

INDUSTRY OVERVIEW: REFINED PRODUCT TERMINALS



Detection, Notification, and Suppression



Refined product terminals have a very high exposure to safety risk. Fortunately, with a well-designed Det-Tronics Eagle Quantum Premier® EQ3900G fire and gas detection system, key risks can be controlled.

SAFETY IS WHAT WE DO
PARTNER WITH US »



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HAZARD DETECTION CHALLENGES:

- ▲ Performance and design requirements are not clearly identified by code, leaving the decision to the Authority Having Jurisdiction (AHJ)
- ▲ Loading and unloading stations inherently contain a multitude of obstructions such as pipes, pumps, and the tank truck itself
- ▲ False alarm sources such as Vapor Combustor Units (VCU's) utilize fire as a normal part of the process, increasing the potential for unintended flame detection activation

COMPLETE SOLUTIONS MUST:

- ▲ Provide reliable detection under varying environmental factors
- ▲ Include detector types and technologies to address needs at different parts of the process
- ▲ Provide immunity to false alarm sources and be unaffected by Radio Frequency Interference (RFI)
- ▲ Integrate detection, notification, and suppression functionality
- ▲ Automatically initiate corrective action, including engaging the emergency shutdown system
- ▲ Place and aim detection equipment for optimum coverage
- ▲ Validate performance during commissioning
- ▲ Use a performance-based design that adheres to codes and standards

**DET-TRONICS — PIONEERS IN THE FIELD OF
FLAME DETECTION AND PROTECTION SYSTEMS**
TODAY CUSTOMERS WORLDWIDE TRUST US TO PROVIDE
FIRE & GAS SAFETY SYSTEM SOLUTIONS.

Storage and transportation terminals may benefit from a high-performance Eagle Quantum Premier EQ3900G flame and gas detection releasing system, when the terminal's monetary value and geographic importance warrant it. Det-Tronics understands what is needed to meet and exceed the requirements of the Authorities Having Jurisdiction (AHJ):

- ▲ NFPA 30—Flammable and Combustible Liquids Code
- ▲ FM Property Loss Prevention Guideline 7-32 Ignitable Liquid Operations
- ▲ American Petroleum Institute API Standard 2610 Design, Construction, Operation, Maintenance, and Inspection of Terminal and Tank Facilities

FIRE AND GAS DETECTION AND SUPPRESSION SOLUTIONS

Storing and transporting refined products is a multifaceted process with numerous volatile operations and hazards. Designing a comprehensive and effective fire and gas detection and releasing system to monitor refined product terminals is also complex, requiring thorough analysis and planning.

Requirements must be carefully assessed, and plans and sites have to be reviewed, surveyed, and mapped out. Appropriate devices such as the X3301 Multispectrum IR Flame Detector,



pictured left, and the PointWatch Eclipse® IR Combustible Gas Detector, pictured below, must be placed, tested, and integrated into the detection and suppression network.

Det-Tronics will:

- ▲ Determine detector placements to optimize detection
- ▲ Provide a listed detection and releasing system to enable code compliance
- ▲ Navigate code requirements and application complexities to achieve desired results



Eagle Quantum Premier EQ3900G

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Corporate Office
6901 West 110th Street
Minneapolis, MN 55438 USA
det-tronics.com

Phone: +1 952.941.5665
Toll-free: +1 800.765.3473
Fax: +1 952.829.8750
det-tronics@carrier.com