 3**

BODY MATERIAL

- 2 Brass**
- 8 Chrome-plated brass**

PORT CONFIGURATION

- F Standard**
- For more port configurations, see page 19.

PROCESS PORT TYPES (GAUGE PORT TYPE, IF SPECIFIED)

- 1 1/4" FNPT (1/4" FNPT gauge ports)**
- 4 3/8" FNPT (1/4" FNPT gauge ports)**

OUTPUT RANGE

- C 0-10 psig**
- D 0-25 psig**
- E 0-50 psig**
- G 0-100 psig**
- I 0-250 psig**
- J 0-500 psig**

DIAPHRAGM TYPE, 1ST STAGE

- 1 Standard diaphragm**
- 2 Diaphragm-attached poppet**
- 8 Tefzel® ring/stainless steel**
- B Tefzel® ring/stainless steel, diaphragm-attached poppet**

DIAPHRAGM TYPE, 2ND STAGE

- 1 Standard diaphragm**
- 2 Diaphragm-attached poppet**
- 3 Self-relieving**
- 8 Tefzel® ring/stainless steel**
- B Tefzel® ring/stainless steel, diaphragm-attached poppet**

CAP ASSEMBLY, 1ST STAGE

- 1 Tamper-proof**

2ND STAGE Cv FLOW

- 3 0.06**
- 5 0.2**
- C 0.025**
- H 0.5**

2ND STAGE SEAT MATERIAL

- A Tefzel®**
- H PCTFE (formerly Kel-F® 81)**
- I High density Teflon®**
- Q PEEK™, low temperature service, plastic knob**

1ST STAGE Cv FLOW

- 3 0.06**
- 5 0.2**
- C 0.025**
- H 0.5**

1ST STAGE SEAT MATERIAL

- A Tefzel®**
- H PCTFE (formerly Kel-F® 81)**
- I High density Teflon®**
- Q PEEK™**

GAUGES

- 1 Include gauges**
- 2 Omit gauges**
- 3 Customer-supplied**

CGA FITTINGS

- Use '000' to omit CGA
- Use 'CUS' for customer-supplied CGA

CAP ASSEMBLY, 2ND STAGE

- 1 Standard**
- 4 Panel mount**

For a full list of options, visit the selection matrix for this product on www.goreg.com

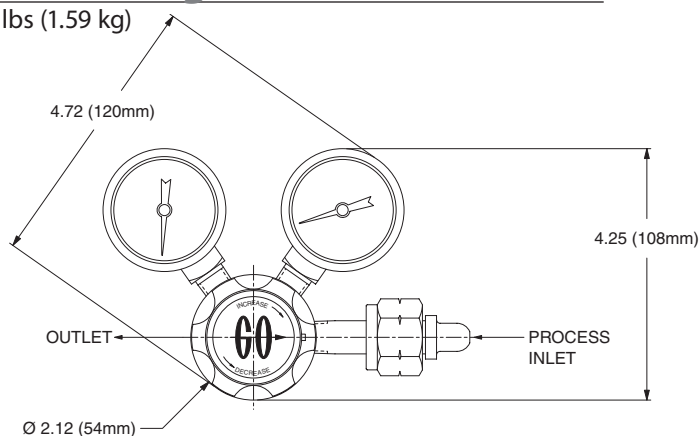
Maximum Temperature & Operating Inlet Pressures

| SEAT MATERIAL | MAXIMUM TEMPERATURE | MAXIMUM OPERATING INLET PRESSURE |
|----------------------------|---------------------|----------------------------------|
| Tefzel® | 150° F (66° C) | @ 3600 psig (24.82 MPa) |
| High density Teflon® | 150° F (66° C) | @ 3600 psig (24.82 MPa) |
| PCTFE (formerly Kel-F® 81) | 175° F (80° C) | @ 3600 psig (24.82 MPa) |
| Polyimide | 175° F (80° C) | @ 3600 psig (24.82 MPa) |
| PEEK™ | 175° F (80° C) | @ 3600 psig (24.82 MPa) |

NOTE: The choices above represent an abbreviated list of the more commonly ordered options. For a complete listing of all available options, please see the Selection Wizard on the GO website at www.goreg.com or contact the factory.

Outline & Mounting Dimensions

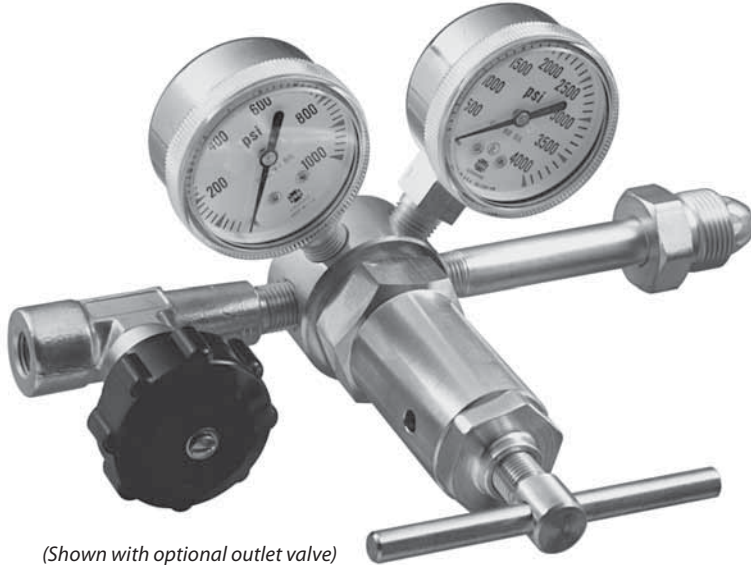
Weight = 3.5 lbs (1.59 kg)



Teflon® and Tefzel® are registered trademarks of the DuPont Company.
Kel-F® is a registered trademark of 3M Company.
PEEK™ is a trademark of Victrex PLC.

CYL-3 Series

High Pressure Economy Brass Cylinder Regulator



(Shown with optional outlet valve)

The CYL-3 Series is an economical brass high pressure regulator, designed to accept inlet pressures up to 3600 psig and deliver outlet pressures from 0–100 psig up to 0–2000 psig. This single-stage brass regulator is perfectly suited for cylinder usage with non-corrosive gases. Good regulation characteristics are provided by a carefully engineered piston sensor. Ease of outlet pressure adjustment is provided by the T-handle, which is offered as standard.

Features & Specifications

- Inlet pressures up to 3600 psig
- Control pressures from 0–100 psig up to 0–2000 psig
- Brass (alloy 360) construction
- Stainless steel poppet
- 20 micron inlet filter
- Bubble-tight shutoff
- CGA connection with integral inlet filter
- 2" diameter brass gauges
- Cv flow coefficients: 0.06 (standard), 0.2 (optional)
- Better than 25 Ra finish in diaphragm cavity
- Optional relief valves and outlet shutoff valves

pressure regulators

GO Regulator

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CYL-3 Series

How to Order

Standard items in bold

C3 - 2 F 1 G 1 3 A 1 CGA Fitting **0 0 0 1**

BODY MATERIAL

2 Brass

PORT CONFIGURATION

F Standard

For more port configurations, see page 19.

PROCESS PORT TYPES

(GAUGE PORT TYPE, IF SPECIFIED)

0 1/8" FNPT (1/8" FNPT gauge ports)

1 1/4" FNPT (1/4" FNPT gauge ports)

OUTPUT RANGE

G 0-100 psig

I 0-250 psig

J 0-500 psig

K 0-1000 psig

L 0-2000 psig

PISTON TYPE

1 Non-self-relieving

3 Self-relieving

GAUGES

1 Include gauges

2 Omit gauges

3 Customer-supplied

CGA FITTINGS

Use '000' to omit CGA

Use 'CUS' for customer-supplied CGA

CAP ASSEMBLY

1 Standard

4 Panel mount

8 Tamper-proof

A Low torque

Y Hand knob

SEAT MATERIAL

A Tefzel®

I Teflon®

FLOW COEFFICIENT (Cv)

3 0.06

5 0.2

For a full list of options, visit the selection matrix for this product on www.goreg.com

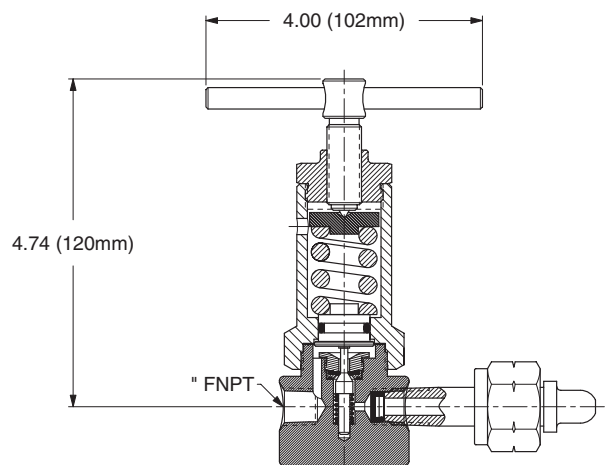
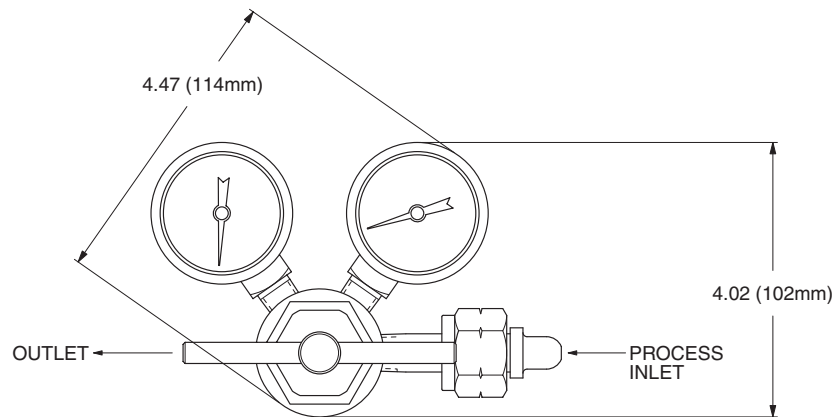
NOTE: The choices above represent an abbreviated list of the more commonly ordered options. For a complete listing of all available options, please see the Selection Wizard on the GO website at www.goreg.com or contact the factory.

Maximum Temperature & Operating Inlet Pressures

| SEAT MATERIAL | MAXIMUM TEMPERATURE | | MAXIMUM OPERATING INLET PRESSURE |
|----------------------|---------------------|---|----------------------------------|
| Tefzel® | 150° F (66° C) | @ | 3600 psig (24.82 MPa) |
| High density Teflon® | 150° F (66° C) | @ | 3600 psig (24.82 MPa) |

Outline & Mounting Dimensions

Weight = 2.74 lbs (1.22 kg)



Teflon® and Tefzel® are registered trademarks of the DuPont Company.

CYL-20 Series

Corrosion-resistant Two-stage Pressure Reducing Regulator



Precision pressure control is now possible with the CYL-20 Series regulator. This two-stage regulator, constructed of 316L stainless steel and Teflon®, has less than 0.01 percent outlet pressure change with varying inlet pressures and is designed for use in gas calibration systems and semiconductor materials processing.

With materials of only 316L stainless steel, Teflon® and Tefzel®, this regulator is suitable for service in corrosive streams as well as non-corrosive streams with potential surface absorption problems. This regulator accepts inlet pressures up to 6000 psig and has bubble-tight shutoff. Operating temperature ranges may vary from -40° C up to +260° C and outlet pressure ranges of 0-10 psig up to 0-500 psig are easily adjustable by a fluted knob.

Features & Specifications

- 316L stainless steel, Inconel®, Teflon® & Tefzel® in contact with operating media only
- Stainless steel caps & adjusting screws
- Bubble-tight shutoff
- CGA fitting for cylinder connection
- 2" diameter stainless steel 316 gauges
- Maximum inlet pressure: 6000 psig
- Outlet pressure ranges of 0-10 psig, 0-50 psig, 0-100 psig, 0-250 psig and 0-500 psig
- Cv flow coefficients: 0.025, 0.06, 0.20, 0.50
- Operating temperatures of one line: -40° F to +500° F (-40° C to +260° C)
- Outlet pressure change is 0.01 psig per 100 psig of inlet decay

Options

- Relief valve
- Captured vent
- Special fittings including all metal VCR®-compatible
- Shutoff valve

pressure regulators

GO Regulator

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CYL-20 Series

How to Order

Standard items
in bold

C2 - **1** **F** **1** **C** **1** **1** **1** **1** **1** **0** **0** **0** **1** **A** **3** **A** **3**

BODY MATERIAL

1 316L stainless steel

PORT CONFIGURATION

F Standard

For more port configurations, see page 19.

PROCESS PORT TYPES

(GAUGE PORT TYPE, IF SPECIFIED)

1 ¼" FNPT (¼" FNPT gauge ports)

3 ¼" sch. 80 pipe stub, 4" long (¼" FNPT gauge ports)

4 ⅜" FNPT (¼" gauge ports)

K ¾" sch. 40 pipe stub, 4" long (¼" FNPT gauge ports)

OUTPUT RANGE

C 0-10 psig

D 0-25 psig

E 0-50 psig

G 0-100 psig

I 0-250 psig

J 0-500 psig

DIAPHRAGM TYPE, 1ST STAGE

1 Standard diaphragm

2 Diaphragm-attached poppet

8 Tefzel® ring/stainless steel

9 Teflon®/Inconel®

B Tefzel® ring/stainless steel, diaphragm-attached poppet

DIAPHRAGM TYPE, 2ND STAGE

1 Standard diaphragm

2 Diaphragm-attached poppet

3 Self-relieving

8 Tefzel® ring/stainless steel

9 Teflon®/Inconel®

B Tefzel® ring/stainless steel, diaphragm-attached poppet

CGA Fitting

2ND STAGE Cv FLOW

3 0.06

5 0.2

C 0.025

H 0.5

2ND STAGE SEAT MATERIAL

A Tefzel®

H PCTFE (formerly Kel-F® 81)

I High density Teflon®

Q PEEK™, low temperature service, plastic knob

1ST STAGE Cv FLOW

3 0.06

5 0.2

1ST STAGE SEAT MATERIAL

A Tefzel®

H PCTFE (formerly Kel-F® 81)

I High density Teflon®

Q PEEK™

GAUGES

1 Include gauges

2 Omit gauges

3 Customer-supplied

CGA FITTINGS

Use '000' to omit CGA

Use 'CUS' for customer-supplied CGA

CAP ASSEMBLY, 2ND STAGE

1 Standard

4 Panel mount

CAP ASSEMBLY, 1ST STAGE

1 Tamper-proof

For a full list of options, visit the selection matrix for this product on www.goreg.com

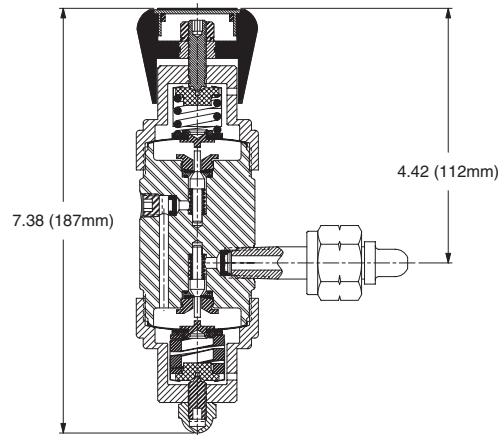
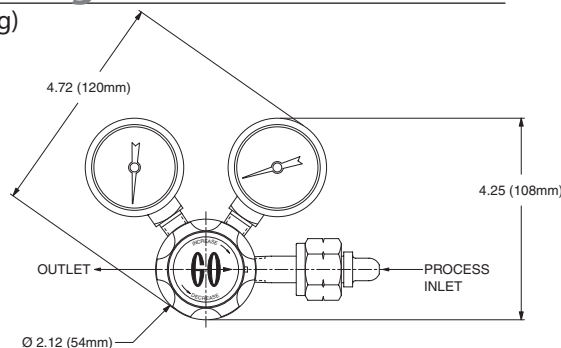
Maximum Temperature & Operating Inlet Pressures

| SEAT MATERIAL | MAXIMUM TEMPERATURE | | MAXIMUM OPERATING INLET PRESSURE |
|----------------------------|---------------------|---|----------------------------------|
| Tefzel® | 150° F (66° C) | @ | 3600 psig (24.82 MPa) |
| High density Teflon® | 150° F (66° C) | @ | 3600 psig (24.82 MPa) |
| PCTFE (formerly Kel-F® 81) | 175° F (80° C) | @ | 6000 psig (41.37 MPa) |
| Polyimide | 500° F (260° C) | @ | 3600 psig (24.82 MPa) |
| Polyimide | 175° F (80° C) | @ | 6000 psig (41.37 MPa) |
| PEEK™ | 500° F (260° C) | @ | 3600 psig (24.82 MPa) |
| PEEK™ | 175° F (80° C) | @ | 6000 psig (41.37 MPa) |

NOTE: The choices above represent an abbreviated list of the more commonly ordered options. For a complete listing of all available options, please see the Selection Wizard on the GO website at www.goreg.com or contact the factory.

Outline & Mounting Dimensions

Weight = 3.9 lbs (1.77 kg)



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Inconel® is a registered trademark of Special Metals Corporation.

Kel-F® is a registered trademark of 3M Company.

PEEK™ is a trademark of Victrex PLC.

CYL-21 Series

Corrosion-resistant Single Stage Cylinder Regulator



(Shown with optional outlet valve)

The CYL-21 Series is a compact cylinder regulator based on the time proven design of the PR-1 Series single-stage stainless steel line regulator and is suitable for most corrosive gas cylinder applications. While normally used for low and moderate flow service, optional high flow orifices are available.

The standard unit is equipped with CGA connector, integral inlet filter, inlet and outlet pressure gauges and may be ordered with extra inlet or outlet ports for inlet purging, outlet relief valves or other accessory items. When used in service with toxic or explosive gases, we recommend the installation of a captured vent option. This option is a true captured vent cap and not merely a standard cap with a vent port. It comes complete with a CGA fitting and 2" diameter gauges.

Features & Specifications

- 316L stainless steel construction (standard), Monel® optional
- Inlet pressures up to 6000 psig
- Electropolished body with better than 25 Ra finish in diaphragm cavity
- 20 micron inlet filter
- Bubble-tight shutoff
- CGA inlet fitting
- 2" diameter 316 stainless steel gauges
- Outlet pressure ranges 0–10 psig, 0–25 psig, 0–50 psig, 0–100 psig, 0–250 psig, 0–500 psig, and 0–750 psig
- Optional Cv flow coefficients: 0.025, 0.06, 0.20, 0.50

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CYL-21 Series

How to Order

Standard items in bold

C1 - 1 F 1 1 A 3 C 1 CGA Fitting **0 0 0 1**

BODY MATERIAL

- 1** 316L stainless steel
- 4 Monel®

PORT CONFIGURATION

- F** Standard
- For more port configurations, see page 19.

PROCESS PORT TYPES

(GAUGE PORT TYPE, IF SPECIFIED)

- 1** ¼" FNPT (¼" FNPT gauge ports)
- 2** ¼" tube stub, 2" long (¼" FNPT gauge ports)
- 3** ¼" sch. 80 pipe stub, 4" long (¼" FNPT gauge ports)
- 4** ⅜" FNPT (¼" FNPT gauge ports)
- 6** ½" tube stub, 2" long (¼" tube gauge ports)
- K** ¼" sch. 40 pipe stub, 4" long (¼" FNPT gauge ports)

DIAPHRAGM TYPE

- 1** Standard diaphragm
- 2** Diaphragm-attached poppet
- 3** Self-relieving
- 4** Vacuum-assist spring, standard diaphragm
- 5** Vacuum-assist spring, diaphragm-attached poppet
- 8** Tefzel® ring/stainless steel

SEAT MATERIAL

- A** Tefzel®
- B** CF Teflon®
- C** Polyimide
- H** PCTFE (formerly Kel-F® 81)
- I** High density Teflon®
- Q** PEEK™

GAUGES

- 1** Include gauges
- 2** Omit gauges
- 3** Customer-supplied

CGA FITTINGS

- Use '000' to omit CGA
- Use 'CUS' for customer-supplied CGA

CAP ASSEMBLY

- 1** Standard
- 4** Panel mount

OUTPUT RANGE

- C** 0-10 psig
- D** 0-25 psig
- E** 0-50 psig
- G** 0-100 psig
- I** 0-250 psig
- J** 0-500 psig
- W** 0-750 psig

FLOW COEFFICIENT (Cv)

- 3** 0.06
- 5** 0.2
- C** 0.025
- H** 0.5

For a full list of options, visit the selection matrix for this product on www.goreg.com

NOTE: The choices above represent an abbreviated list of the more commonly ordered options. For a complete listing of all available options, please see the Selection Wizard on the GO website at www.goreg.com or contact the factory.

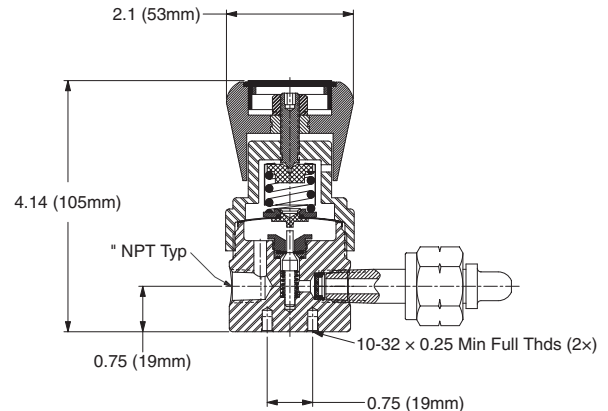
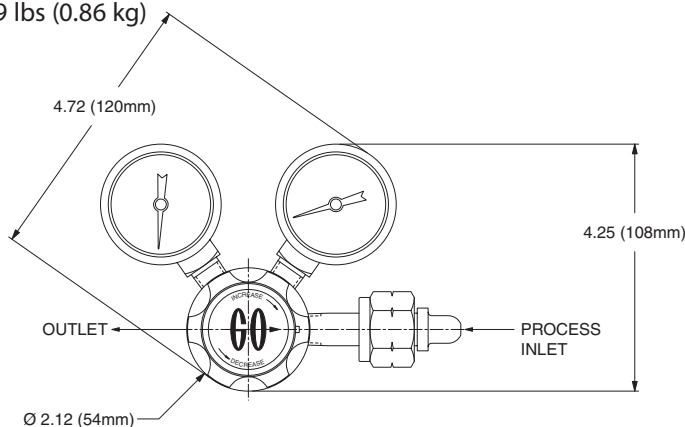
Maximum Temperature & Operating Inlet Pressures

| SEAT MATERIAL | MAXIMUM TEMPERATURE* | MAXIMUM OPERATING INLET PRESSURE |
|----------------------------|----------------------|----------------------------------|
| Tefzel® | 150° F (66° C) | @ 3600 psig (24.82 MPa) |
| High density Teflon® | 150° F (66° C) | @ 3600 psig (24.82 MPa) |
| PCTFE (formerly Kel-F® 81) | 175° F (80° C) | @ 6000 psig (41.37 MPa) |
| Polyimide | 500° F (260° C) | @ 3600 psig (24.82 MPa) |
| Polyimide | 175° F (80° C) | @ 6000 psig (41.37 MPa) |
| PEEK™ | 500° F (260° C) | @ 3600 psig (24.82 MPa) |
| PEEK™ | 175° F (80° C) | @ 6000 psig (41.37 MPa) |

* Temperatures in excess of 175° F (80° C) require the use of a metal knob or the tamper-proof option.

Outline & Mounting Dimensions

Weight = 1.9 lbs (0.86 kg)



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 Teflon® and Tefzel® are registered trademarks of the DuPont Company.
 Kel-F® is a registered trademark of 3M Company.
 PEEK™ is a trademark of Victrex PLC.

COM-1 Series

Crossover Manifold Regulator System



The COM-1 Series crossover manifold system consists of two PR-1-type stainless steel regulators (PR-2-type brass, optional) mounted on a panel-mounting-type bracket shown with optional gauges. The primary regulator, supplied with a tamper-proof nut, is set at an outlet operating pressure at least 15 psig higher than the secondary regulator (supplied with a standard adjusting knob). As the primary supply source depletes and the operating outlet pressure of the primary regulator falls below the preset operating pressure of the secondary regulator, the secondary regulator takes over. Once this occurs, the secondary regulator can be manually adjusted $\frac{1}{8}$ -turn clockwise, the secondary regulator is now the primary and the depleted supply source can be replaced.

Features & Specifications

- Inlet pressure to 6000 psig
- Outlet pressures range: 0–10 psig, 0–25 psig, 0–50 psig, 0–100 psig, 0–250 psig, or 0–500 psig
- Changeover pressures: 15–250 psig
- Cv flow coefficients: 0.025, 0.06, 0.2, 0.5
- All connections: $\frac{1}{4}$ " FNPT
- 20 micron inlet filter
- 316L stainless steel construction; brass and Monel® optional
- Seat materials of Teflon®, PCTFE, Tefzel®, polyimide, PEEK™
- Bubble-tight shutoff
- 2" diameter gauges (optional)
- Operating temperatures -40° F to $+500^{\circ}$ F (-40° C to $+260^{\circ}$ C)
- Bracket mounted for easy installation

pressure regulators

GO Regulator

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Phone (864) 574-7966 Fax (864) 574-5608

www.goreg.com • sales@goreg.com

COM-1 Series

How to Order

Standard items in bold

COM1 - 1 A 3 C 1

BODY MATERIAL

- 1** 316L stainless steel
- 2 Brass
- 4 Monel®

SEAT MATERIAL

- A** Tefzel®
- B CF Teflon®
- C Polyimide
- H PCTFE (formerly Kel-F® 81)
- I High density Teflon®
- Q PEEK™

GAUGES

- 1** Include gauges
- 2 Omit gauges
- 3 Customer-supplied

OUTPUT RANGE

- C** 0-10 psig
- D 0-25 psig
- E 0-50 psig
- G 0-100 psig
- I 0-250 psig
- J 0-500 psig

FLOW COEFFICIENT (Cv)

- 3** 0.06
- 5 0.2
- C 0.025
- H 0.5

For a full list of options, visit the selection matrix for this product on www.goreg.com

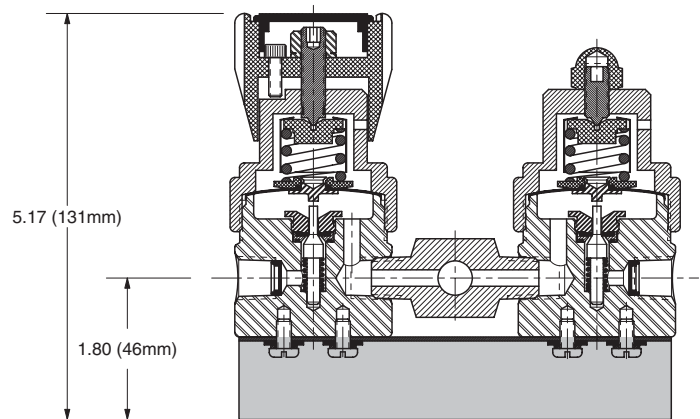
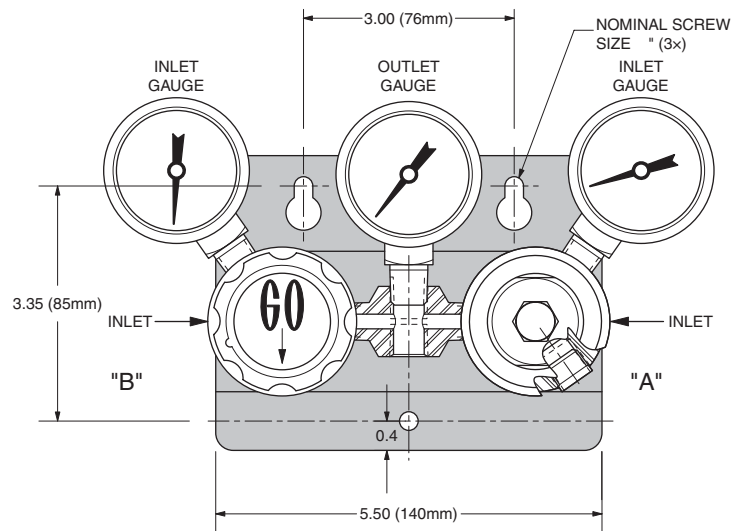
Maximum Temperature & Operating Inlet Pressures

| SEAT MATERIAL | MAXIMUM TEMPERATURE | MAXIMUM OPERATING INLET PRESSURE |
|----------------------------|---------------------|----------------------------------|
| Tefzel® | 150° F (66° C) | @ 3600 psig (24.82 MPa) |
| High density Teflon® | 150° F (66° C) | @ 3600 psig (24.82 MPa) |
| PCTFE (formerly Kel-F® 81) | 175° F (80° C) | @ 6000 psig (41.37 MPa) |
| Polyimide | 500° F (260° C) | @ 3600 psig (24.82 MPa) |
| Polyimide | 175° F (80° C) | @ 6000 psig (41.37 MPa) |
| PEEK™ | 500° F (260° C) | @ 3600 psig (24.82 MPa) |
| PEEK™ | 175° F (80° C) | @ 6000 psig (41.37 MPa) |

NOTE: The choices above represent an abbreviated list of the more commonly ordered options. For a complete listing of all available options, please see the Selection Wizard on the GO website at www.goreg.com or contact the factory.

Outline & Mounting Dimensions

Weight = 5.2 lbs (2.36 kg)



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 Teflon® and Tefzel® are registered trademarks of the DuPont Company.
 Kel-F® is a registered trademark of 3M Company.
 PEEK™ is a trademark of Victrex PLC.

COM-2B Series

Crossover Manifold Regulator System



The COM-2B Series crossover manifold system uses two PR-1-type stainless steel regulators (PR-2-type brass, optional) built in a single body functioning as the changeover regulators with the common outlet port connected to a single line regulator to provide constant unchanging supply pressure unaffected by supply source depletion. All are mounted on a bracket complete with gauges. As the primary supply source depletes and the operating outlet pressure of the primary regulator falls below the preset changeover pressure of the secondary regulator, the secondary regulator takes over. Once this occurs, the primary regulator can be manually adjusted 1/8-turn counterclockwise, the secondary regulator is now the primary and the depleted supply source can be replaced.

Features & Specifications

- Bracket-mounted for easy installation
- Allows changing of cylinders during operation*
- Available in stainless steel, brass and Monel®
- Steady outlet pressure during cylinder depletion
- 0.01% pressure control accuracy
- Inlet pressures to 6000 psig
- Outlet pressure ranges: 0–10 psig, 0–25 psig, 0–50 psig, 0–100 psig or 0–250 psig
- Changeover pressures: 15–250 psig
- Cv flow coefficients: 0.025, 0.06, 0.2, 0.5
- All connections: 1/4" FNPT
- 20 micron inlet filters
- 316L stainless steel construction
- Teflon®-lined stainless steel diaphragm
- Operating temperatures: –40° F to +500° F (–40° C to +260° C)

* Installation of shut off valves in each inlet port is recommended for complete isolation during change out of cylinders.

GO Regulator

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www.goreg.com • sales@goreg.com

pressure regulators

COM-2B Series

How to Order

Standard items in bold

COM2 - 1 A 3 B J 1 1 C L

BODY MATERIAL

- 1** 316L stainless steel
- 2 Brass

SEAT MATERIAL

- A** Tefzel®
- B** CF Teflon®
- C** Polyimide
- H** PCTFE (formerly Kel-F® 81)
- I** High density Teflon®
- Q** PEEK™

FLOW COEFFICIENT (Cv)

- 3** 0.06
- 5 0.2
- C** 0.025
- H** 0.5

PANEL TYPE

- B** Bracket

COMBO REGULATOR SET POINT

- J** 150 psig over output regulator range

COMBO REGULATOR PRESSURE GAUGES

- 1** With gauges
- 2 Less gauges
- 3 Customer-supplied

OUTPUT REGULATOR PORT CONFIGURATION

- A** A style
- B** B style
- C** C style
- D** D style
- E** E style
- G** G style
- L** L style
- Q** Q style

OUTPUT REGULATOR OUTPUT RANGE

- C** 0-10 psig
- D** 0-25 psig
- E** 0-50 psig
- G** 0-100 psig
- I** 0-250 psig

OUTPUT REGULATOR PRESSURE GAUGES

- 1** With gauges
- 2 Less gauges
- 3 Customer-supplied

For a full list of options, visit the selection matrix for this product on www.gore.com

NOTE: The choices above represent an abbreviated list of the more commonly ordered options. For a complete listing of all available options, please see the Selection Wizard on the GO website at www.gore.com or contact the factory.

Maximum Temperature & Operating Inlet Pressures

Stainless steel

| SEAT MATERIAL | MAXIMUM TEMPERATURE* | MAXIMUM OPERATING INLET PRESSURE |
|----------------------------|----------------------|----------------------------------|
| Tefzel® | 150° F (66° C) | @ 3600 psig (24.82 MPa) |
| High density Teflon® | 150° F (66° C) | @ 3600 psig (24.82 MPa) |
| PCTFE (formerly Kel-F® 81) | 175° F (80° C) | @ 6000 psig (41.37 MPa) |
| Polyimide | 500° F (260° C) | @ 3600 psig (24.82 MPa) |
| Polyimide | 175° F (80° C) | @ 6000 psig (41.37 MPa) |
| PEEK™ | 500° F (260° C) | @ 3600 psig (24.82 MPa) |
| PEEK™ | 175° F (80° C) | @ 6000 psig (41.37 MPa) |

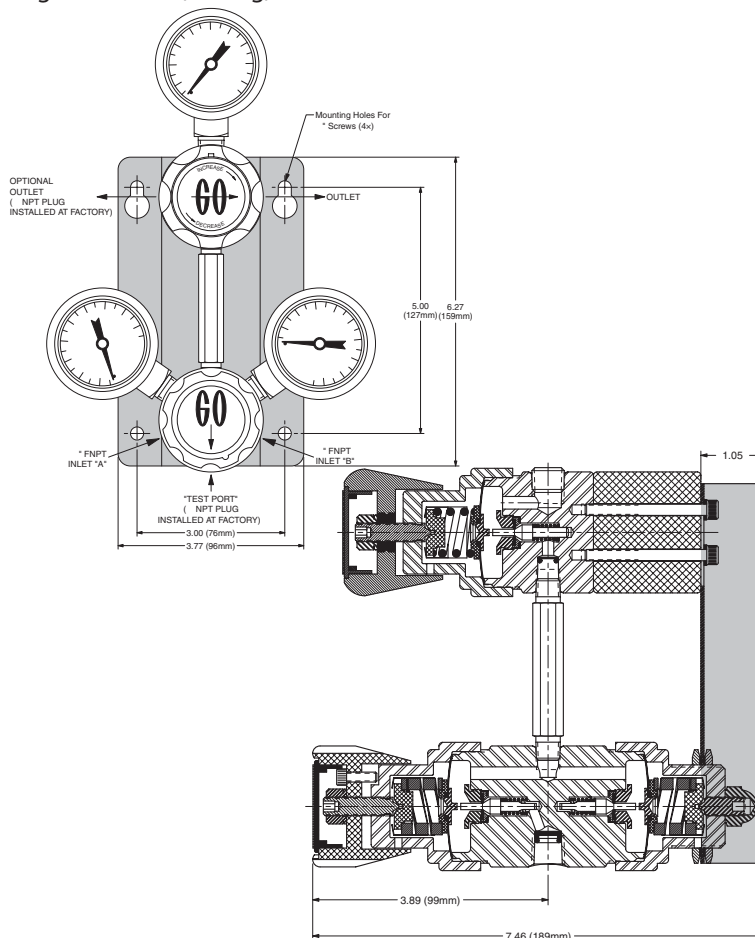
* Temperatures in excess of 175° F (80° C) require the use of a metal knob or the tamper-proof option.

Brass

| SEAT MATERIAL | MAXIMUM TEMPERATURE | MAXIMUM OPERATING INLET PRESSURE |
|----------------------------|---------------------|----------------------------------|
| Tefzel® | 150° F (66° C) | @ 3600 psig (24.82 MPa) |
| High density Teflon® | 150° F (66° C) | @ 3600 psig (24.82 MPa) |
| PCTFE (formerly Kel-F® 81) | 175° F (80° C) | @ 6000 psig (41.37 MPa) |
| Polyimide | 500° F (260° C) | @ 3600 psig (24.82 MPa) |
| Polyimide | 175° F (80° C) | @ 6000 psig (41.37 MPa) |
| PEEK™ | 500° F (260° C) | @ 3600 psig (24.82 MPa) |
| PEEK™ | 175° F (80° C) | @ 6000 psig (41.37 MPa) |

Outline & Mounting Dimensions

Weight = 7.3 lbs (3.31 kg)



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 Kel-F® is a registered trademark of 3M Company.
 PEEK™ is a trademark of Victrex PLC.

COM-2P Series

Crossover Manifold Regulator System



The COM-2P employs two discrete single stage PR-1-type regulators built into a single body. These regulators serve as the primary and secondary changeover regulators with the common outlet port connected to a single PR-1 Series regulator. This allows for the non-stop delivery of gas from bottles with only a 0.01% change in outlet pressure as the inlet pressure varies. The hardware comes mounted in an attractive 300 series stainless steel panel that is suitable for surface mounting near the bottles. Labels are permanently silk-screened on the face of the panel for easy identification of process ports and gauges. The unit comes complete with pressure gauges and shutoff valves. Suitable for gases and liquids.

Features & Specifications

- Complete panel system including gauges and vent valves for easy installation
- Allows changing of cylinders during operation*
- Available in both stainless steel and brass (other materials also available)
- Steady outlet pressure during cylinder depletion
- 0.01% pressure control accuracy
- Inlet pressures to 6000 psig
- Outlet pressure ranges 0–10 psig, 0–25 psig, 0–50 psig, 0–100 psig or 0–250 psig
- Changeover pressures: 15-250 psig
- Cv flow coefficients 0.025, 0.06, 0.2, 0.5
- All connections: 1/4" FNPT
- 20 micron sintered inlet filters
- Teflon®-lined stainless steel diaphragm
- Operating temperatures: –40° F to +500° F (–40° C to +260° C)

* Installation of shut off valves in each inlet port is recommended for complete isolation during change out of cylinders.

GO Regulator

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pressure regulators

COM-2P Series

How to Order

Standard items in bold

COM2 - 1 A P P J 1 1 C B

BODY MATERIAL

- 1** 316L stainless steel
- 2 Brass
- 4 Monel®

SEAT MATERIAL

- A** Tefzel®
- B** CF Teflon®
- C** Polyimide
- H** PCTFE (formerly Kel-F® 81)
- I** High density Teflon®
- Q** PEEK™

FLOW COEFFICIENT (Cv)

- 3** 0.06
- 5** 0.2
- C** 0.025
- H** 0.5

PANEL TYPE

- P** Deluxe panel

OUTPUT REGULATOR PORT CONFIGURATION

- B** B style
- L** L style
- E** E style

OUTPUT REGULATOR OUTPUT RANGE

- C** 0–10 psig
- D** 0–25 psig
- E** 0–50 psig
- G** 0–100 psig
- I** 0–250 psig

OUTPUT REGULATOR PRESSURE GAUGES

- 1** With gauges
- 2** Less gauges
- 3** Customer-supplied

COMBO REGULATOR PRESSURE GAUGES

- 1** With gauges
- 2** Less gauges
- 3** Customer-supplied

COMBO REGULATOR SET POINT

- J** 150 psig over output regulator range

For a full list of options, visit the selection matrix for this product on www.goreg.com

Maximum Temperature & Operating Inlet Pressures

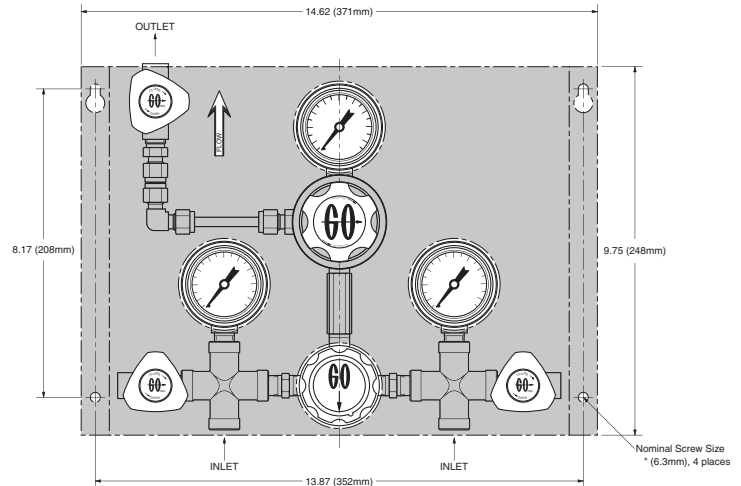
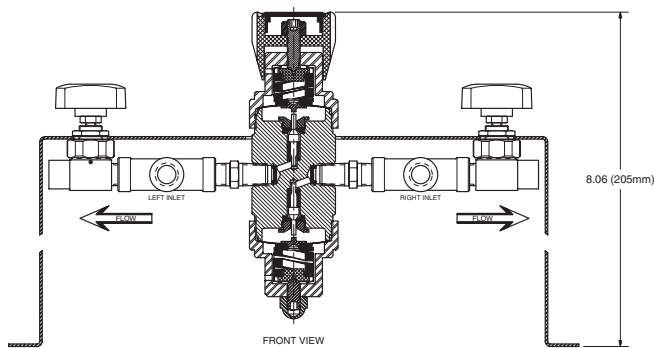
| SEAT MATERIAL | MAXIMUM TEMPERATURE* | MAXIMUM OPERATING INLET PRESSURE |
|----------------------------|----------------------|----------------------------------|
| Tefzel® | 150° F (66° C) | @ 3600 psig (24.82 MPa) |
| High density Teflon® | 150° F (66° C) | @ 3600 psig (24.82 MPa) |
| PCTFE (formerly Kel-F® 81) | 175° F (80° C) | @ 6000 psig (41.37 MPa) |
| Polyimide | 500° F (260° C) | @ 3600 psig (24.82 MPa) |
| Polyimide | 175° F (80° C) | @ 6000 psig (41.37 MPa) |
| PEEK™ | 500° F (260° C) | @ 3600 psig (24.82 MPa) |
| PEEK™ | 175° F (80° C) | @ 6000 psig (41.37 MPa) |

* Temperatures in excess of 175° F (80° C) require the use of a metal knob or the tamper-proof option.

NOTE: The choices above represent an abbreviated list of the more commonly ordered options. For a complete listing of all available options, please see the Selection Wizard on the GO website at www.goreg.com or contact the factory.

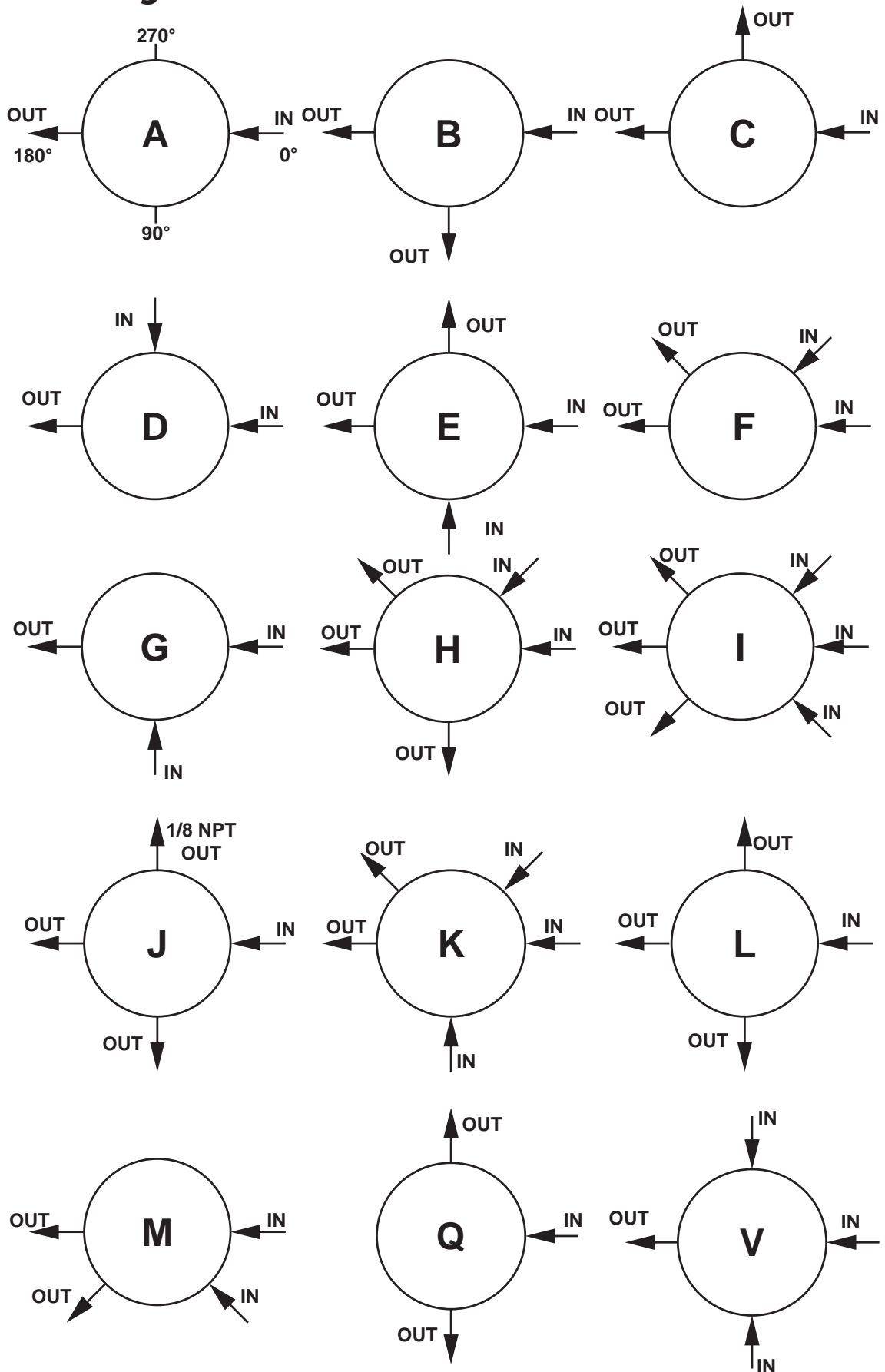
Outline & Mounting Dimensions

Weight = 13.4 lbs (6.09 kg)

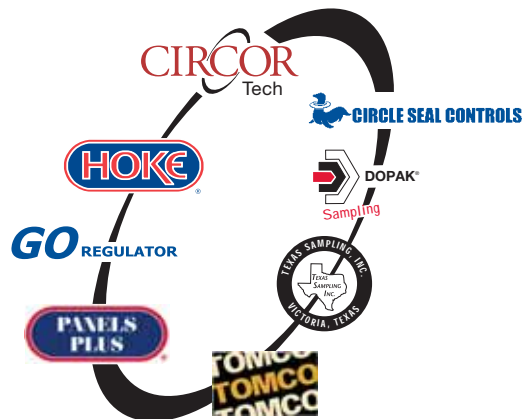


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 Kel-F® is a registered trademark of 3M Company.
 PEEK™ is a trademark of Victrex PLC.

Porting Configurations for Cylinder Regulators



LOCATION OF PORTS FROM TOP VIEW



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CIRCOR Instrumentation Technologies

CIRCOR Instrumentation Technologies (CIT) is a product group of CIRCOR International (NYSE: CIR), specializing in fluid process control solutions with orifice sizes typically up to 1". Our main product lines include ball, needle, packless, diaphragm, solenoid, and metering valves, pressure regulators, quick couplers, Gyrolok® compression tube fittings, and fully integrated sampling systems.

CIT markets primarily to the petrochemical, refining, power generation, food and beverage, semiconductor, and pharmaceutical industries, and to OEM's. CIT separates itself from the competition by offering highly engineered components manufactured to exacting standards and a variety of custom options.