

CLEVELAND ELECTRIC LABORATORIES

Fiber Optic Sensing Solutions



FiberStrike™

**OPTICAL SENSING SOLUTIONS
FOR INTRUSION DETECTION
SECURITY APPLICATIONS**



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FiberStrike™ SENSING SOLUTIONS FOR INTRUSION DETECTION

FiberStrike: An advanced fiber optic sensing platform that is flexible and scalable.

System architecture facilitates configuration for virtually any security monitoring application.

Multiple sensor types address a broad range of intrusion detection applications:

Distributed Sensing Systems

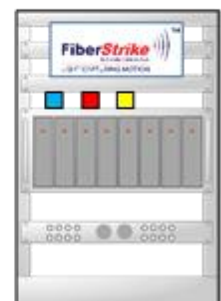
Information Security

- Monitor communication line trays and conduits, helping to ensure information security
- Sensing fiber installed alongside communications lines, provides information on location of disturbances at any location along a pathway
- Strategically installed such that any physical disturbance of communications line will be detected
- The monitoring fiber is a physical movement detector, sensitive everywhere along its entire length
- Detection probability and location accuracy may be increased by use of multiple sensing fibers



Perimeter Security

- Distributed sensing fiber is directly buried, helping to ensure physical perimeter security
- Sensing fiber detects vehicular and pedestrian traffic, provides information on location anywhere along fiber
- Sensing fiber may be 25+ kilometers long
- Burial depth of sensing fiber customized based on local conditions, property configuration, and sensing requirements
- Multiple parallel spaced sensing fibers increase probability of detection and location accuracy



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Discrete Sensor Systems

- Switches monitor and provide status information at specific points such as doors, access hatches, floor sections, etc.
- Available in multiple actuator configurations
- Standard size package and mounting centers
- Passive, optically-based, cannot be electrically bypassed
- Rugged, corrosion-resistance packaging available



User Interface

- CEL's advanced API provides a .net event output that allows easy integration with other existing Command and Control systems
- Monitors and provides alerts, location information and data logging when discrete or distributed sensing systems are triggered or disturbed; remotely accessible
- CEL offers the ICS SMS Enterprise™ C3I Command and Control solution including customized graphic user interface; intuitive and designed to be used by anyone without a need for detailed training

Advantages of FiberStrike intrusion detection systems:

- All FiberStrike sensors (both distributed and discrete) are passive, have no electronic components, emit no signals and require no electrical power
- Nonconductive optical fiber is immune to electrical interference and degradation due to chemicals or environmental factors
- Multiple optical fibers are easily deployed for redundancy
- Sensors may be 25+ kilometers from head-end monitoring equipment, no booster amplifiers required

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Cleveland Electric Laboratories invites your inquiries and looks forward to helping meet your security monitoring requirements.