



Features

- NDIR Dual, long life, reliability. No calibration required
- Outdoor Air quality measurement
- Air quality measurement in swimming pools
- Configurable Analog OUTPUT Scaling function

Description

This sensor gives information concerning carbon dioxide (CO2) concentration levels, important element in air quality monitoring

The outdoor CO2 level serves as a baseline for comparison to indoor CO2 concentration.

Ventilation guidelines, such as ASHRAE, recommend indoor CO2 levels not to exceed the surrounding outdoor concentration by 600 ppm. Also, LEED guidelines suggest providing an alarm when the indoor CO2 level exceeds the outdoor level by 530 ppm, or 1,000 ppm absolute. Reliable correlation between indoor and outdoor CO2 levels can only be achieved by measuring both.

Additionally in some agriculture procedures and greenhouse installations the control of CO2 concentration is mandatory

Application Areas

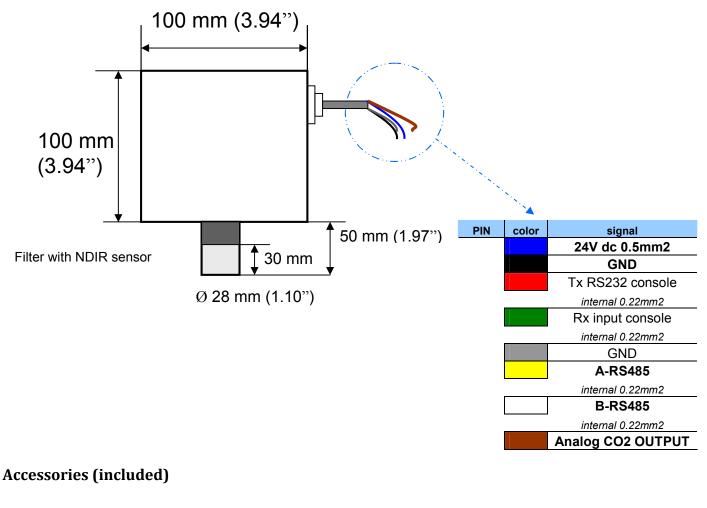
- HVAC applications for building management
- swimming pools
- greenhouse –agriculture
- dust areas

CO2 specification	
Measurement Principle	NDIR -Non dispersive infrared
	technology-
Sensor Type	Dual Beam Dual wavelenght
Measurement Range	400 – 4000 ppm CO2 by volume
Resolution	< 20 ppm CO2
Accuracy	± 5% of reading
Pressure Dependence	0.13 % of reading per mm Hg
Response Time	< 3 minutes for a 90% step change
Warm up Time	< 30 seconds operational
	< 15 minutes full accuracy

Electrical Specifications		
Power supply	24 Vdc (7-28 Vdc)	
Power consumption	14-45 mW	
OUTPUT	DPF-AOCO2-S : Analog 0-10v	
Linear Oppr	n-0v/4000ppm-10v Configurable	
by RS232 connection console		
	DPF-MOCO2-S : RS485	
Operating Temperature	$0 \sim +40^{\circ} \text{ C}$	
Storage Temperature	-20 ~ + 50 ºC	
Operating Humidity	$0 \sim 95\%$ non-condensing	
Electrical connection	3x cable 0.5 mm2	

General Specific	cations
Regulatory	CE Mark: EMC 2004/108/EC, RoHS
Compliance	2011/65/EU, WEE
	EN61000-6-2, EN61000-6-3
Casing Material	Fiberglass reinforced polycarbonat
	Filter: Polyethylen
IP Housing	IP66 –EN6220
IP Sensor Filter	IP6
Housing color	Grey RAL 703
Dimensions box	100x100x60 mm (3.94x3.94x2.36"
Filter large	50 mm (1.97'
Weight	0.373 k

Installation Diagram - Cabling - Dimensions



Mounting Flags for Wall mounted	4
1000 mm of length cable	1

Ordering Info Codes

Product Name	Reference
DPF-AOCO2-S Outdoor Analog CO2 IP65 sensor	EN025800
DPF-MOCO2-S Outdoor MODBUS CO2 IP65 sensor	EN025830

