

## Eliminate Venting Emissions from Double Acting Control Instrumentation When Control Valve is Full Open and Full Closed

### Description:

The NVD No-Vent Device eliminates venting emissions from VRG Controls double-acting control instrumentation when the corresponding control valve is at full-open and full-closed positions. This is ideal for Monitor and Standby Regulators the normally remain in full-open or full-closed positions. The NVD eliminates emissions at both ends of control valve travel without adjustment. The NVD is the primary choice to eliminate emissions for all VRG Controls double-acting instrumentation. The NVD is compatible with all VRG Controls double acting control instrumentation.

### Features:

- Renders Monitors, Standby, and Relief Control Valves Non-Venting
- Eliminating Constant Vent Emissions and Improve Safety
- No Calibration or Adjustment Required
- Simple & Reliable Design Has Only One Moving Part
- Modular Design Minimizes Tubing Connections
- Integral Gage & Output Ports Minimize Fittings
- Recommended as Standard Issue for ALL VRG Controls Double-Acting Control Instrumentation when Vent to Atmosphere
- Easy Retrofit to All VPC Double Acting Control Instrumentation
- Exceeds EPA Ruling, EPA-HQ-OAR-2010-0505, requiring “constant bleed controllers” in the Oil and Natural gas industry must meet <6 SCFH bleed rate by October 2013.

### Models Available:

- NVD-80
- NVD-100
- NVD-150

### Compatible VRG Instrumentation:

- VPC-DA-BV Series Valve Pilot Controllers
- VPC-DA-SN Series Valve Pilot Controllers
- VGP-DA-BV Series Valve Gas Positioners
- VGP-DA-SN Series Valve Gas Positioners



**Figure 1.0 – NVD Series No-Vent Device**

The No-Vent Device eliminates venting for all VRG Controls double-acting control instrumentation when the control valve is at full-open and full-closed positions. The NVD features reliable simplicity without the need for calibration or adjustment. The modular design format integrates seamlessly with all VRG Controls double acting control instrumentation.

**Table 1.0 – NVD Series Model Information**

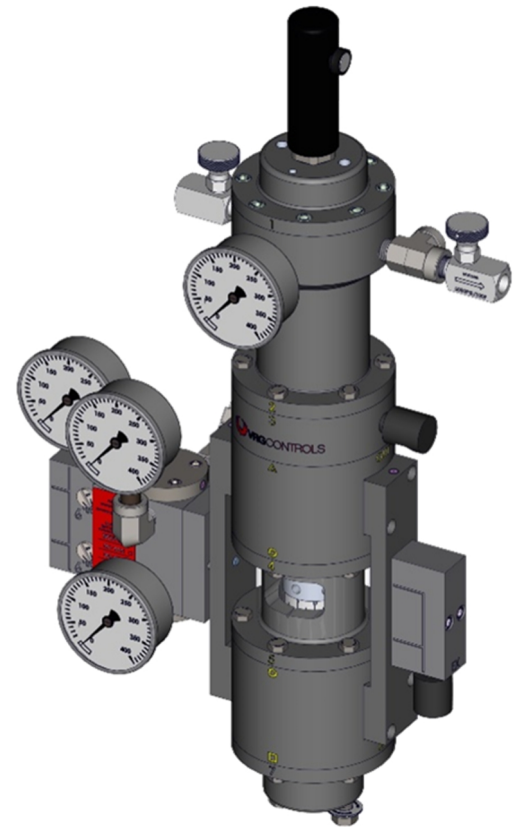
NVD Model	PSupply (Min)	PSupply (Max)	Repair Kit No.
<b>NVD-80</b>	80 psig (552 kPa)	100 psig (689 kPa)	RK-0300
<b>NVD-100</b>	90 psig (621 kPa)	125 psig (862 kPa)	RK-0300
<b>NVD-150</b>	125 psig (862 kPa)	150 psig (1034 kPa)	RK-0300

**Notes:**

1. When NVD No-Vent Device is utilized in conjunction with Bleed to Pressure System,  $P_{Discharge}$  is restricted to less than 60 psig (414 kPa).

**Table 2.0 – NVD Series Technical Specifications**

Technical Specifications	
<b>Supply Gas Quality</b>	Dry, Filtered @ 10 $\mu$ Natural Gas or Air
<b>P<sub>Supply</sub> Max</b>	Reference Table 1.0
<b>P<sub>Discharge</sub> Max</b>	60 psig (414 kPa)
<b>Temperature Range</b>	-20°F to +160°F (-29°C to +71°C)
<b>Weight</b>	2.0 lbs. (0.9 kg)
<b>Dimensions</b>	2.75 in x 3.75 in x 2 in (70 mm x 95 mm x 50 mm)
<b>Manifold Ports</b>	¼ O-Ring Seal
<b>Connection Ports</b>	¼ FNPT
<b>Installation Orientation</b>	Vertical Recommended
<b>Flow Capacity (C<sub>v</sub>)</b>	0.990
<b>External Parts</b>	VRG Military Grade Aluminum Alloy with "Stealth System" Corrosion Protection 304 SS – Optional Construction
<b>Internal Parts</b>	VRG Military Grade Aluminum Alloy with "Stealth System" Corrosion Protection
<b>Hardware</b>	316 SS
<b>O-Rings</b>	Buna-N
<b>U-Cup Seals</b>	Buna-N
<b>Springs</b>	Painted Alloy Steel



**Figure 2.0 – NVD Installed on VPC Valve Pilot Controller**

NVD No-Vent Device is shown installed on VPC-DA-BV Valve Pilot Controller. The NVD modular format easily installs on any VRG Controls double acting instrumentation eliminating vent gas when the control valve is at full-open and full-closed positions. The VRG NVD also features integral gage & connection ports to minimize fitting and simplify installation.

**Notes:**

1. When NVD No-Vent Device is utilized in conjunction with Bleed to Pressure System,  $P_{Discharge}$  is restricted to less than 60 psig (414 kPa).