



# Fyrite<sup>®</sup> Gas Analyzers

Fast, accurate and easy to use instruments for measuring and analyzing carbon dioxide or oxygen. Fyrite Analyzers are available for either CO<sub>2</sub> or O<sub>2</sub> analysis, and each model is produced in three scale ranges.

All six instruments are similar in appearance and size, but differ in important construction details, as well as in the absorbing fluids.

Each model, therefore, is suitable only for the particular gas analysis or scale range for which it has been manufactured. Accuracy is within  $\pm 1/2\%$  CO<sub>2</sub> or O<sub>2</sub>.



## Operation

Fyrite absorbing fluid is selective in the chemical absorption of carbon dioxide or oxygen, respectively. Therefore, the Fyrite's accuracy, which is well within the range required for industrial and professional applications, does not depend upon complicated sequential test procedures. In addition, Fyrite readings are unaffected by the presence of most background gases in the sample.

The number of tests possible with one fluid charge depends on the concentration of samples being tested. At midpoint scale reading the CO<sub>2</sub> fluid is good for approximately 300 gas samples and the O<sub>2</sub> fluid for 100 tests. The need to replace fluid can be easily determined with a simple test, and replacement is an easy procedure. These test procedures, as well as other good information, are provided in the Fyrite manual 11-9026.

## Features

Fyrite Indicators have a broad range; they may be exposed to ambient temperatures from -30° to 150°F, and gases up to 850°F may be tested with standard aspirator sampling equipment (special sampling equipment for higher gas temperatures or dry gases is available). Order Fyrite Instruction Manual 11-9026. For temperatures above 1400°F, a ceramic sampling tube (Bacharach Part # 11-0164) is available.

## Applications

- 0-7.6% CO<sub>2</sub> – CO<sub>2</sub> tests of controlled atmospheres in fruit, vegetable, meat storage rooms, and incubator monitoring.
- 0-7.6% O<sub>2</sub> – Oxygen determination in flammable gases; oxygen tests to check inertness of atmosphere in silos, fuel tanks, etc.
- 0-20% CO<sub>2</sub> – Flue gas combustion tests; CO<sub>2</sub> tests of heat treating atmospheres.
- 0-21% O<sub>2</sub> – Flue gas combustion tests, oxygen deficiency test. Checking oxygen concentrations in hydrogen cooled generators and oil sealed inert gas transformers.
- 0-60% CO<sub>2</sub> – Checking CO<sub>2</sub> in inert gas blankets in tankers and barges carrying gasoline and other combustibles; CO<sub>2</sub> tests on lime kilns; checking CO<sub>2</sub> in sewage plant digesters.
- 0-60% O<sub>2</sub> – Oxygen test in connection with oxygen and gas anesthesiology.

*Note: United States and Foreign Postal Regulations prohibit Fyrite fluid, in or out of any unit, from being shipped parcel post.*



**Single Kits** - Single Kits contain either a Fyrite CO<sub>2</sub> or a Fyrite O<sub>2</sub> Indicator, Sampling Assembly and a carrying case.

**Duplex Kits** - Special Fyrite Kits containing various combinations of Oxygen and Carbon Dioxide Indicators, Sampling Assembly and a carrying case.

**Repair Kits** - One bottle of Fyrite fluid, valve plunger gasket, top gasket, screws, diaphragm, and envelope of filtering material.

**Refill Kits** - Two bottles of Fyrite fluid, top gasket, screws, and envelope of filtering material.

USA			
COMPLETE KIT ITEM NO. <sup>1</sup>	SCALE RANGE	FYRITE	ASPIRATOR ASSEMBLY
<b>CO<sub>2</sub> Testing</b>			
10-5053	0-7.6%	11-7042	11-7039
10-5000 <sup>2</sup>	0-20%	11-7032	11-7029
10-5032	0-60%	11-7034	11-7029
<b>O<sub>2</sub> Testing</b>			
10-5054	0-7.6%	11-7044	11-7039
10-5011	0-21%	11-7036	11-7029
10-5046	0-60%	11-7038	11-7029

FYRITE FLUID*		
GAS TYPE	RANGE	ITEM NO. 3 BOTTLE CTN.
<b>Carbon Dioxide</b>		
	0-7.6%	10-5100 (11-0053)
	0-20%	10-5057 (11-0057)
	0-60%	10-5057 (11-0057)
<b>Oxygen</b>		
	0-7.6%	10-5103 (11-0059)
	0-21%	10-5060 (11-0169)
	0-60%	10-5060 (11-0169)

EXPORT			
COMPLETE KIT ITEM NO. <sup>3</sup>	SCALE RANGE	FYRITE (DRY)	ASPIRATOR ASSEMBLY
<b>CO<sub>2</sub> Testing</b>			
10-5083	0-7.6%	11-7041	11-7039
10-5001	0-20%	11-7031	11-7029
10-5033	0-60%	11-7033	11-7029
<b>O<sub>2</sub> Testing</b>			
10-5084	0-7.6%	11-7043	11-7039
10-5012	0-21%	11-7035	11-7029
10-5042	0-60%	11-7037	11-7029

REPAIR KITS		
GAS TYPE	RANGE	ITEM NO.
<b>Carbon Dioxide</b>		
	0-7.6%	11-7053
	0-20%	11-7052
	0-60%	11-7052
<b>Oxygen</b>		
	0-7.6%	11-7055
	0-21%	11-7054
	0-60%	11-7054

DUPLEX KITS			
COMPLETE KIT ITEM NO. <sup>4</sup>	CO <sub>2</sub> FYRITE	OXYGEN FYRITE	ASSEMBLY ITEM NO.
10-5020	0-20%	0-21%	11-7029
10-5021 <sup>4</sup>	0-20%	0-21%	11-7029
10-5090 <sup>5,6</sup>	0-7.6%	0-7.6%	11-7039
10-5106 <sup>5,6</sup>	0-7.6%	0-21%	11-7039
10-5111 <sup>5,6</sup>	0-60%	0-21%	11-7029

REFILL KITS		
GAS TYPE	RANGE	ITEM NO.
<b>Carbon Dioxide</b>		
	0-7.6%	not available
	0-20%	11-7047
	0-60%	11-7047
<b>Oxygen</b>		
	0-7.6%	not available
	0-21%	11-7050
	0-60%	11-7050

<sup>1</sup>Domestic shipments only

<sup>2</sup>Also includes Fire Efficiency Finder

<sup>3</sup>Export use only. Kits shipped without fluid.

<sup>4</sup>Export only

<sup>5</sup>Special order only: check factory for price and availability

<sup>6</sup>No export equivalent. Order components separately

\*Note: Only genuine Bacharach Fyrite Fluid is to be used in your Fyrite Analyzer. Substitute fluids may cause the Fyrite to be inaccurate or inoperative. Numbers in parentheses are old part numbers for reference only and not to be used for ordering.