Always alert

IFSJ delves into the inner workings of Jeron's Pro-Alert 480 system

Emergencies present complex scenarios that demand swift and precise action. It's paramount for the safety of those involved that they are equipped with the most efficient and reliable systems to ensure clear communication and rapid response. Stepping up to address these needs, Jeron Electronic Systems, Inc. introduces the Pro-Alert 480, a game-changing solution that revolutionises emergency alerting and two-way communication.

As a leading entity in the communications systems realm, specifically in healthcare and life safety industries, Jeron has ingeniously engineered the Pro-Alert 480 to meet the Area of Rescue Assistance communication requirements as stipulated in the Americans with Disabilities Act. This robust system is making significant inroads in high-rise buildings, parking garages, and commercial facilities, forming a critical link between occupants and first responders during emergencies.

Who is Jeron and what is your experience in communications systems for healthcare and life safety industries?

From the company's inception, 58 years ago, Jeron focused on alerting and communications products starting with their first apartment intercom and security system.

Following apartment intercom, Jeron applied their design and manufacturing expertise to become a leader in life safety platforms in multiple markets including healthcare, parking garages, correctional facilities, and high-rise buildings.

Ever changing landscapes in all markets has led us to adapt our solutions based on the best of user feedback, meeting interesting and out-of-the box challenges, and discovering new ways to streamline the all-important lifesaving communications.

The manufacturing team uses cutting-edge surface mount technologies to bring the best system solutions to your facility. Our product testing is unparalleled because all manufacturing, assembly, and quality assurance occurs in the USA, which speeds up reaction time to issues and minimises errors. Our process methodology is thorough, and quality testing is completed at every step.

Can you tell us about the inception of the Pro-Alert 480 system, what inspired its creation, and what problems it was designed to address?

In 2003, there was a horrible fire in Chicago and 6 people lost their lives when they found themselves trapped in a smoky stairwell when the doors locked behind them. There were no sprinklers, no two-way communications, and no safe way to communicate their location to emergency personnel.

The ordinance that was passed gave high-rises a choice of retrofitting for sprinklers or installing alternative safety features, such as fire-resistant stairwell doors and frames, and one- and two-way voice communication systems. As of 2013, virtually none of the building owners had opted for sprinklers.

This highlighted the need for Area of Rescue systems. Jeron was already leading the way in designing and manufacturing communications platforms that have clear, non-blocking audio for many stations across a wide variety of big and small environments.

How does the Pro-Alert 480 system operate during an emergency and what sets it apart from other similar systems?

During an emergency, when a building occupant can't evacuate on their own, they will go to an area of refuge location and utilise the Pro-Alert 480 system to alert first responders of their location with direct communication. With a push of button on a remote station, a call is placed.

If the Area of Rescue system is not monitored on-site, the Pro-Alert 480 system automatically routes the emergency call to an off-site, security monitoring location through an automated phone call using a standard telephone line, Voice over IP, or a cell network. Emergency personnel are made aware of the location(s) of the person(s) in need.
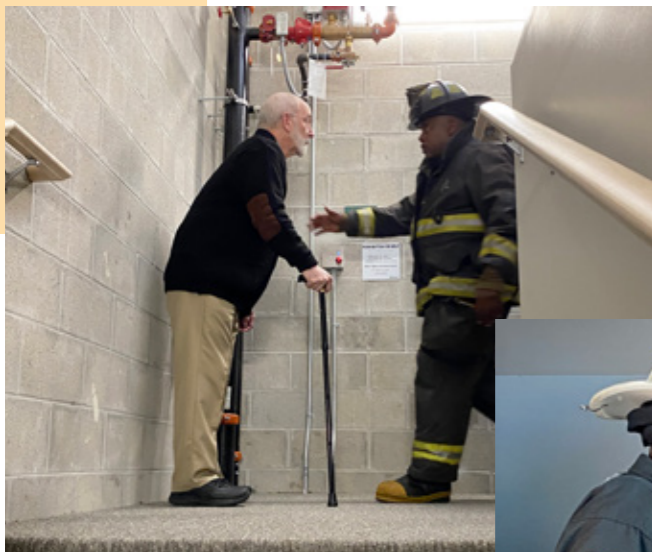
Differentiators of the Pro-Alert 480 system include: First AOR system listed under the new UL2525 standard; listed by Underwriters Laboratories; Standardised CAT cabling throughout; Daisy-chain head-end to remote station wiring – no costly home-run wiring; Fully supervised to ensure always available and proper operation- all remote stations, consoles, and remote alerting phone output; Embedded firmware architecture designed for 24/7/365 operation – no PC or servers are required to run the system; Designed and manufactured in the USA – ready to ship complete systems, no delays.

Why is the Pro-Alert 480 system important for the occupants in a high-rise building or a commercial facility during emergencies like a fire?

During a fire emergency, a high-rise building's elevator shaft acts like a chimney and fills with smoke, subsequently they are turned off by emergency personnel.

Therefore, remote AOR stations should be placed in every stairwell above the ground floor. Occupants in distress, who can't evacuate the building on their own, must be able to contact first responders in an emergency.

This system can be used in virtually any commercial, industrial, or institutional setting where instant, high-speed, clear communication is needed. Occupants must have a way to evacuate the building safely in an emergency. Occupants who cannot traverse the stairs need assistance during emergencies when the elevators are shut down.

> " THE SYSTEM ENSURES SAFETY BY PRO-ALERT ADHERING TO THE REQUIREMENTS OF THE LOCAL AND INTERNATIONAL CODES IN FORCE. "

> **" RESIDENTS CAN USE PRO-ALERT TO CALL FOR ASSISTANCE AND COMMUNICATE WITH FIRST RESPONDERS FROM A DESIGNATED AREA OF REFUGE. "**

Could you explain how Pro-Alert 480 facilitates clear communication between occupants and first responders?

A press of a button starts the clear, two-way, audio-visual communications. A person places the call from a remote station and the non-blocking two-way communications begin.

When a call for assistance is placed from a remote call station, a solid green "call placed" LED illuminates and an alert tone pulses once to verify the call placed.

At the console, the LCD display shows the location of the calling station by programmed area, and the alert tone sounds. The console displays multiple calls simultaneously.

Through programming, the remote level threshold can be lowered or increased to allow clear communication with the console.

The console has the ability to adjust to various volume levels.

How does the system ensure the safety of those who are unable to evacuate the building during an emergency?

The system ensures safety by Pro-Alert adhering to the requirements of

the local and international codes in force. The experts set the standards by years and years of life safety experiences of what to do and what not to do - an everchanging system all designed to create a secure environment.

Jeron's alerting and communications systems are specifically designed to meet the Area of Rescue Assistance communication requirements as defined in the American Disabilities Act. During an emergency in commercial and multi-story residential buildings, residents can use Pro-Alert to call for assistance and communicate with first responders from a designated Area of Refuge.

In addition, Pro-Alert 480 has continuous diagnostic testing to ensure reliability.

Could you tell us more about the Pro-Alert 480s advanced features?

At the Console, the LCD display shows the location of the calling station by number and location. The Console displays multiple calls simultaneously and Jeron Consoles provide the ability to see 4 calls, 8 calls and with our touchscreen console...up to 128 simultaneously.

Calls displayed on the Jeron Console and if not answered in a predetermined time, the calls are transfer off site using a land line, Voice over IP, or a cell phone network, to a Remote Monitoring Station or 911 Operator. The operator will hear the Global address and remote station location including the building name and address. This message is repeated until the operator presses any DTMF (dual tone multi-frequency) number to establish two-way communication with the caller at the remote station in the Area of Rescue location.

Is the Pro-Alert 480 compliant with various regulations and codes?

Pro-Alert 480 fulfills all necessary requirements set by IBC, ADA, NFPA72, UL2525, NFPA101, and local building codes. It provides a reliable two-way communication system, adhering to specific design and operation parameters outlined in these codes, and ensuring safety during emergencies, especially for those unable to use stairs.

How do you ensure the quality and reliability of the Pro-Alert 480? How do FDA registration and UL listing contribute to this assurance?

Jeron maintains strict documentation of manufacturing processes as required by FDA. The system is fully tested and certified by UL, as per the UL2525 standard, which is a third-party validation of its quality and reliability. The company upholds rigorous standards throughout research, development, production, and distribution to meet customer and regulatory demands.