

# ESRAD-502

## CO2 Controller for Grow Rooms



### Your #1 Indoor Grow and Mushroom Farm CO2 Control Solution

A simple and affordable way to adjust and review your CO2 levels when you want to and how you want to for your indoor grow space. With the **ESRAD-502** you can ensure that your plants never exhaust their supply of CO2 and grow at their maximum potential under optimized conditions.

The **Indoor CO2 Controller for Grow Rooms and Sensors**, can be used in greenhouses, grow rooms, hydroponics, mushroom farms, or anywhere elevated CO2 levels are used to maximize plant growth.

### Features

- Accurate CO2 control for small to large sized indoor grow facilities
- Control 2 zones with 2 sensors
- Customizable CO2 set points for high and low target levels
- Dual beam NDIR technology accurately measures CO2 concentrations 0-3,000ppm
- Built-in temperature, humidity, and light
- Relay output can automatically control CO2 generator or compressed CO2 tanks
- Versatile modes for greenhouse or HVAC
- 2 Relays that are user configurable
- Customized graph data display
- Easy fresh air calibration

### Accessories

- **ESRAD-502-S**: Sensor Replacement
- **SV-1029 | SV-1030** : Solenoid Valve

### Applications

- Greenhouses
- Indoor Grow Rooms
- Hydroponics
- Mushroom Farms
- Cultivation Facilities



### Fun Fact!

The **ESRAD-502** features a unique internal "help" guide that users can access to view information to better understand the device and its capabilities.

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## Indoor CO2 Grow Controller and Sensors

<b>CO<sub>2</sub> Measurement Range</b>	0-3,000ppm
<b>CO<sub>2</sub> Measurement</b>	Non-dispersive Infrared (NDIR)
<b>Accuracy</b>	0-2,000ppm: ±70ppm or ±5% of reading whichever is greater
<b>Operating Temperature</b>	-20°C - 60°C (-4°F - 140°F)
<b>Target Gas Ranges</b>	0-3,000ppm
<b>Measurements</b>	Requires 1 liter per minute of constant flow per channel
<b>Resolution</b>	1ppm @ 0-1,000ppm ; 10ppm above 1000pm
<b>Response Time</b>	<2 minutes for 63% response to step change
<b>Relays</b>	2 relays, either (Normally Open) NO or (Normally Closed) NC
<b>Sensor Life Expectancy</b>	> 10 years
<b>Dimensions</b>	4.96 x 6.70 x 2.65 inches

## Electrical and Mechanical Specifications

<b>Power Consumption</b>	1 W max @ 115 VAC 60 Hz   2 W max @ 230 VAC 50 Hz
<b>Peak Current</b>	<5A @ 250 VAC, SPST
<b>Power Supply</b>	12/24 VC



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