

MiniLabo 2

Regulators - Pressure Reducing

DCATLABO1209XEN2

Specifications

For other materials or modifications, please consult TESCOM.

FLUID MEDIA

Non-corrosive / corrosive gases and mixtures up to 6.0 (99.9999 Vol%) purity

OPERATING PARAMETERS

Pressure rating per criteria of ANSI/ASME B31.3

Maximum Inlet Pressure

580 psig / 40.0 bar

Outlet Pressure Ranges

22, 58, 145 psig / 1.5, 4.0, 10.0 bar

Leak Rate

10⁻⁸ mbar l/s He

Operating Temperature

-4°F to 158°F / -20°C to 70°C

Nominal Flow Rate

100 LPM based on Nitrogen

MEDIA CONTACT MATERIALS

Body

316L Stainless Steel or Chrome-plated Brass

Diaphragm

Elgiloy® or Hastelloy®

OTHERS

Porting Inlet or Outlet

G 1/4" Female

Valve Outlet G 1/8" Female

Optional with Adapter 1/4" NPT

Inlet or Outlet Connections

See Part Number Selector

Mounting

Wall Mounting Plate 75x100 mm Aluminum Grey/White

Cleaning

Cleaned for Oxygen Service

Weight (approximate)

Brass: 1.5 lbs / 0.7 kg

Stainless Steel: 2.6 lbs / 1.2 kg

Hastelloy® is a registered trademark of Haynes International, Inc.

Elgiloy® is a registered trademark of Elgiloy Corp.



TESCOM MiniLabo 2 Point-of-Use regulator for non-corrosive/corrosive gases and mixtures up to 6.0 (99.9999 Vol %) purity with a compact, modular and ergonomic design.

Applications

- Reduction of line pressure to working pressure
- Laboratory, R&D and analyzer applications
- Suitable for ECD (Electronic Capture Detector) applications

Features and Benefits

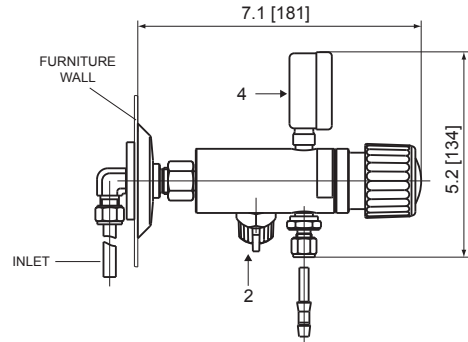
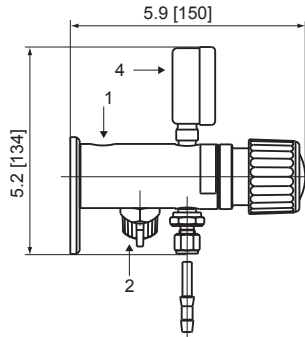
- Clear indication of open/closed position (90°) of shut-off valve
- Minimal space for installation required because pressure regulator and shut-off valve are integrated in one body
- Reduced internal volume, short purging times
- Modular design featuring a pressure regulator, gauge, 1/4 turn shut-off valve and metering valve
- Easy installation due to wall mounting plate

MiniLabo 2 Regulator Horizontal Drawings

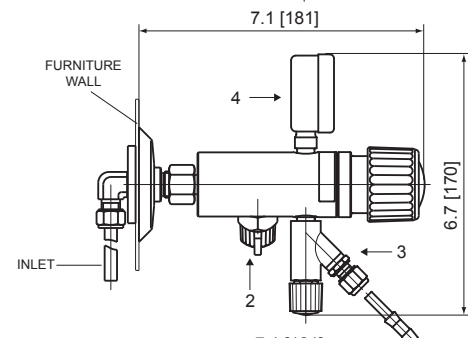
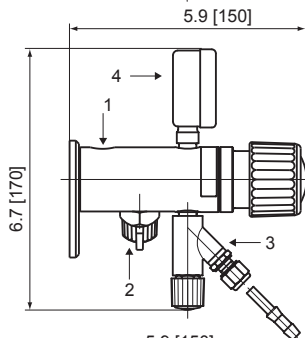
Wall Mounted Version
(with wall plate)

Furniture Installation Version

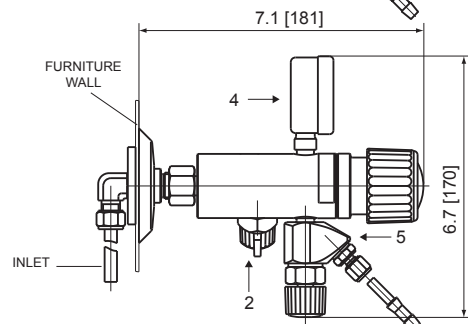
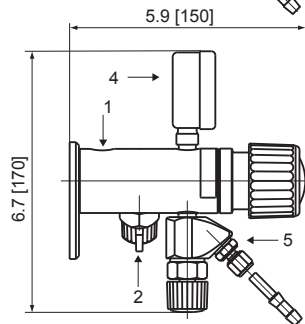
MiniLabo 2 horizontal
with shut-off valve



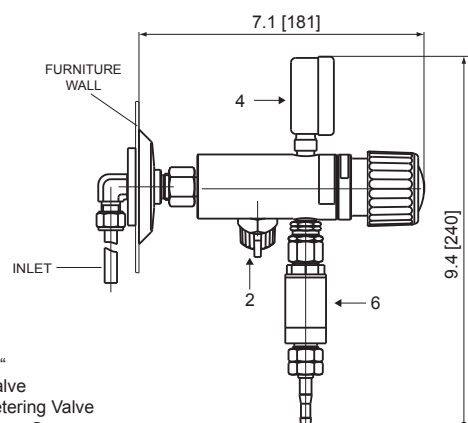
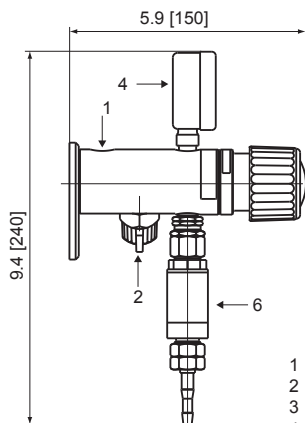
MiniLabo 2 horizontal
with shut-off valve
and needle metering valve



MiniLabo 2 horizontal
with shut-off valve
and diaphragm metering valve



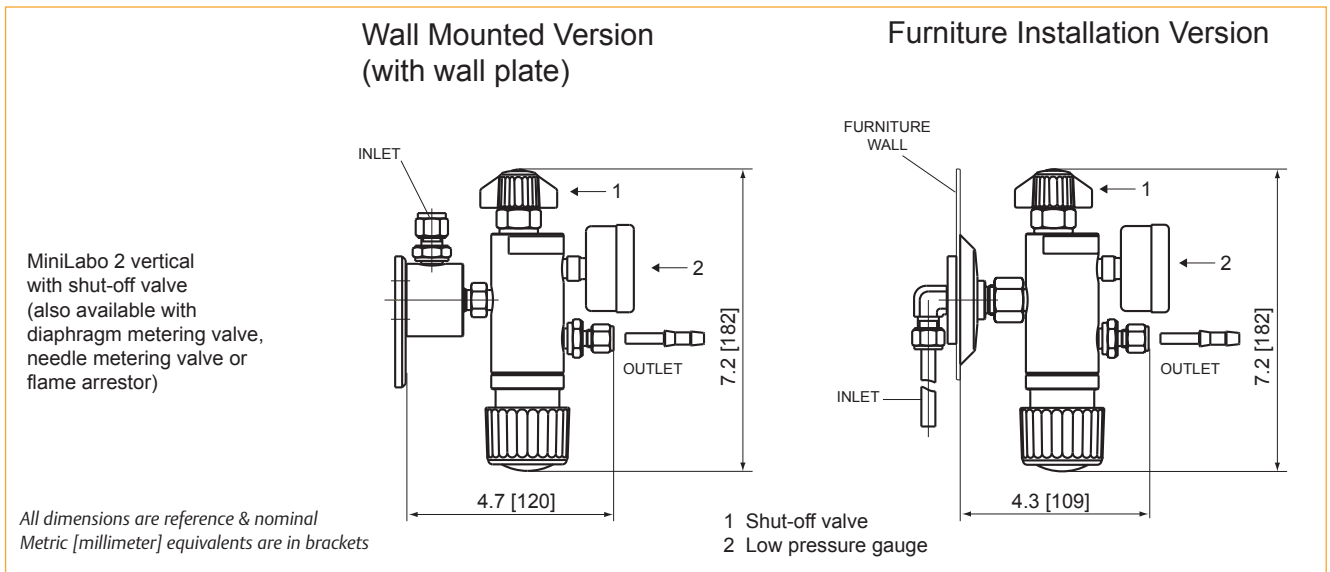
MiniLabo 2 horizontal
with shut-off valve
and flame arrestor



- 1 Plug G 1/4"
- 2 Shut-off Valve
- 3 Needle Metering Valve
- 4 Low Pressure Gauge
- 5 Metal Diaphragm Metering Valve
- 6 Flame Arrestor

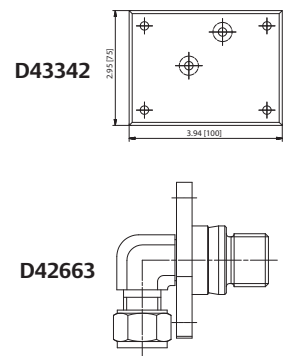
All dimensions are reference & nominal
Metric [millimeter] equivalents are in brackets

MiniLabo 2 Regulator Vertical Drawings



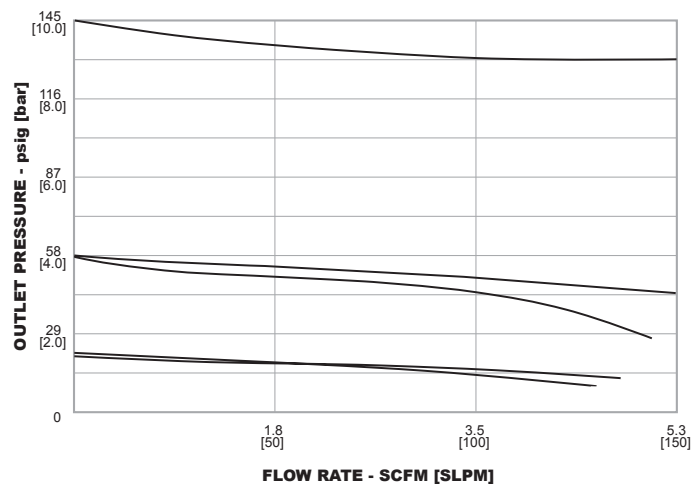
Accessories for Wall Mounting

PART NUMBER	DESCRIPTION
D43342	Wall mounting plate, grey white, thickness 6 mm
D43371	Kit countersunk screws + dowels for wall plate
D42663-00-X	Wall plate, Brass, including elbow compression fitting 6, 8, or 10 mm
D42663-22-X	Wall plate, Stainless Steel, including elbow compression fitting 6, 8, or 10 mm
V09166	Wall plate cover
D42572	Gas label (please, state gas type)



MiniLabo 2 Regulator Flow Chart

For more information on how to read flow curves, please refer to the Flow Curves and Calculations document (debul2007x012) in the TESCOM catalog or on www.tescom.com.



MiniLabo 2 Regulator Part Number Selector

Repair Kits, Accessories & Modifications may be available for this product. Please contact TESCOM for more information.

Example for selecting a part number:

D43483		AR		03		D		1																				
BASIC SERIES	TYPE OF GAS			OUTLET CONNECTION			INLET CONNECTION			PRESSURE RANGE																		
	AO - Oxygen	AR - Other gases	AK - Corrosive gases	20 - Ammonia*	22 - Acetylene*	23 - Carbon monoxide	00 - None (G 1/4" internal)	02 - Compression Fitting ø 1/8"	03 - Compression Fitting ø 6 mm	04 - Compression Fitting ø 1/4"	05 - Compression Fitting ø 6 mm with hose connection ø 6 mm	A - G 1/4" female top	B - G 3/8" ball cone rear	C - G 3/8" metal cone fitting top	D - G 3/8" ball cone bottom	E - G 1/4" female top with wall mounting plate	F - Compression fitting 8 mm with wall mounting plate	G - Compression fitting 10 mm with wall mounting plate	H - G 1/4" female rear	J - Compression fitting 6 mm with wall mounting plate	K - Compression fitting 12 mm with wall mounting plate	1 - 21.8 psig / 1.5 bar	2 - 58 psig / 4 bar not for Acetylene	3 - 145 psig / 10 bar not for Acetylene	4 - 43.5 psig / 3 bar not for Acetylene	5 - 72.5 psig / 5 bar not for Acetylene and Hydrogene		
MiniLabo 2 Horizontal Brass																												
D43372	Brass	X	X		X	X		X	X		X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
D43373	Brass, needle valve	X	X		X	X		X	X		X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
D43374	Brass, metal diaphragm metering valve	X	X		X	X		X	X		X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
D43375	Brass flame arrestor	X	X		X	X					X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
MiniLabo 2 Horizontal Brass with Shut-Off Valve																												
D43376	Brass, shut-off valve	X	X		X	X		X	X		X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
D43377	Brass, shut-off valve, needle valve	X	X		X	X		X	X		X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
D43378	Brass, shut-off valve, metal diaphragm metering valve	X	X		X	X		X	X		X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
D43379	Brass, shut-off valve, flame arrestor	X	X		X	X					X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
MiniLabo 2 Horizontal Stainless Steel																												
D43482	Stainless Steel	X	X	X	X	X	X	X	X		X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
D43483	Stainless Steel, metal diaphragm metering valve	X	X	X	X	X	X	X	X		X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
MiniLabo 2 Horizontal Stainless Steel with Shut-Off Valve																												
D43484	Stainless Steel, shut-off valve	X	X	X	X	X	X	X	X		X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
D43485	Stainless Steel, shut-off valve, metal diaphragm metering valve	X	X	X	X	X	X	X	X		X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
MiniLabo 2 Vertical Brass																												
D43380	Brass, shut-off valve	X	X	X	X	X	X	X	X		X	X	X															
D43381	Brass, shut-off valve with needle valve	X	X	X	X	X	X	X	X		X	X	X															
D43382	Brass, shut-off valve with metal diaphragm metering valve	X	X	X	X	X	X	X	X		X	X	X															
D43383	Brass, shut-off valve with flame arrestor	X	X	X	X	X	X	X	X		X	X	X															

X available

* Only for outlet pressure 22 psig / 1.5 bar

** Not for Acetylene and Hydrogen

Gas specific label available on request. Please mention gas type when ordering.

WARNING! Do not attempt to select, install, use or maintain this product until you have read and fully understood the **TESCOM Safety, Installation and Operation Precautions.**