

PHAZIR™

Handheld Asbestos Analyzer

Overview

The Polychromix PHAZIR™ Asbestos Analyzer is the first of its kind handheld Near-Infrared (NIR) designed for rapid positive screening and identification of asbestos containing materials. The 4 lb handheld analyzer is completely self-contained and can perform accurate on-site analysis in seconds.

Designed for the expert and non-technical user alike the PHAZIR™ unleashes the power of near-infrared spectroscopy to save you time & money.

Features

- Rugged portable handheld solution
- Lightweight 4 lbs. device
- Intuitive Color LCD screen
- Rechargeable Li-Ion batteries
- 10+ hours battery life
- Minimal training required
- Rugged design
- Safe for use



Speed & Power

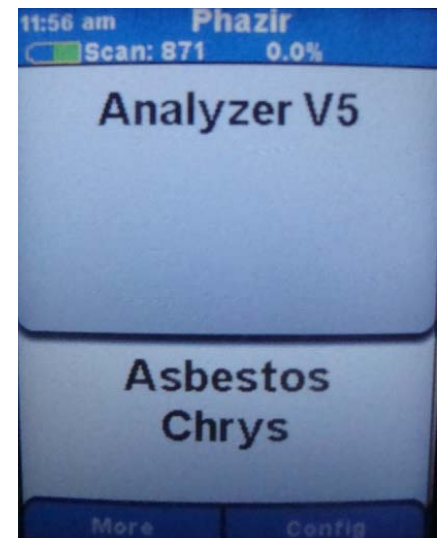
- Rapid identification of asbestos mater
- Fast 7 second results
- Non-destructive measurements
- Ready-to-use and customizable application

Ease of use

- Minimal training required
- Point and shoot operation
- Results logged in database

Flexible

- Identify chrysotile, amosite, crocidolite, tremolite, actinolite and anthophyllite in a wide range of materials.



Typical analysis result

**For additional information please contact: Polychromix
The Leaders in Portable Spectroscopy Solutions**

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PHAZIR™ Asbestos Analyzer

PHAZIR-Asbestos-Brochure-v3
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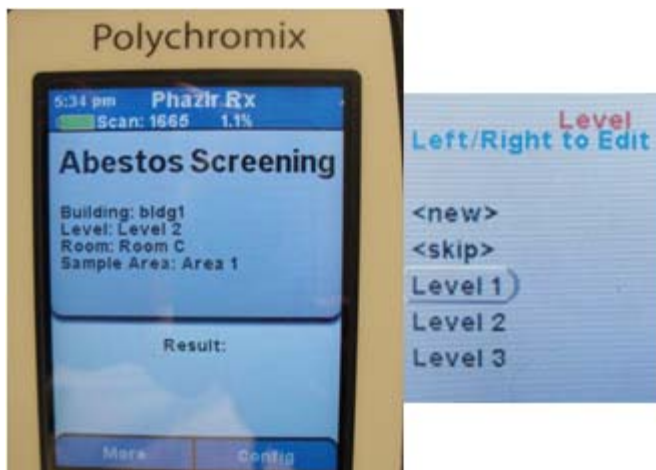
Wide Range of Use

The PHAZIR™ Asbestos Analyzer can identify asbestos fiber in a wide range of materials including tiles, flagstones, ceilings, heat insulation, braids, cords, coatings, cements and fiber cements, joint compound, adhesives, covers, boarding and more.



Documenting Analysis Locations

The PHAZIR™ provides an integrated function to help document reference information regarding sample and sample location. Operators can enter sample and sample location information in five customizable data fields from pull down options or from the keyboard.



Rapid On-Site Screening

PHAZIR™ is a rugged handheld system for fast point-and-shoot screening of asbestos materials in the field. Complete analysis results are available within 7 seconds and are reported on a color LCD display.

Safe

The PHAZIR™ is based on near-infrared spectroscopy using a low power tungsten light source, similar to a low power flashlight. This is completely safe for operators and completely non-destructive to sample material.

Long Operating Time

The PHAZIR™ is designed for maximum battery life. The unit can operate for 10 hours of continuous operation and longer for intermediate usage. The battery can be quickly exchanged in a matter of seconds.

Analysis Reports

All data associated with an analysis is stored in the PHAZIR™ onboard database. Results can be transferred to a PC via USB cable and viewed using standard programs like EXCEL™.

Low Cost of Ownership

Other than bulb replacement every two years and an occasional battery replacement, the PHAZIR™ doesn't require any addition fixed maintenance costs. The PHAZIR™ light source is guaranteed for at least two years of operation. A user replaceable bulb is included with the system. Additional replacement bulbs are available with a cost less than \$40.

Updates

PHAZIR™ program updates are user field upgradeable. To install updates just plug in the USB cable and log into the Polychromix website. PHAZIR Asbestos program updates are available at no charge for the life of the instrument.

Language

The PHAZIR™ is engineered to accommodate several different languages. Pre-defined language kits are available and a customizable language translation table is available.



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PHAZIR™ Belt Holster

An optional belt holster is available for your PHAZIR™ analyzer. It keeps your PHAZIR™ close at hand leaving your hands free. The holster includes a storage compartment for a spare battery.



PHAZIR™ Spare Batteries

The PHAZIR™ features a quick change battery pack which can be interchanged in seconds without tools. Additional batteries are available to keep your PHAZIR ready for use.



Polychromix Service & Support

Polychromix's products are supported by a network represented in more than 50 countries on six continents. Our team is ready to provide world-class support and service to ensure your success.

Ask for your local Polychromix representative

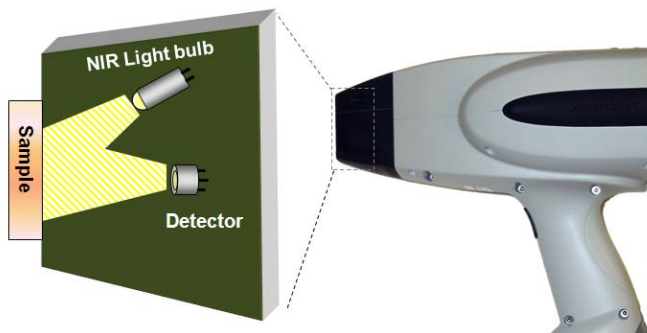
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Theory of Operation

The PHAZIR™ Asbestos Analyzer is based on near-infrared spectroscopy. Light from a standard low power tungsten bulb is reflected off the material of interest. The PHAZIR™ measures the wavelength specific response (called the spectrum) to determine if asbestos is present and to classify the asbestos form.

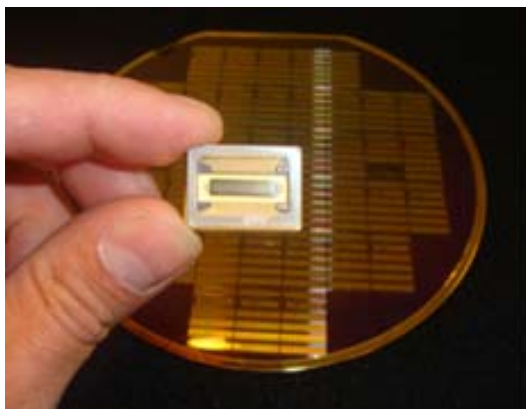
- **Non-destructive analysis**
- **Safe for operator and materials**
- **No radioactive or laser sources**



Polychromix Technology

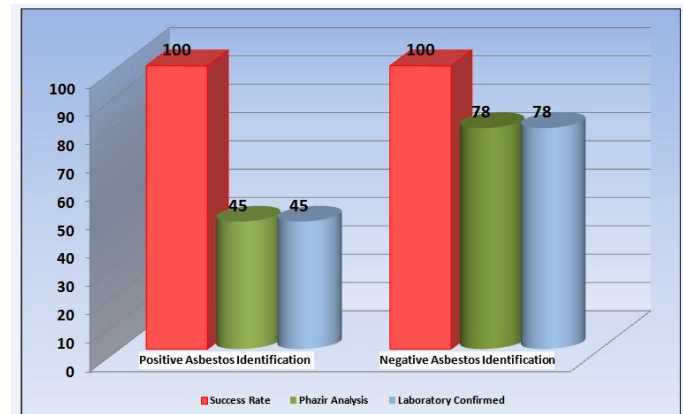
Polychromix's patented MEMS (micro-electromechanical) NIR technology enables the PHAZIR's small size and robust operation. PHAZIR™ is a proven technology with more than 1000 installations with some analyzers having recorded over 1,000,000 analyses.

- **Proven reliability**
- **Low cost of ownership**
- **Accurate results**



Field Accuracy

The PHAZIR™ has been tested and demonstrated to be an accurate positive screening technology and in some cases have proven to be even more accurate than traditional polarized light microscopy (PLM) methods.



Recommendations of Industry Experts

"I've been an environmental consultant for 20 years...the PHAZIR Asbestos Analyzer is the biggest innovation that I've heard of in the asbestos industry for a very long time"

Environmental Consultant

"Your machine is providing us with quick and accurate information that is keeping our employees safe and our facility asbestos free. Now that this technology is available, I don't see how any C&D processor can afford to be without it".

Leading Sustainable Waste Management Company



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PHAZIR ASBESTOS ANALYZER SPECIFICATIONS

Principle of Operation	Non-destructive chemical analysis via Near Infrared Spectroscopy
Weight	4.5 lbs
Light Source	Tungsten light bulb, safe for operators and sample integrity
Measurement time	Less than 10 seconds.
Internal data storage	All readings stored in internal memory for more than 10,000 analysis results) which can be offloaded to PC
Data Download	Transfer data in text based files to a PC via USB connection. Easily transfer data to all types of applications.
Security	User selectable password protection with multiple security levels.
Operating conditions	Temperature range 40° to 115° F (5° to 45° C°)
Batteries	Interchangeable, rechargeable 10+ hours lithium-ion battery pack. AC battery charger included. Battery pack recharge time <4 hours.
Housing	High-strength, dust proof/splash proof plastic housing
Case	Includes waterproof transportation case
Calibration	Factory Certified

Options

PCX-ACC-2	PHAZIR Holster with battery compartment
PHZR-BTRY-2	PHAZIR spare battery

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