



SOCRATE

FIRE & GAS
BUSINESS UNIT



SOCRATE—COMPANY OVERVIEW

Our focus is on the Italian and Mediterranean Oil and Gas Market offering Process Instrumentation Products, System and turnkey solutions for process analysis, Metering and Fire and Gas Safety Solutions.

Socrate provides to their valued customers the highest quality products & services, using engineering experience gained over many years of designing, implementing and commissioning hundreds of systems for numerous project applications.

SOCRATE – FIRE & GAS BUSINESS UNIT

Socrate's F&G Business Unit offers reliable, effective and cost efficient solutions customized as per your requirements. We provide:



- F&G Product
- F&G Package
- F&G Turn-Key Solutions
- F&G System
- F&G Engineering
- F&G Alarm Notification
- F&G After Sales Services

We provide complete solutions from order award through engineering to system hand-over and after sales services.

1. ARCHITECTURE DESIGN	➔	Concept design, System sizing, Cost comparison analysis
2. HARDWARE INTEGRATION	➔	PLC, FAP, Annunciator, Mimic panel, Wind monitors, Dataloggers, UPS
3. SOFTWARE INTEGRATION	➔	PLC programming, GUI design, Hardware driver
4. SYSTEM ASSEMBLY & TEST	➔	Cabinet design, Wiring, Hook-Up test, Heat soak test, RFI test
5. COMMISSIONING SERVICES	➔	Consulting, Supervision and engineering, Provision of technicians etc.



FIRE & GAS BU—EXAMPLES OF APPLICATION

We provide total gas and flame solutions for following applications:

- Combustible: Catalytic Bead and Infrared Technology
- H₂S: Metal Oxide Semiconductor, Electrochemical Cells
- Toxic: Electrochemical Cells and Infrared Technology
- Flame: UV and IR Enabled Flame Detection
- High Pressure Gases: Ultrasonic Technology
- Multi-Point and Intelligent Controllers
- Integrated Fire and Gas Detection Systems
- Alerting and evacuation system
- Optical and acoustical devices for Safe and Hazardous Area



FIRE & GAS BU—EXAMPLES OF APPLICATION



Offshore Platforms



Pipelines & Refineries



Petrochemical



LNG



Compressor Stations



Fuel Loading Racks



Chemical Plants



Water & Sewage Treatment



Pulp & Paper



Parking Garages



Spray Paint Booths

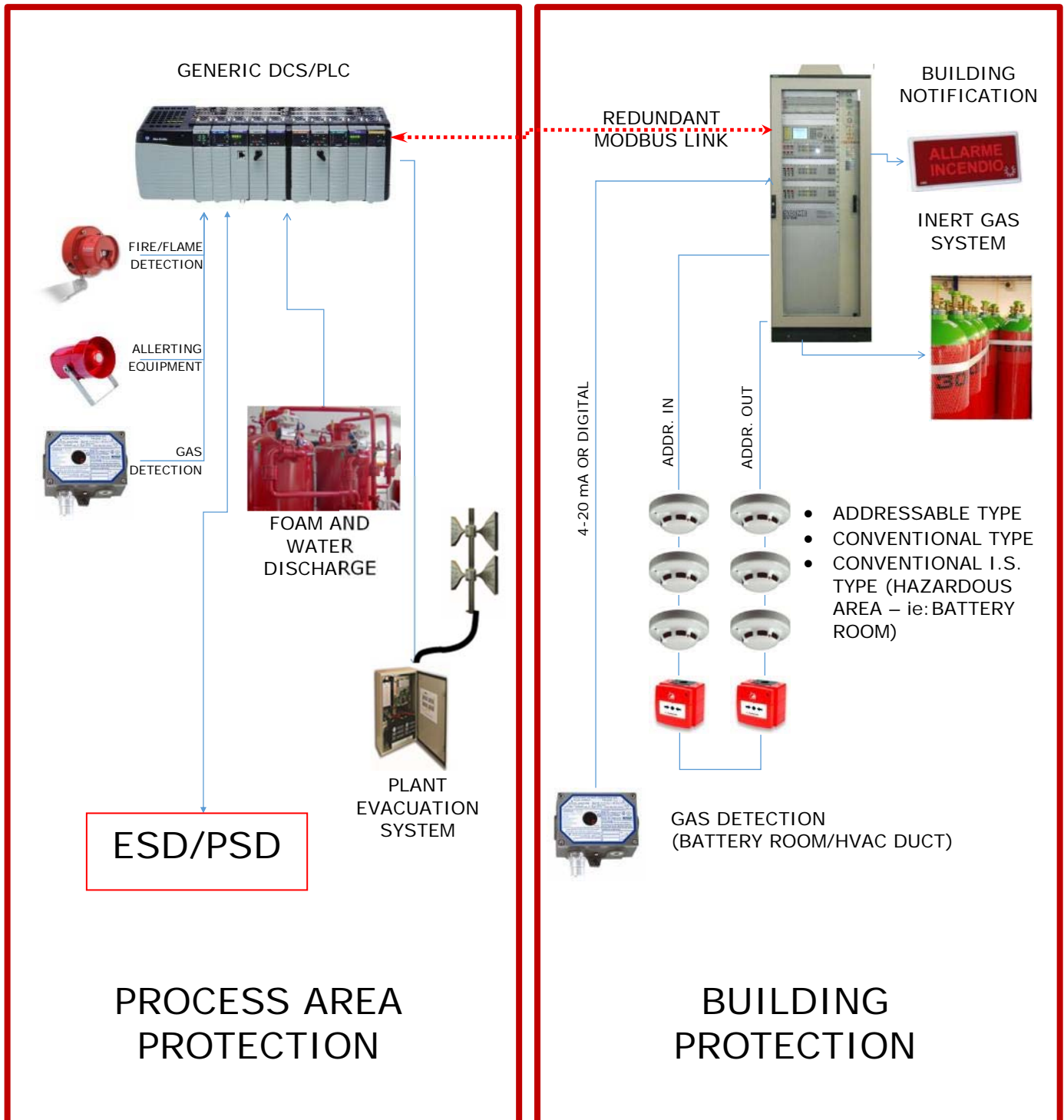


Aircraft Hangars





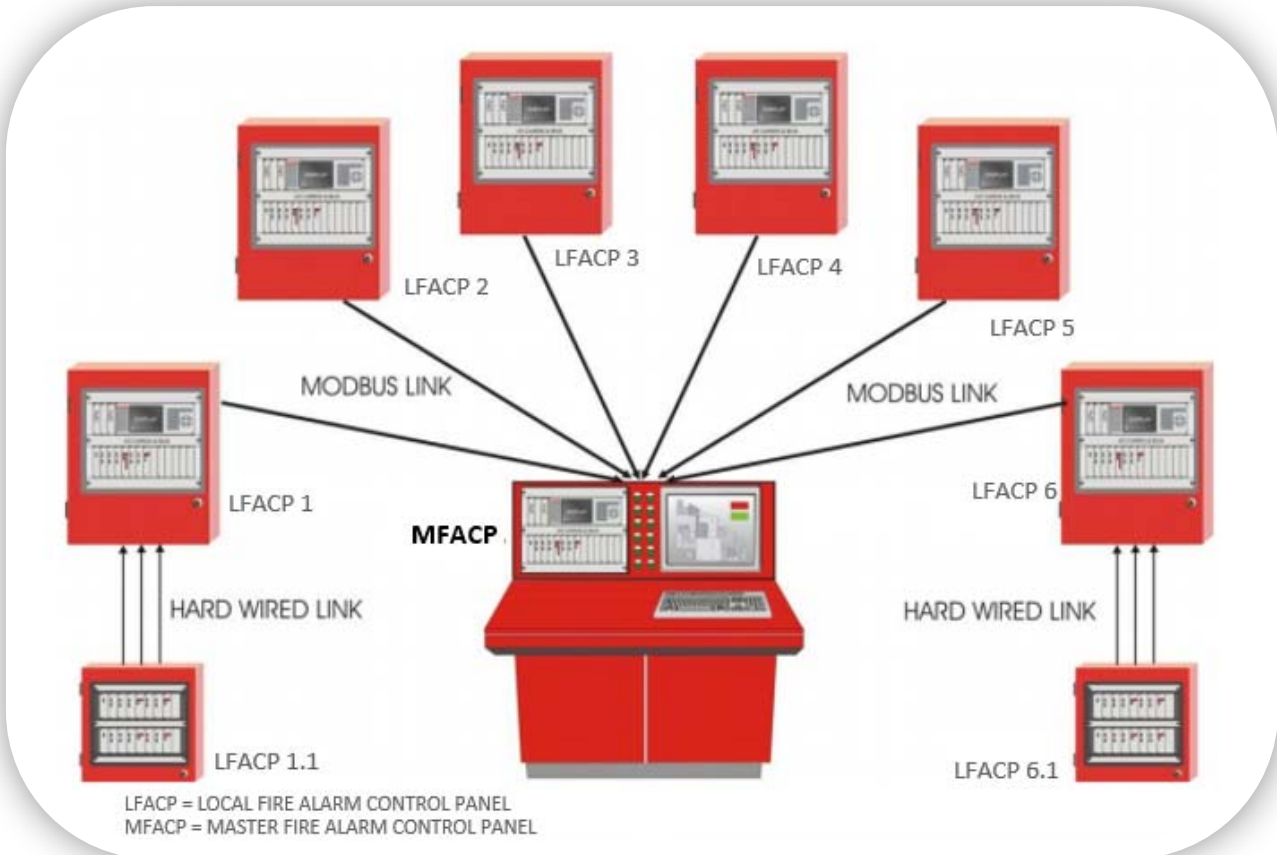
FIRE & GAS BU – INTERFACE VIA REDUNDANT MODBUS COMMUNICATIONS



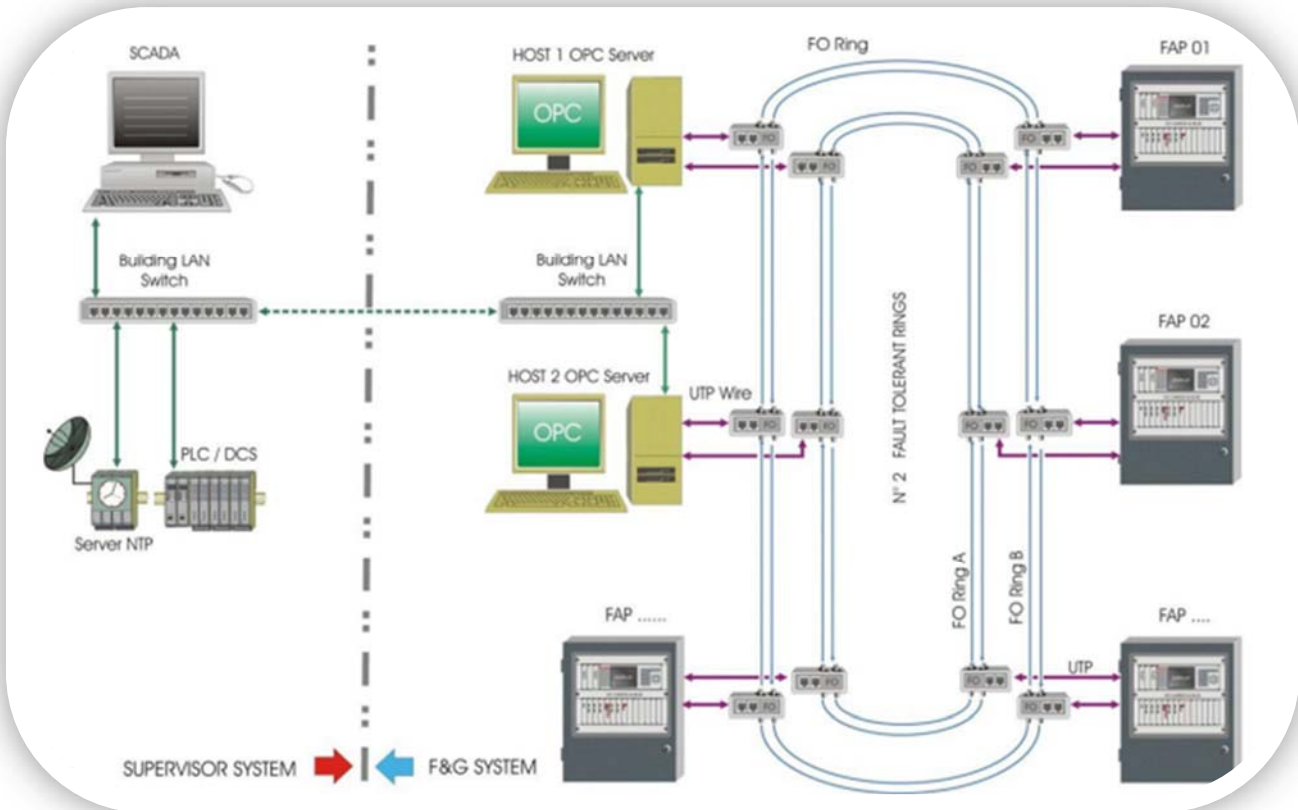
Fire and gas systems are designed to protect the personnel and equipment: in the process area and in the building. Socrate studies, designs, manufactures and delivers systems that communicate with input devices (detectors) and are able to initiate an automatic actions. The interfacing between the process area and building works via redundant modbus communication, hardware interfaces.



BUILDING FIRE ALARM PANEL NETWORK



FIRE AND GAS NETWORK (FIBER OR WIRED TYPE) - MODBUS TCP/IP PROTOCOL



FIRE AND GAS NETWORK (FIBER OR WIRED TYPE) - CLOSED RING

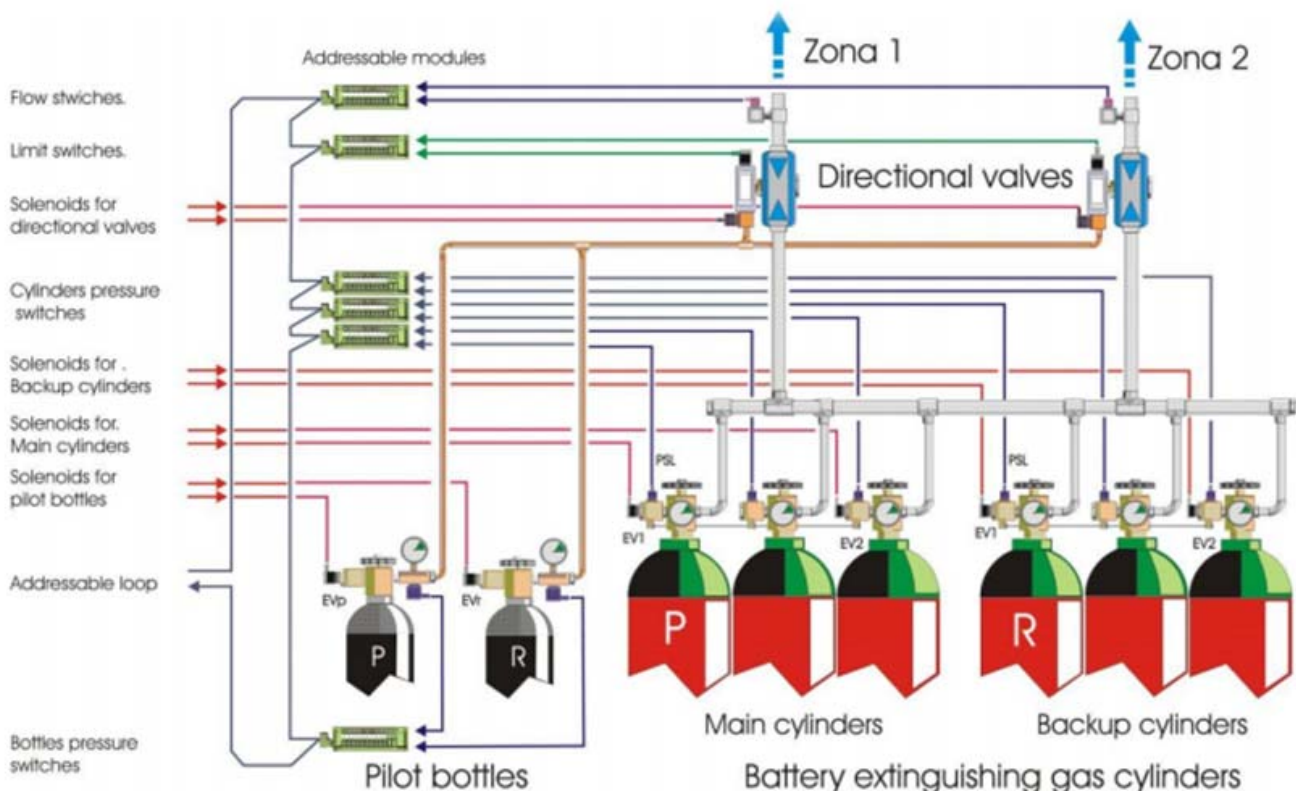


FIRE & GAS BU — CLEAN AGENT SYSTEM

Clean agent fire and gas system is based on use of chemical agents and inert gases in order to extinguish a fire. The agent's application reduces heat, reduces or isolates fuel, and/or oxygen and it inhibits the change reactions between these components. Inert gas reaches all the areas of the facility and leaves no residue.

Socrate's multidisciplinary team designs, manufactures and delivers systems based on client's specific requests and applying products carefully selected using engineering experiences gained over years.

Clean agent system example





FIRE & GAS BU — EXAMPLES OF OUR WORK



Manufacturing and Testing Phase



Manufacturing and Installation



Manufacturing of clean agent system



F&G Panels for Stogit Compressor Station



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