

The MultiRAE is the most advanced portable chemical detector on the market. The MultiRAE delivers the broadest PID sensor range in its class and the versatility to support over 25 intelligent interchangeable sensor options (such as PID, NDIR for combustibles and CO<sub>2</sub>, ammonia, chlorine, formaldehyde, and phosphine) to fully meet the monitoring needs in a variety of applications, including industrial hygiene, personal protection, leak detection, and HazMat response.

The MultiRAE's wireless capability elevates worker protection by providing safety officers real-time access to instrument readings and alarm status from any location<sup>1</sup> for better visibility and faster incident response.

## FEATURES

- Highly versatile and customizable for different applications
- Man Down Alarm with real-time remote wireless notification
- Easy maintenance with replaceable sensors, pump, and plug-and-play battery
- Fully automatic bump testing and calibration with AutoRAE 22
- Wireless access to real-time instrument readings and alarm status from any location<sup>1</sup>
- Unmistakable five-way local and remote wireless notification of alarm conditions
- Over 25 interchangeable sensor options, including 0.1 to 5,000 ppm PID
- Intelligent sensors store calibration data, so they can be swapped in the field<sup>3</sup>
- Extensive on-board gas libraries (190 VOCs and 55 combustible gases)
- Largest display in its class
- Continuous datalogging (6 months for 5 sensors, 24x7)

## MULTIRAE CONFIGURATIONS:

### All MultiRAEs Include:

- MultiRAE monitor with sensors, battery and wireless options as specified, and protective rubber boot, swivel belt clip and filter installed
- Continuous datalogging (6 months for 5 sensors @ 1-minute)
- Travel charger/PC communications adapter
- PC communication cable
- AC adapter
- Calibration adapter
- Alkaline battery adapter
- Toolkit with Hex tool and Phillips screwdriver
- PID sensor cap removal tool
- Quick Start Guide
- CD with documentation
- Safety Suite Premium Instrument Configuration and Data Management Software
- Calibration and test certificate
- Warranty/registration card
- Hard transport case with custom foam



## APPLICATIONS

- Industrial hygiene, personal protection, and multi-gas leak detection in industries such as:
  - Environmental
  - Oil and Gas
  - Chemical
  - Aviation (wing tank entry)
  - Shipping/Marine
  - Pharmaceutical
- HazMat response
- Clandestine drug labs

### MultiRAE & MultiRAE Pro Include:

- 3 spare external filters
- 6" flexi probe with inlet adapter
- Built-in pump

### MultiRAE Pro Includes:

- PID zeroing filter (P/N: 008-3024-000)
- IP67/decontamination valve accessory

### Pumped MultiRAE Lite Includes:

- Built-in pump
- Belt clip installed
- 3 spare external filters

CALL GEOTECH TODAY

**(800) 833-7958**

Geotech Environmental Equipment, Inc.

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Instrument Specifications	
<b>Size</b>	7.6" H x 3.8" W x 2.6" D (193 x 96.5 x 66 mm)
<b>Weight</b>	31 oz. (880 g)
<b>Sensors</b>	Over 25 intelligent interchangeable field-replaceable sensors including PID for VOCs, electrochemical sensors for toxic gases and oxygen, combustible LEL and NDIR sensors, and CO2 NDIR sensor
<b>Battery Options</b>	- Rechargeable Li-ion (~12-hr. runtime, <6-hr. recharge time) - Extended duration Li-ion2 (~18-hr. runtime, < 9-hr. recharge time) - Alkaline adapter with 4x AA batteries (~6-hr. runtime)
<b>Display</b>	Monochrome graphical LCD display (128x160) with backlighting. Automatic screen "flip" feature.
<b>Display Readout</b>	- Real-time reading of gas concentrations; PID measurement gas and correction factor; battery status; datalogging on/off; wireless on/off and reception quality. - STEL, TWA, peak, and minimum values
<b>Keypad Buttons</b>	3 operation and programming keys (Mode, Y/+, and N/-)
<b>Sampling</b>	Built-in pump. Average flow rate: 250 cc/min. Auto shutoff in low-flow conditions.
<b>Calibration</b>	Automatic with AutoRAE2 Test and Calibration System2 or manual
<b>Alarms</b>	Wireless remote alarm notification; multi-tone audible (95dB @ 30cm), vibration, visible (flashing bright red LEDs), and on-screen indication of alarm conditions - Man Down Alarm with pre-alarm and real-time remote wireless notification
<b>Datalogging</b>	- Continuous datalogging (6 months for 5 sensors at 1-minute intervals, 24/7) - User-configurable datalogging intervals (from 1 to 3,600 seconds)
<b>Communication &amp; Data Download</b>	- Data download and instrument set-up and upgrades on PC via charging and PC comm. cradle, travel charger, or AutoRAE2 Automated Test and Calibration System2 - Wireless data and alarm status transmission via built-in RF modem (optional)
<b>Wireless Network</b>	Safety Suite Premium
<b>Wireless Frequency</b>	ISM license-free bands
<b>Wireless Range (Typical)</b>	MultiRAE to RAE Link3 Mesh or RAE Links 3 Z1 Mesh Modems - 33 ft. (10 meters)
<b>Dust &amp; Water resistance</b>	IP65 Rating
<b>Hazardous Location Approvals</b>	CSA: CSAUS Class I, Division 1, Groups A, B, C and D, T4 Approvals ATEX: CE 0575 Ex II 2G Ex ia d IIC T4 Gb IECEx: Ex ia d IIC T4 Gb
<b>CE Compliance (European Conformity)</b>	EMC directive: 2004/108/EC. R&TTE directive: 1999/5/EC. ATEX directive: 94/9/EC
<b>EMI / RFI</b>	No effect when exposed to 0.43mW/cm2 RF interference from a 5-watt transmitter at 12"
<b>Performance Tests</b>	MIL-STD-810F compliant. LEL CSA C22.2 No.152; ISA-12.13.01
<b>Languages</b>	Arabic, Chinese, Czech, Danish, Dutch, English, French, German, Indonesian, Italian, Japanese, Korean, Norwegian, Polish, Portuguese, Russian, Spanish, and Swedish
<b>Warranty</b>	- Two years on non-consumable components and catalytic LEL, CO, H2S, and O2 sensors - One year on all other sensors, pump, battery, and other consumable parts.

Sensor Specifications		
Sensors	Range	Resolution
<b>PID Sensors</b>		
VOC 10.6 eV (HR)	0 to 5,000 ppm	0.01 ppm
VOC 9.8 eV <sup>1</sup>	0 to 1,000 ppm (benzene)	0.01 ppm
<b>Combustible Sensors</b>		
Catalytic LEL	0 to 100% LEL	1% LEL
NDIR (0-100%LEL Methane)	0 to 100% LEL	1% LEL
NDIR (0-100%Vol. Methane)	0 to 100% Vol.	0.1% Vol.
<b>Carbon Dioxide Sensor</b>		
Carbon Dioxide (CO <sub>2</sub> ) NDIR	0 to 50,000 ppm	100 ppm
<b>Electrochemical Sensors</b>		
Ammonia (NH <sub>3</sub> )	0 to 100 ppm	100 ppm
Carbon Monoxide (CO)	0 to 500 ppm	1 ppm
Carbon Monoxide (CO), Ext. Range	0 to 2,000 ppm	10 ppm
Carbon Monoxide (CO), H <sub>2</sub> -comp.	0 to 2,000 ppm	10 ppm
Carbon Monoxide (CO) + Hydrogen Sulfide (H <sub>2</sub> S) Combo	0 to 500 ppm	1 ppm
	0 to 200 ppm	0.1 ppm
Chlorine (Cl <sub>2</sub> )	0 to 50 ppm	0.1 ppm
Chlorine Dioxide (ClO <sub>2</sub> )	0 to 1 ppm	0.03 ppm
Ethylene Oxide (EtO-A)	0 to 100 ppm	0.5 ppm
Ethylene Oxide (EtO-B)	0 to 10 ppm	0.1 ppm
Ethylene Oxide (EtO-C), Ext. Range	0 to 500 ppm	10 ppm
Formaldehyde (HCHO)	0 to 10 ppm	0.05 ppm
Hydrogen (H <sub>2</sub> ) <sup>7</sup>	0 to 1,000 ppm	2 ppm
Hydrogen Cyanide (HCN)	0 to 50 ppm	0.5 ppm
Hydrogen sulfide (H <sub>2</sub> S)	0 to 100 ppm	0.1 ppm
Hydrogen Sulfide (H <sub>2</sub> S), Ext. Range <sup>7</sup>	0 to 1,000 ppm	1 ppm
Methyl Mercaptan (CH <sub>3</sub> -SH)	0 to 10 ppm	0.1 ppm
Nitric Oxide (NO)	0 to 250 ppm	0.5 ppm
Nitrogen Dioxide (NO <sub>2</sub> )	0 to 20 ppm	0.1 ppm
Oxygen (O <sub>2</sub> )	0 to 30% Vol.	0.1% Vol.
Phosphine (PH <sub>3</sub> )	0 to 20 ppm	0.1 ppm
Sulfur Dioxide (SO <sub>2</sub> )	0 to 20 ppm	0.1 ppm

- 1 Additional equipment and/or software licenses may be required to enable remote wireless monitoring and alarm transmission.
- 2 Contact Geotech for availability.
- 3 Honeywell recommends calibrating sensors on installation.
- 4 A two-gas combination sensor is required for a 6-gas configuration.
- 5 Specifications are subject to change.
- 6 Specifications for non-wireless monitors.
- 7 On Diffusion model only.

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