

MODEL 2010BR

TRACE OXYGEN ANALYZER



Your Most Efficient Path to **DETECT LEAKS** starts here.

Even the most microscopic leak path alllows PPM oxygen to enter a pressurized gas system at atmospheric pressure. This trace oxygen can combine with other problematic gases to inflict costly and dangerous pipeline corrosion. For that reason, you should never compromise on performance or reliability when selecting a Trace Oxygen Analyzer.

The **MODEL 2010BR** is the #1 Trace Oxygen Analyzer in the Natural Gas Industry. Its compact, rugged design contains the innovative *ELIMINATOR CELL BLOCK™* to deliver the fastest measurement readings while guaranteeing virtually zero possibility of internal leakage. All sample handling components (flow meter, needle valve and a 3-way Sample/Span/Off Selection Valve) are integrated into a solid metal block with internal drilled passages and an incredibly gas-efficient sensor pocket. This design eliminates the need for 'off-the-shelf' fittings or tubing. The *BLOCK* also provides easy access to the sensor pocket, conveniently located behind the front panel. The **MODEL 2010BR** is CSA-approved for Class 1, Div. 1, Groups B,C,D hazardous areas and can operate in temperatures as cold as −40°F (−40°C) when used with the **Extreme Weather Enclosure**.

The **MODEL 2010BR** uses **T-2** and **T-4** Oxygen Sensors – developed internally by AMI and contain our proprietary **BULLET SENSOR TECHNOLOGY™** to optimize measurement performance and reliability. Moreover, the **COMMAND CENTER™** is available for use with the **MODEL 2010BR**. This platform gives users access to a complete suite of powerful software-based tools not seen elsewhere in the industry.

The **MODEL 2010BR** delivers the most accurate PPM O_2 measurements. No other Trace Oxygen Analyzer on the market can compete with its performance, level of engineering or intuitive design.

Unmatched in **RELIABILITY**

MODEL 2010BR TECHNICAL SPECIFICATIONS & FEATURES

PHYSICAL

Dimensions: 13.0"W x 9.5"H x 5.0"D (compact size)

(33.0 cm x 24.1 cm x 12.7 cm)

Weight: 16.0 lbs (7.26 kg)

Digital Display: 4-digit LCD (reads full scale from

0.00 ppm to 25.0%)

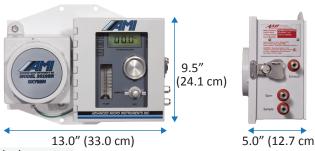
Mounting: Wall mount or 2.0" pipe

Gas Connections: ¼" 316 S.S. compression fittings

316 S.S. fittings, electro-less nickel-plated cell block, Wetted parts:

gold-plated contacts, acrylic flow meter & Vitron O-rings

2 - year warranty for Parts & Labor for any defects in materials or workmanship



TECHNOLOGY

Method of Measurement: Electrochemical Oxygen Sensor

ELIMINATOR CELL BLOCK™ with a Complete Integral Sample System

COMMAND CENTER™, which includes:

- Datalogger for Oxygen Readings, includes graph of complete readings over a 15-day period or Excel file containing raw numerical data for custom analysis
- Error Status Display alerts users to any error(s) detected by the Analyzer
- Brown-out history stores the last 5 brown-out incidents and recoveries
- Power-up history stores the last 10 times the unit was powered-up
- Modbus bi-directional RS485 communication to interface wth advanced features

Analyzer uses T-2 and T-4 Oxygen Sensors, which utilize **BULLET SENSOR TECHNOLOGY** (O₃ sensors have a 6-month waranty)

PERFORMANCE

Minimum detection limit: 50 ppb of Oxygen

90% upscale response times for these specified ranges:

<10 sec for 10 ppm – 25.0%, <25 sec for 0.0 – 10 ppm

Fast downscale response:

<15 min (after 1 min exposure to air to return below 10 ppm)

Repeatability: ±1% of range or ±0.2 ppm of oxygen,

whichever is greater

Diurnal Temperature Specification: <3% of scale over

temperature range

Data Collection Capacity provides 15 days of data recording

@1 datapoint per minute

Inlet gas pressure: 0.5 - 150 psig (0.03 - 10.3 bar)

RFI-protected

ALARMS

2 fully adjustable Oxygen Concentration Alarms with Relay Contacts

Alarm delays are programmable from 0 – 300 minutes Alarm hold-off / bypass is programmable from 0 – 120 min

OPERATION

Output Ranges (user selectable):

0 - 10 ppm, 0 - 50 ppm, 0 - 100 ppm, 0 - 500 ppm,

0 - 1000 ppm, 0 - 0.5%, 0 - 1.0%, 0 - 5.0%, 0 - 10.0%,

0 - 25.0%

Ambient Operating Temperature Range:

non-heated: 25°F to 115°F (3.9°C to 46°C) heated option: -20°F to 115°F (-29°C to 46°C)

with optional Extreme Weather Enclosure:

-40°F to 115°F (-40°C to 46°C)

Recommended flow rate: $0.1 \text{ to } 2.0 \text{ SCFH}^* (0.05 - 1.0 \text{ Lpm})$

*SCFH = standard cubic feet/hour

1 – 5 VDC and 4 – 20mA isolated analog output signals Advanced analog output calibration for use when syncing with an EFM or other external device

AREA CLASSIFICATION

Area Classification: CSA-approved for Class 1, Div. 1, Groups B,C,D hazardous areas

POWER

Requirements: Choice of 12 – 24VDC or 115VAC; <70 mA @12VDC (non-heated)

www.amio2.com Tel 714.848.5533 Fax 714.848.4545 18 1116 01 MK Rev E © Advanced Micro Instruments



Advanced Micro Instruments, Inc 225 Paularino Avenue Costa Mesa, CA 92626

