



# Leman Instruments

## AERO50R – ULTRA ZERO AIR GENERATOR



# AIR

## APPLICATIONS

- ✓ Combustion gas for GC
- ✓ Zero gas for AQM calibrators
- ✓ Carrier gas for permeation tube systems

## DESCRIPTION

**LEMAN-Instruments** designed the **AERO50R** product line of **Zero AIR Generator**, to fit almost any type of application which needs independent supply of high purity AIR close to the consumer in an elegant 19" casing with full color display and touchpad.

Compressed Air is first filtered from particulates down to  $5\mu\text{m}$  and partially dried; then passes throughout a hot catalytic chamber to remove CO, CH<sub>4</sub> and HC. Based on the field proven Pressure Swing Adsorption (PSA) technology, AIR passes through a set of filters filled up with molecular sieve and activated charcoal, to be dried and cleaned from the last traces of HC.

After the purification process, Air is filtered of remaining particulates down to  $0.1\mu\text{m}$  and pressure is regulated to the set value, between 0.5 and 5 bar (7 to 70 psig).

Models with outflows of **3 and 5L/min** AIR are available.

Each instrument is equipped with high performance communication interfaces USB and Ethernet(Opt) to create a very flexible gas network with local or central control.

Due to the software being focused on safety, automatic regulation and intuitive and reliable communications, the **AERO50R** are easy to install, reliable, safe and pleasant to operate.

## BENEFITS

- ✓ Reduces in operation costs. Return on investment within 15months.
- ✓ Improves resolution and detection limit. Provides High pressure stability.
- ✓ ZERO AIR available 24/7 at constant purity. No contamination.
- ✓ Independent source of High Purity AIR. Does not require any piping. Can be easily moved around the laboratory.
- ✓ Low noise < 55dB(A).
- ✓ Long life.
- ✓ Very safe operation, internal leak-test, automatic shut-down, protection against over-temperature.
- ✓ No handling, No storage, No cylinder rental fee.

# AERO50R

## SPECIFICATIONS

<b>Models</b>	<b>AERO50R-3, AERO50R-5</b>
AIR Outflow @ 1013/20°C	AERO50R-3 = 3 L/min ; AERO50R-5 = 5 L/min
Output AIR purity	<ul style="list-style-type: none"><li>▪ &lt; 10ppm H2O (&lt;-60°C DP)</li><li>▪ &lt; 1ppb O3, NO, NO2, NH3, SO2, H2S</li><li>▪ &lt; 30 ppb HC</li><li>▪ &lt; 30 ppb CO and CH4</li><li>▪ particulates &lt;0.1µm</li></ul>
Output Pressure	Adjustable from 0.5 to 5 bar. (7 to 72psig)
Compressed AIR	Supplied by external source, dried and oil free according to DIN ISO8578-3
Manual control	Through a 4.3" TFT-LCD color display with touchpad, located on the front panel. Display of major parameters, functioning status and alarms. Intuitive navigation to functions by menus and sub menus.
Remote control	<ul style="list-style-type: none"><li>■ Through 2 potential free relay contacts (I/O),</li><li>■ USB. RS485 (Mod-Bus) or Display</li><li>■ Trough Ethernet 10/100 network</li><li>■ Log book download by USB.</li></ul>
Sound pressure	< 55 dB(A), measured at 1m
Ambient Temperature	+10 to +35°C
Inlet/Outlet fittings	Stainless steel 1/4" compression
Power supply	Automatic switching from 90VAC to 260VAC, 47 to 63 Hz
Power consumption	AERO50R-x : max. 450W
Dimensions	W=483mm/19ins, H=132mm/5.2ins (3U), D=520mm/21ins
Weight (net)	AERO50R-x :16Kg
Certification	CE

## ORDERING NUMBERS

Model	Article #
AERO50R-3	724211

Model	Article #
AERO50R-5	724212

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