

# CV9 SERIES

0 - 200 PSIG



## MINI-CRYOGENIC VACUUM JACKETED VALVES



### Features

- Vacuum Jacketed (Insulated with Four Layers of Radiation Shielding)
- Bubble Tight Shutoff
- High Thermal Efficiency
- Compact Size
- Economical
- Convuluted Bellows Stem
- Dual O-Ring Spring Loaded Packing Assembly
- Non-galling Brass Metering Handle
- Easy Inline Maintenance
- Socket Weld Ends
- Dynamic Loaded Packing

### Technical Data

#### Operating Ranges

Temperature .....-456°F to +150°F  
-283°C to +66°C

Max. Operating Pressure 200 PSIG

Heat Leak .....2.5 BTU/Hr to  
20°K (.73 watts)

#### Materials of Construction

All Major Structural Components are 300 Series Stainless Steel.

Packing .....Viton® O-Rings

Seat Seal .....Kel-F

Stem .....Stainless Steel Bellows

#### Tests

External Leakage .....Mass spec. to  
1x10<sup>-9</sup>scc GHe/sec

Seat Leakage .....Bubble Tight to 150 PSIG

Proof Pressure .....225 PSIG

#### Valve Size

1/2" Standard

1/4" & 3/8" Optional with adapters

### Applications

- Helium Siphons
- Point of Use Valve
- Laboratory Usage

### Options

- Cold Box Cuff
- Pneumatic Actuators
- Positioners
- Linear & Equal % Flow Plugs

# CV9 SERIES

0 to 200 PSIG

## How To Order

CV9 - 084 - C WTR M- NJ

### CRYOGENIC VALVE

CV9 Series

### VALVE SIZE

084 - 1/2"

### CLEANING

- O - Oxygen (per 216-2 specification)
- C - Standard

### CONFIGURATION

- WTR - Tube Size, 90° Angle Pattern
- WTG - Tube Size, Globe
- WTY - Tube Size, Y Pattern (1/4" tube only)

### SPECIAL ADD ONS

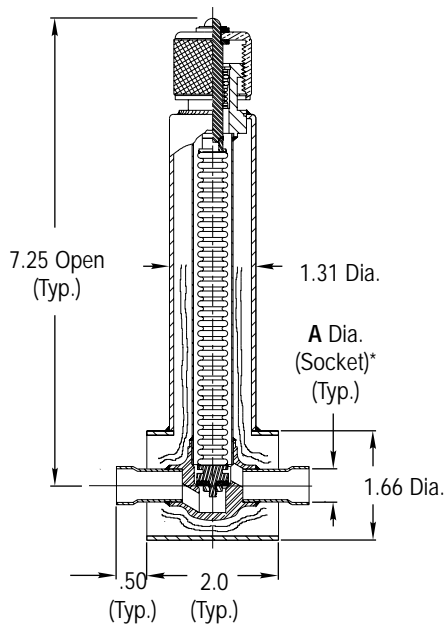
- NJ - Non-Jacketed
- CB - Cold Box Cuff
- TW - Top Works Kit Only with Stem and Seals

### TOP WORKS

- M - Manual
- A - Automatic Valve without Actuator
- B - Automatic Valve with AutoSeal
- E - Automatic Valve with AutoSeal and Control Tip - EQ%
- L - Automatic Valve with AutoSeal and Control Tip - Linear

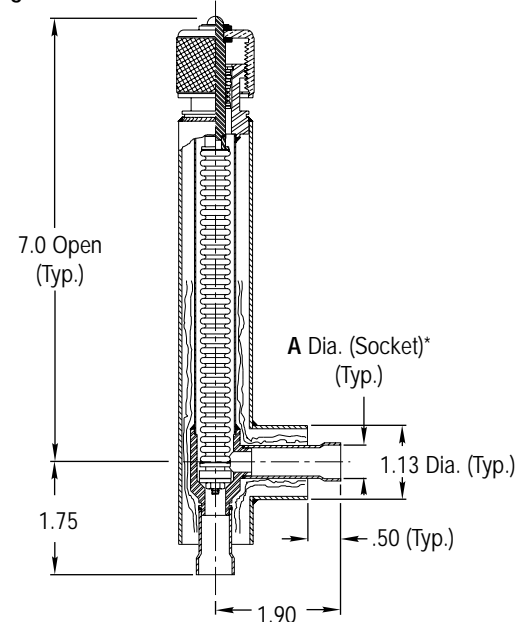
## Dimensions & Characteristics

Globe Pattern



Tube Size	Wt.	C <sub>V</sub>	A Dia. (Socket)
1/4"	12 oz.	.7	.255*
3/8"	12 oz.	1.8	.380*
1/2"	12 oz.	2.3	.505

Angle Pattern



Tube Size	Wt.	C <sub>V</sub>	A Dia. (Socket)
1/4"	12 oz.	.7	.255*
3/8"	12 oz.	1.6	.380*
1/2"	12 oz.	1.6	.505

\* Adapters supplied for 1/4" & 3/8" sizes.