



# IntelliSwitch Systems

# 539 SERIES

## IntelliSwitch™

The 539 Series IntelliSwitch is CONCOA's original fully-automatic computer controlled Universal Gas Management System that can provide continuous supply of gas from either cryogenic liquid cylinders or high pressure gas cylinders, or any combination of both. These systems are ideal for use with high purity and ultra high purity gases for laboratory gas chromatography, gas chromatography mass spectrometry, inductively coupled plasma or inductively coupled plasma mass spectrometer support gases as well as for use with Carbon Dioxide or Nitrogen for cell culture incubators. The proprietary software ensures optimal use and savings especially from cryogenic cylinders sources and can greatly reduce or eliminate venting and residual gas return.



### Typical Applications

- High purity non-corrosive non-flammable gas supply
- Gas chromatography and mass spec carrier and support gases
- Inductively coupled plasma mass spectrometer (ICP-mass spec) continuous gas supply
- Incubator Carbon Dioxide and Nitrogen gas supply
- Biotech, pharmaceutical and forensic gas systems
- Microbulk changeover supply
- Central gas supply system for laboratory, research or process plants

### Features

- Microprocessor Control**  
Fully automatic priority assignment
- Field Adjustable Parameters**  
Enables process flexibility
- On-Site Source Selection**  
Liquid cylinder or high-pressure service
- Low Loss Technology**  
Reduces residual return
- Electronic Economizer**  
Eliminates vent loss from 230 PSIG (15 BAR), 350 PSIG (24 BAR), or 500 PSIG (34 BAR) relief liquid cylinders
- Process Gas or Air Actuated Pilot Valves**  
Simple installation
- RS 232 Communications**  
Provides remote monitoring of supply
- NEMA 12 Enclosure**  
Powder coated for indoor use only

### Materials

- Regulator and Valve Bodies**  
Brass barstock
- Valve Stems**  
316L stainless steel
- Valve Seats**  
PCTFE
- Seals**  
PTFE, PCTFE and Viton®
- Enclosure**  
NEMA 12 powder-coated steel

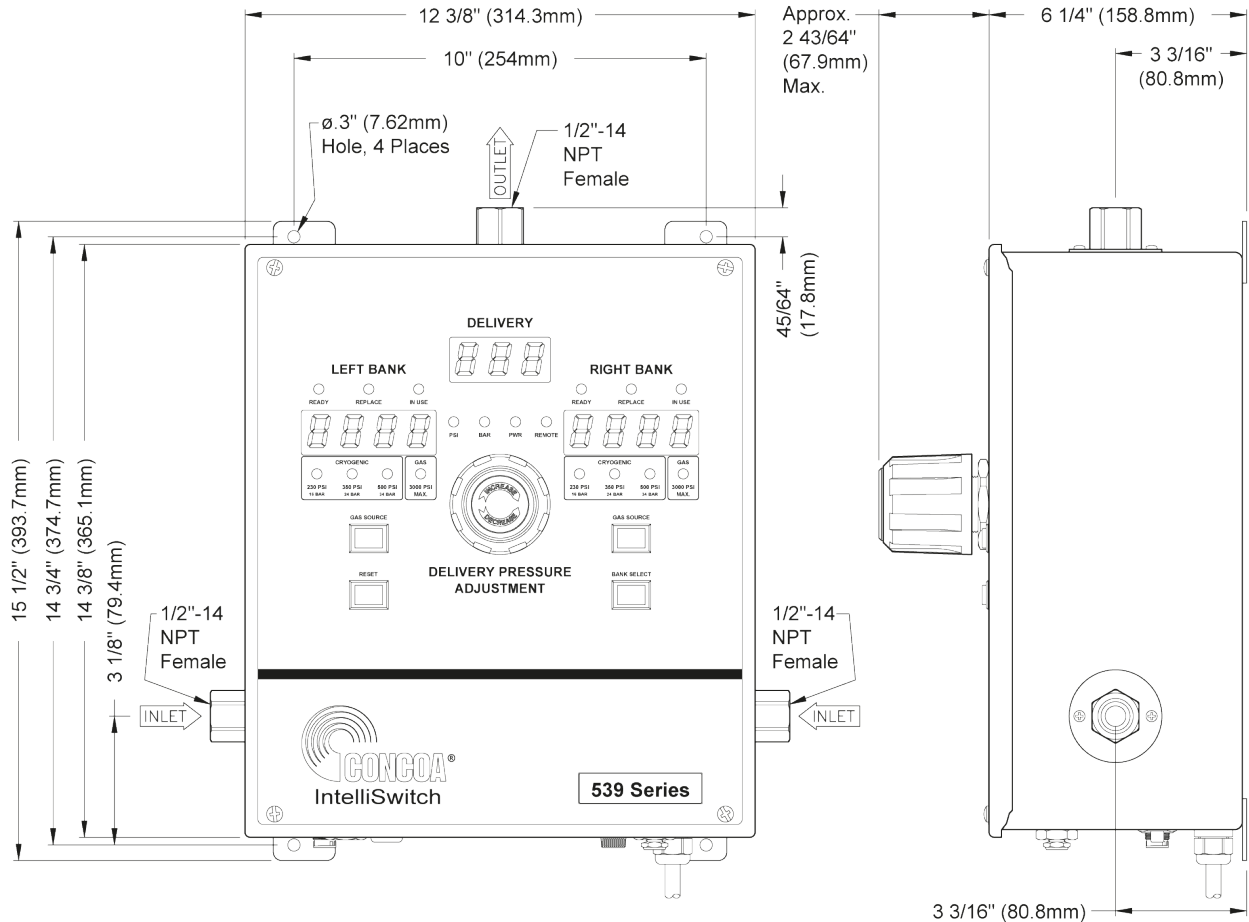
### Specifications

- Power Requirements**  
110 or 220 VAC
- Maximum Inlet Pressure**  
3000 PSIG (210 BAR)
- Temperature Range**  
0°F to 140°F (-18°C to 60°C)
- Flow Capacity**  
Cv = 1.0
- Filter**  
40 micron
- Inlet Connection**  
1/2" FPT
- Outlet Connection**  
1/2" FPT
- Weight**  
67 lbs. (30.4 kg)

# IntelliSwitch Systems



## Installation Dimensions



DISTRIBUTION SYSTEMS

## Ordering Information

539	A	B	C	D	-XX	-CON
Series 539	Outlet Pressure	Right Side Connection	Left Side Connection	Assembly	Assembly	Hose
	<b>2:</b> 0-50 PSIG (0-1 BAR)	<b>0:</b> 1/2" FPT	<b>0:</b> 1/2" FPT	<b>2:</b> 110 VAC	<b>-01:</b> Standard	Please specify inlet connection (if applicable)
	<b>3:</b> 0-100 PSIG (0-7 BAR)	<b>1:</b> Diaphragm valve with 36" (900mm) stainless flexible hose	<b>1:</b> Diaphragm valve with 36" (900mm) stainless flexible hose	<b>3:</b> 220 VAC	<b>-0A:</b> Tamper resistant option	CGA DIN 477 BS 341 and others available.
	<b>4:</b> 0-150 PSIG (0-10 BAR)	<b>2:</b> Diaphragm valve with 72" (1800mm) stainless flexible hose	<b>2:</b> Diaphragm valve with 72" (1800mm) stainless flexible hose			
	<b>5:</b> 0-200 PSIG (0-14 BAR)	<b>3:</b> Manifold connector*	<b>3:</b> Manifold connector*			
		*See pages 70-71 for manifold ordering information				

## Related Options

Option	Order Number	Description
Remote alarm	Advantium Series	Provides audible and visible notification of a depleted supply bank to a remote location (See pgs. 68-71)
Vent manifold kit	52L Series	Wall-mounted manifold designed to equalize liquid cylinder head pressure
Switchover station	518 1625	Safely mount and secure any switchover and 2 cylinders
AutoSwitch floor stand	830 7439	Support IntelliSwitch enclosure
Manifold floor stand	830 7437	Supports two standard length 12"(304.8mm) manifold extensions installed consecutively