

# Heavy Duty Gas Line Regulator 1780 Series

## Application

The 1780 Series Regulators are designed for final line pressure regulation on gas distribution systems. They are suitable for a variety of gases in medical or industrial applications. The 1780 Series Regulators have a balanced seat, are constructed with oxygen compatible materials, and have the same valve design, brass body, and internal parts as the premium BR-1780 Series. Flow performance is equal to the BR-1780 Series.

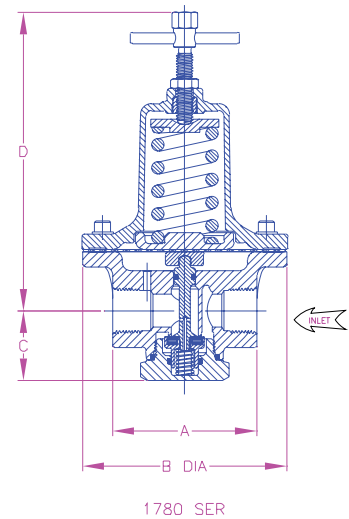
## Features

- Maintains a steady downstream pressure across a range of inlet pressures commonly provided by a cryogenic bulk tank.
- Large seat and diaphragm areas provide high capacity with sensitive control of delivery pressure with low falloff.
- Two 1/4" FNPT delivery pressure gauge ports are located (plugged) on each side of the valve.
- Two bonnet drain/vent holes to allow for different mounting orientation.
- T-handle adjusting screw.
- Maximum inlet pressure is 500 psig (34 Bar).
- Available in four delivery pressure ranges (A-D).
- Temperature range: -40° F to +165° F. (-40°C to +74°C)
- Cleaned per CGA G-4.1 for oxygen service.
- 100% Factory Tested

## Materials

Body ..... Forged Brass  
 Bonnet ..... Nickel Plated Aluminum  
 Diaphragm ..... Nitrile with PTFE liner  
 Springs and Fastners ..... Stainless Steel  
 Other valve parts ..... Brass  
 Seat Disc & O-Rings ..... Viton is standard

**For Carbon Dioxide or Nitrous Oxide service:  
 Specify EPDM material for seat disc and O-rings, add  
 "E" to end of part number.**



## Ordering Information

Part Number	Delivery Pressure Range	Pressure Gauge*		Inlet & Outlet (F.N.P.T.)	Dimensions				C <sub>v</sub>
		Range (PSI)	P/N		"A"	"B"	"C"	"D"	
1784A	5-55 psig	1-100	1286	1/2"	2.82"	3.62"	1.38"	5.47"	3.1
1784B	40-110 psig	1-200	S1679						
1784C	100-200 psig	1-400	15578						
1784D	175-300 psig								
1786A	5-55 psig	1-100	1286	3/4"	3.31"	4.69"	1.60"	6.84"	4.8
1786B	40-110 psig	1-200	S1679						
1786C	100-200 psig	1-400	15578						
1786D	175-275 psig								
1788A	5-55 psig	1-100	1286	1"	3.31"	4.69"	1.60"	6.84"	5.5
1788B	40-110 psig	1-200	S1679						
1788C	100-200 psig	1-400	15578						
1788D	175-275 psig								

**\*Regulator sold without gauge. Order gauge separately.**