

FIREDETEC





FIREDETEC PRODUCT TECHNOLOGY: DIRECT & INDIRECT





- \rightarrow Detection Tube : Fire detection & extinguishing agent discharge
- \rightarrow IDEAL APPLICATION: Small and hard to reach enclosures (< $1m^3$)
- \rightarrow Best price perfomance
- \rightarrow VERY EASY TO INSTALL



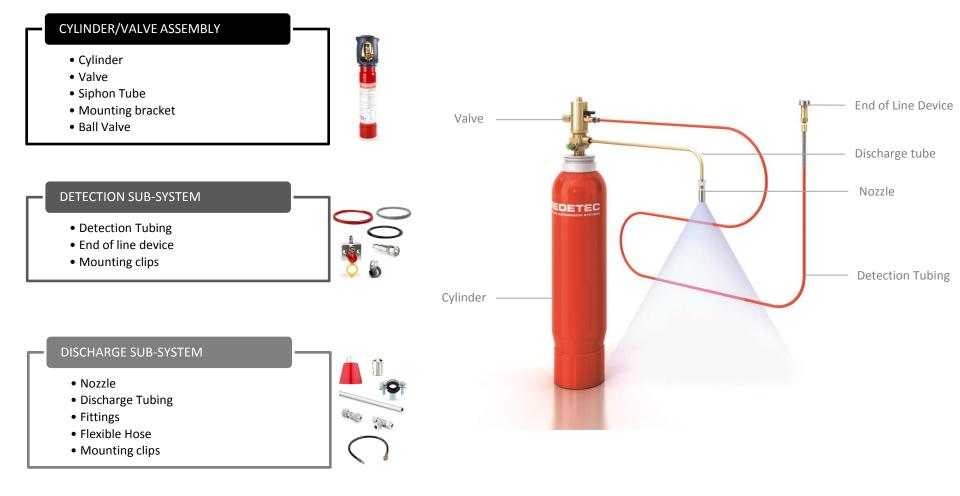
PROPERTIES - INDIRECT SYSTEM (< 9m³)

- DETECTION TUBE : FIRE DETECTION ONLY \leftarrow
- DISCHARGE THROUGH A SEPARATE DISCHARGE LINE \leftarrow
 - MOST EFFECTIVE PERFORMANCE \leftarrow
 - QUICKER DISCHARGE \leftarrow
 - MANUAL ACTUATION POSSIBLE \leftarrow

Only indirect systems can be UL or FM approved



FIREDETEC PRODUCT SYSTEM CONSTRUCTION





FIREDETEC PRODUCT TUBING TECHNOLOGY

FIREDETEC TUBING SPECIFICITIES

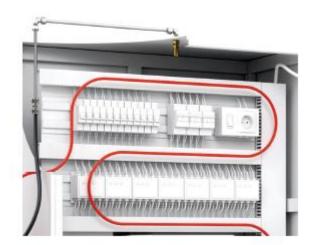
- Dual-function: detects and suppresses (direct systems)
- •Compact, flexible and reliable
 - \rightarrow Burst temperature: 110°C or 175°C
 - \rightarrow Linear pneumatic detection: no external power source
 - \rightarrow Can be installed anywhere even in hard-to-reach places
- Advanced technology polymer construction:
 → Resistant to severe environments, UV, and extreme temperatures
- Originally developed by Rotarex



SPECIAL APPLICATION SENSOR TUBING SENSOR TUBING FOR KITCHEN SYSTEMS







FIREDETEC PRODUCT TUBING TECHNOLOGY



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INSTALLS INSIDE EQUIPMENT CLOSER TO THE SOURCE.

- Compact and Flexible \leftarrow
- Installs almost anywhere \leftarrow
- Even in hard to reach spaces \leftarrow
- Just cm from critical circuitry and mechanics \leftarrow





QUICKLY DETECTS AND SUPPRESSES FIRES

- The tube is pressurized to 16 bar \leftarrow
- It bursts at 110° C or 175°C at early sign of fire \leftarrow
- The drop in pressure instantly actuates the valve \leftarrow
 - Extinguishing agent floods the compartment ←
 - The fire is suppressed in just seconds \leftarrow



FIREDETEC PRODUCT CREATE YOUR OWN SYSTEM





FIREDETEC PRODUCT ADVANTAGES



Efficiency

- •Excellent value/price ratio
- •Continuous linear detection
- Quick reaction time
- •Works 24/7

High-quality & Reliability

- •Certifications from both independent and governmental agencies
- No accidental discharge
- •Ability to detection of leak
- •Shock and vibration resistant

Flexibility

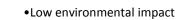
- Installation on almost every type of applications
- •Installation even in hard to access spaces
- •No external power source needed
- High & low pressure systems available

Easy installation & maintenance

- Quick installation
- •Simple maintenance steps



Environment:

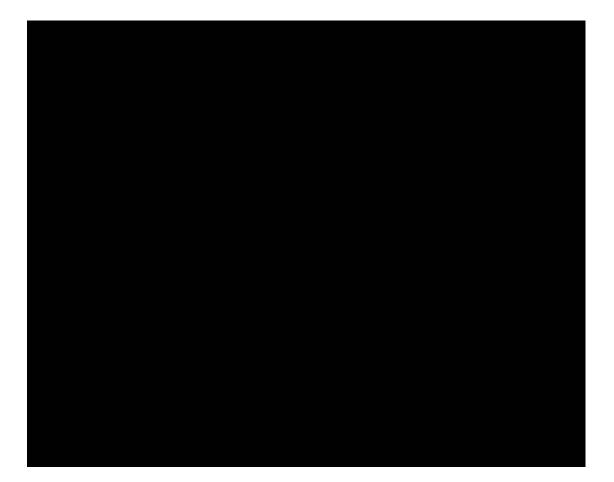








FIREDETEC DEMONSTRATION





FIREDETEC PRODUCT MAIN MARKETS



HOSPITALS

Electrical Equipment Laboratories Emergency Generators Elevators

PORTS AND SHIPPING TERMINALS

Reach stackers Elevator Trucks Mobile Cranes Cargo Cranes





AIRPORTS

Server rooms Radar and control tower equipment Escalators and moving walkways Baggage handling equipment ; de-icing trucks ; fueling trucks

MINES

Heavy equipment (Bulldozers ; front end loaders ; conveyor systems...) Mobile equipment (Extraction machines ; drilling machines...) Electrical panels





INDUSTRY (MACHINE SHOPS + FACTORY)

CNC Machines EDM Machines Electrical cabinets Dust extractors

WINDMILLS

Control Cabinet Hydraulic Station Transformer Braking system Condenser





PUBLIC TRANSPORTS

Bus vehicle engine Electrical cabinets in metro stations Trains

PHARMACEUTICAL & ANALYTICAL LABS

Fume Hoods Flammable liquid storage closets Air filtration systems Exhaust systems





ELECTRICAL CABINET



Multiple causes of fire:

- Short-circuits, overloading or overheating of components
- Formation of intermittent arcs
- Incorrect installation
- Faulty equipment (electrical malfunction ; lifetime of equipment...)

Available extinguishing agent:

- CO2
- HFC-227 / NOVEC

Certifications:

• FM / UL approval for DOT cylinders (HFC-227 / NOVEC)









INDUSTRIAL MACHINERY



Multiple causes of fire:

- Combustion of oil residues and flammable metals
- Malfunction (coolant system ; tool breakage ; low maintenance)
- High friction (static electricity)
- Human behavior : operator error

Available extinguishing agent:

• CO2









LABORATORY FUME HOOD



Multiple causes of fire:

- Ignition of chemical residues and vapors in the extractor
- Open flame (Bunsen burner) ; heating plates
- Volatile and reactive agents
- Human behavior: technician error

Available extinguishing agent:

- CO2
- HFC-227 / NOVEC
- ABC dry chemical

Certifications:

• FM / UL approval for DOT cylinders (HFC-227 / NOVEC)









COMMERCIAL KITCHEN



Multiple causes of fire:

- Grease
- Flammable oils
- Open flames/heat

Available extinguishing agent:

• F/K extinguishing agent

Certifications:

• LPCB









VEHICLE ENGINE



Multiple causes of fire:

- Temperature of engine compartment
- Little maintenance time

Available extinguishing agent:

- TS-55 extinguishing agent
- BerkiCold

Certifications:

• SPCR 183









FIREDETEC PRODUCT SPECIAL FEATURES

DIMES



Functioning:

Measurement of CO2 contents

- \rightarrow Capacitance difference between two electrodes.
- \rightarrow Detection of changes in the mass of CO2 (liquid and gas phases)



ADVANTAGES

- Real-time measurement
- Temperature compensation
- Very precise
- Reduced maintenance costs (Eliminates need to dismount and weigh cylinders)

🙏 DIMES

- Personal alarm level setting
- Multiple cylinder controlling
- Easy installation (system integrated into the valve body)
- Easy calibration



FIREDETEC PRODUCT SPECIAL FEATURES

DIRECTIONAL VALVES



Advantages:

- \rightarrow Protection of several enclosures with only one cylinder
- \rightarrow Detection and discharge only in the zone with fire





THANK YOU FOR YOUR ATTENTION

