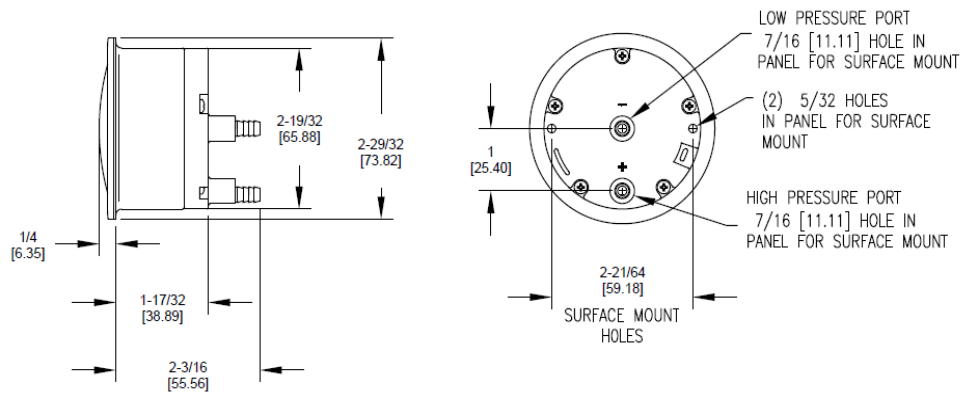


# WinAIR Compact Differential Gauge Instructions and Maintenance Manual

# PFD

## Dimensions (mm)



## Specifications

<b>Dial</b>	2 1/16" (52.4mm), white aluminum with black markings
<b>Case</b>	Glass filled nylon, black
<b>Lens</b>	Polycarbonate
<b>Ring</b>	Threaded die-cast black aluminum
<b>Process Connections</b>	3/16" barbed for ID tubing
<b>Movement</b>	Resistance-free and magnetic
<b>Pointer</b>	Aluminum, anodized black
<b>Over-pressure Limit</b>	Maximum pressure of 30 psi / 207 kPa
<b>Ambient/Process Temperatures</b>	20°F to 120°F (-7°C to 49°C)
<b>Accuracy</b>	± 5% of full scale
<b>Approvals</b>	CE
<b>Accessories</b>	Panel mounting bracket, allen key, two nuts & bolts
<b>Installation Attention</b>	Only in vertical position
<b>Warning</b>	This product can expose you to chemicals including lead, which is known to the State of California to cause cancer and birth defects or other reproductive harm. For more information go to <a href="http://www.P65Warnings.ca.gov">www.P65Warnings.ca.gov</a>

## Transportation, Packaging and Storage

- Check the PFD Series gauge for any damage that may have resulted during transport. Any damage should immediately be reported
- Maintain packaging until time of installation. Packaging will provide protection during transport and storage
- Storage temperature is 20°F to 120°F (-7°C to 49°C).
- Protect the WinAIR Compact from moisture and dust

## Installation

### **WARNING**

Before installation and operation, ensure that the correct pressure gauge has been selected, consider the pressure range, ambient and process conditions and that the product is in good working order

- WinAIR Compact is suitable for very low pressure installations and is compatible with dry and clean air or non-corrosive gases
- Install the instrument in a location suitable for the specification of the gauge and free of pulsation and vibration
- PFD Series gauges are calibrated in the vertical position so they should be installed in the same manner to ensure accuracy

## Mounting

### Surface Mount

1. Drill 2 x 7/16" (11.11mm) holes 1 1/32" (26.19mm) apart on a vertical line for pressure connections
2. Drill 2 x 5/32" (3.97mm) holes on a horizontal line, 2 1/3" (59.26mm) apart for mounting screws
3. Install mounting screws into the back of the WinAIR Compact, insert through holes in the panel, and secure with hex nuts provided

### Panel Mount

1. Cut a 2 5/8" (67mm) diameter opening in the panel
2. Install the mounting screws into the back of the WinAIR Compact, insert the gauge in the panel and place the bracket over the mounting screws
3. Install the hex nuts provided onto the mounting screws and fasten the WinAIR Compact into place



## Pressure Connection

- PFD Series has high and low pressure connections on the back of the gauge which are used to measure positive, negative or differential pressures
- The pointer will move in the positive direction if the pressure of the high input is greater than the low input or in the negative direction if the pressure of the low input is greater than the high input
- If a pressure connection is being made to either the high or the low pressure port, it is not required to plug the unused port
- If a pressure input is being used to reference atmospheric pressure, it is not required to plug the corresponding unused process connection.

## Options & Accessories

Included in each package

- mounting bracket
- 2 x mounting studs
- 2 x hex nuts



static pressure tip with flange



65' (20m) pvc tubing

## Re-Zero Adjustment, General Maintenance and Calibration

- The re-zero adjustment feature should only be considered after installation
- Access the re-zero adjustment screw at the bottom of the lens to re-zero the pointer while both the High and Low pressure ports are open to atmospheric pressure and without any pressure being applied to the unit
- For general maintenance, periodically disconnect all pressure inputs and vent all process connections to atmosphere
- Recalibration or repair by the user is not recommended
- For best results, return WinAIR Compact to Winters Instruments