3M™ Scott™ Fire & Safety Overview

3M Scott Fire & Safety produces a wide variety of Self-Contained Breathing Apparatus (SCBA) and other associated firefighting, respiratory protection, communication accessories and risk detection products. The Monroe, NC site manufactures and ships to global customers that include utilities, oil, chemical and gas plants, federal, state and local first responders as well as military operations that include the United States Navy.

The brand is built on three promises that define the 3M Scott corporate philosophy and the value it delivers to its customers:

Innovation that makes a difference
The engineers and innovators who develop our safety solutions have a very specific mandate: make a meaningful improvement in safety for the user. It starts by engaging with our customers at all levels—from end users to decision makers. This constant two-way dialogue helps us understand your work and influences every product and service we develop. The result: safety innovations that address real-world needs and truly make a difference.

Smarter Safety Solutions
Our customers work in inherently dynamic environments and unpredictable situations. A one-size-fits-all solution simply won’t do—safety has to be smarter than that. Thanks to our global breadth of products, expanding services across dozens of industries and markets, and extensive research and development investments, we can deliver safety solutions that are optimized for changing environments and tomorrow’s challenges.

A commitment to the customer
We play a critical role in our customers’ lives, and we take that responsibility seriously. So whether it’s responding to an urgent request, guiding them through a difficult situation or simply keeping them aware of the industry’s newest developments, we put customers first and serve them as if their lives depended on it. Because, sometimes, they do.
What’s new

3M™ Scott™ Air-Pak™ X3 Pro SCBA
The Air-Pak X3 Pro SCBA is built on a foundation of redundant safety features, providing unparalleled performance to protect the family of firefighters who expect the best in the most demanding conditions, with a focus on enhancing Cleanability, Comfort, and Connectivity to ensure the security and comfort of today’s firefighter. Designed for future compatibility, the Air-Pak X3 Pro SCBA meets the latest NFPA 1981/1982, 2018 Edition performance requirements.

3M™ Scott™ Sight In-Mask Thermal Imager With Pro Package
Sight Pro Package is the next evolution of the industry’s first in-mask, hands-free thermal imaging solution. Pro Package enables new, advanced features to provide firefighters with greater situational awareness during fireground operations.

3M™ Scott™ V320 Thermal Imager
The 3M Scott V320 Thermal Imager is designed to meet the rigorous demands of today’s firefighting conditions and provides mission-critical information. Equipped with a 320×240 high-resolution sensor, rechargeable battery with up to 8 hours of runtime, and fast start-up time in an affordable package.
# Table of contents

## In-Mask Thermal Imaging
6  3M™ Scott™ Sight

## Air-Pak SCBA
7  3M™ Scott™ Air-Pak X3 Pro
8  3M™ Scott™ Cylinders
8  3M™ Scott™ AV-3000 HT
9  3M™ Scott™ EZ-Scape Pro

## Voice Communications
10 3M™ Scott™ EPIC 3 RDI
11 3M™ Scott™ EPIC 3 RI

## Accountability
12 3M™ Scott™ SEMS II
12 3M™ Scott™ Monitor
13 3M™ Scott™ Pak-Tracker

## Rapid Intervention
14 3M™ Scott™ RIT-Pak Fast Attack
14 3M™ Scott™ RIT-Pak III

## Compressor Systems
15 3M™ Scott™ HushAir Connect 7500 and RevolveAir Connect

## Handheld Thermal Imaging
15 3M™ Scott™ V320
15 3M™ Scott™ X380

## Air-Supplied
16 3M™ Scott™ Ska-Pak AT
17 3M™ Scott™ TRC-1 Air Cart

## Air-Purifying
18 3M™ Scott™ C420 Plus
19 3M™ Scott™ 40mm Series Cartridges and Canisters
In-Mask Thermal Imaging

3M™ Scott™ Sight In-Mask Thermal Imager

When you wear 3M Scott Sight, you get more than constant thermal vision. You get your hands back. That’s because unlike other hand-held thermal imaging cameras, Sight uses a small thermal camera mounted to the side of the facepiece. A miniaturized display mounted inside the facepiece allows the firefighter to always see the image without the need for reaching down and handling an imager.

- **In-Mask Display** - See a clear image unaffected by external conditions
- **Adjustable Display** - Configurable to your line of sight
- **Instantaneous On** - Power the in-mask display on with a one-second push of the in-mask display power button
- **Single-Button Power Off** - Power off both the in-mask display & thermal imaging camera by a single press of the power button on the in-mask display
- **Auto System Power Off** - Equipped with an accelerometer to automatically turn off the system when not in use
- **Enhanced Battery Performance** - Improved battery life during use and in storage
- **Standby Mode** - Activate standby mode with a single push of the thermal imaging camera power button
- **Fits Any AV-3000 HT Facepiece** - Buy as a complete kit or upgrade your current AV-3000 HT facepiece
- **Minimum Four-Hour Battery Life** - Powered by simple, everyday AAA batteries
- **3M Scott Sight Mobile Configurator Application** - iOS and Android compatible application

Allows configuration of in-mask display for:
- °F or °C temperature readout
- Change icon layouts
- Configure Sight Pro Package features
- Modifying display brightness
- Modifying display colors (gray, fixed or dynamic)

Sight Pro Package is the next evolution of the industry’s first in-mask, hands-free thermal imaging solution. Pro Package enables new, advanced features to provide firefighters with greater situational awareness during fireground operations.

- **Hot-Spot Tracker** - Immediately identify the hottest part of the scene and display its relative temperature. Ideal for overhaul, search and rescue, and risk assessment.
- **Cold-Spot Tracker** - Immediately identify the coldest part of the scene and display its relative temperature. Ideal for hazmat environments.
- **Tactical Video Recording (TVR)** - Automatically record all the information shown on the in-mask display (IMD) for review later.
3M™ Scott™ Air-Pak™ X3 Pro SCBA

The Air-Pak X3 Pro SCBA is built on a foundation of redundant safety features, providing unparalleled performance to protect the family of firefighters who expect the best in the most demanding conditions, with a focus on enhancing Cleanability, Comfort, and Connectivity to ensure the security and comfort of today’s firefighter. Designed for future compatibility, the Air-Pak X3 Pro SCBA is approved to the latest NFPA 1981/1982, 2018 Edition standards.

With the new As Long As You Own It Air-Pak SCBA Warranty, customers will have peace of mind knowing that their most important investment is backed for the lifetime ownership of the product.

- New harness materials offer greater resistance to chemical exposure and less water absorption to help minimize contamination
- Easy-to-remove harness allows for cleaning to help with exposure reduction
- New shoulder harness design improves the ease of donning and minimizes pressure points to help reduce user fatigue
- Natural articulation (i.e. waist pad) promotes greater range of motion to the user, while transferring weight to the hips for a more balanced load
- Proven regulator design offers low breathing resistance to help reduce user burden and improve operational efficiencies
- Redundant safety features afford firefighters peace of mind knowing that the SCBA will perform in the toughest environments
- 3M™ Scotchlite™ Reflective Material delivers enhanced visibility of the SCBA when operating in low light conditions, improving safety and accountability on the fireground
- Bluetooth® enabled electronics support wireless connectivity between devices for improved configurability, data transmission/retrieval, firefighter safety and fireground accountability
- Electronic PAR (ePAR) provides wireless, bi-directional communication between the firefighter and incident command (using Monitor Pro telemetry software) to help improve fireground accountability and communications
- System Integrity Alarm provides visual and audible alerts to notify SCBA wearer and incident command (using Monitor Pro telemetry software) of impending electronics degradation due to elevated temperature
- Integrated RFID tags provide local storage of SCBA information that can be wirelessly interrogated for asset tracking
- Proudly “Made in the USA” with attention to quality and workmanship
3M™ Scott™ Cylinders

Over the years, breathing air cylinders have been providing SCBA users with a supply of fresh air. The original cylinders were made of steel and quite heavy. But today, advances in technology have enabled cylinders to become much lighter and less burdensome to the SCBA wearer. 3M Scott Fire & Safety offers a complete assortment of cylinders to meet the needs and demands of all SCBA users, from aluminum cylinders for infrequently used SCBA to carbon-wrapped cylinders for daily use. In addition, 3M Scott offers cylinders rated at 5500 psig (an industry first), which are available in 30-min, 45-min, 60-min and 75-min durations. To complement our cylinder offering, 3M Scott offers several solutions to help prevent damage and improve durability of the cylinder.

- Carbon and Aluminum
- 5500 psi, 4500 psi, 2216 psi
- Custom Logo I.D. Bands
- Protective Sleeves/End Caps
- 30-Year Life Cylinders

3M™ Scott™ AV-3000 HT Facepiece


- Approved with 2018 Edition Air-Pak X3 Pro SCBA
- State-of-the-art materials and design for enhanced performance
- Proven SureSeal faceseal for excellent fit and comfort
- ANSI Z87.1-2010 impact rated
- Multiple headnet configurations - 4-strap and 5 strap
- Compatible with EPIC 3 Communication Systems
- Right and left communication installation options
- Designed for Top-Down Convertibility (SCBA, APR, PAPR)
- Compatible with award-winning Sight in-mask thermal imager
3M™ Scott™ EZ-Scape Pro Integrated Self-Rescue Device

The EZ-Scape Pro is lighter, quicker-to-deploy, and is offered as a one-size-fits-most solution seamlessly integrated with the 3M Scott Air-Pak X3 Pro, Air-Pak X3, or Air-Pak 75 SCBA. No more sizing your belt to the firefighter sitting in a certain seat on the apparatus. The EZ-Scape Pro fits and adjusts similar to the current waist strap of the Air-Pak SCBA, in a stronger, more versatile configuration.

• Provides a reliable means of escape from multi-story buildings
• One of the lightest, fully integrated escape systems on the market
• One-size-fits-most application (adjustable from 30”- 56”)
• Rated for minimum 4000lb static load
• Available with a Crosby hook or Lightning GT hook
• Available as a belt-only configuration (pictured above) allowing firefighters to utilize their SCBA as a rated attachment point for their own personal escape bail-out systems, or as an attachment point for a ladder belt
• Belt-only configuration is just as light, yet stronger and more versatile than existing Air-Pak SCBA waist strap
• Waist belt is available as a jettison configuration (removable from the SCBA) or a fixed configuration (non-removable from the SCBA)
3M™ Scott™ EPIC 3 RDI Voice Communications

The EPIC 3 Radio Direct Interface (RDI) voice amplifier enhances SCBA facepiece voice intelligibility and delivers clear two-way radio communications when operated with compatible handheld field radios and remote speaker microphones (RSM).

Compatible with all 3M Scott AV-series facepieces and Air-Pak SCBA, the EPIC 3 RDI provides 3M Scott customers with the safety and operational benefits of enhanced tactical voice communications while extending the value of their SCBA and personal protection equipment.

- Clear communication when and where you need it
- Operates with compatible handheld field radios and remote speaker microphones
- Works with a broad range of 3M Scott SCBA and PPE equipment
- Multi-purpose utility consolidates devices while reducing costs
- User friendly operation and ergonomics
- Durable, reliable purpose-built design with high-heat rated construction
- Easy and flexible device configuration

3M™ Scott™ EPIC 3 RI Voice Communications

The EPIC 3 Radio Interface (RI) voice amplifier and Lapel Speaker Microphone enhances SCBA facepiece voice intelligibility and delivers clear two-way radio communications when operated with a broad range of handheld field radios.

Compatible with all 3M Scott AV-series facepieces and Air-Pak SCBA, the EPIC 3 RI system provides 3M Scott customers with the safety and operational benefits of enhanced tactical voice communications while extending the value of their SCBA/PPE and field radio equipment.

- Clear communication when and where you need it
- Works with a broad range of 3M Scott SCBA and PPE equipment
- Operates with a broad range of field radios
- User friendly set-up and operation
- Durable, high-heat rated construction
- Easy and flexible device configuration
3M™ Scott™ SEMS II Pro Wireless SCBA Telemetry

The SEMS II Pro wireless SCBA telemetry system enables vital communication between responders and incident command. Leveraging a patented mesh network, SEMS II Pro provides a robust connection in commercial and residential structures alike. SCBA telemetry is transmitted to the base station and can be displayed in the Monitor application giving the incident commander an enhanced view of the fireground.

- Patented, self-healing mesh network
- Bi-directional communication of alarms and acknowledgments between responder and incident command
- Real-time SCBA telemetry system providing air level, PASS alarm and evacuation status
- Approved as an NFPA 1982, 2018 edition RF communicating PASS device when used with Monitor telemetry software solution
- Electronic PAR (ePAR) for improved accountability
- System integrity alarm
- High-flow and no-flow alert notifications

3M™ Scott™ Monitor Telemetry Software Solution

The Monitor telemetry software solution puts critical, real-time responder SCBA information at incident command’s fingertips. Designed for use on modern, touch-enabled PCs, this easy-to-understand air management solution allows incident command to see air, PASS and EVAC data available while establishing and maintaining command. Additional alert notifications – high flow or no flow condition at full-alarm PASS – provide incident command with enhanced situational intelligence to guide critical decision making. Monitor’s automated design complements existing accountability and incident command SOGs without the burden of additional work.

Monitor Pro Package, paired with SEMS II Pro, further enhances communications by giving incident command the ability to electronically call for PAR (ePAR) with a simple click or tap of a button on the user interface, reducing excess radio traffic while still maintaining personnel accountability.

- Works with all 3M Scott Air-Pak SCBA equipped with SEMS II and SEMS II Pro
- Automatic acceptance of devices at base station
- Alert view for quick recognition of the most critical information
- Touch-friendly interface for enhanced usability
3M™ Scott™ Pak-Tracker Firefighter Locator System

The 3M Scott Pak-Tracker Firefighter Locator System is a tool designed to help locate a trapped or downed firefighter within a single or multi-story structure. The Pak-Tracker transmitter is a standard feature on all Air-Pak X3 Pro SCBA equipped with an integrated PASS device. The rugged, simple-to-use hand-held receiver functions on the principle of 2.4GHz RF signal strength received and is an invaluable tool when searching for downed firefighters.

- Hand-held receiver can monitor and scroll up to 36 alarming SCBA
- Utilizes three visual and audible indicators to direct the searcher to the victim(s)
- Easy-to-use, glove-friendly, push-button operation
- Automatic activation of integrated system upon SCBA air activation
- High-intensity LED lights indicate battery power and signal strength
3M™ Scott™ RIT-Pak Fast Attack Emergency Air Supply System

The RIT-Pak Fast Attack offers a small, lightweight, and compact solution for rapid entry and air replenishment to a firefighter in distress. Developed with input from firefighters and instructors across the country, the RIT-Pak Fast Attack provides an intuitive design enabling RIT teams to focus on locating and assessing the downed firefighter. The system is comprised of a pressure reducer, high-pressure charging wand, low-pressure air supply hose, mask-mounted breathing regulator, facepiece, and a lightweight carrying bag.

- Small, lightweight, and compact
- Available in 4.5 or 5.5 cylinder pressures
- Available in two bag sizes: small and medium
- Compatible with 15-min and 30-min cylinders
- Compatible with Air-Pak SCBA equipped with Universal EBSS
- Hi-Viz orange with 3M™ Scotchlite™ Reflective Material
- Tactile feel pull handles for easy identification
- External pressure gauge with photoluminescent display
- Distinct, audible low-pressure whistle alarm
- Low-pressure hose and EBSS manifold with auxiliary ports
- Color-coded storage pouches for easy identification
- Carabiners w/captive bar: never lose the carabiner
- Easy-to-remove, adjustable length shoulder strap

3M™ Scott™ RIT-Pak III Emergency Air Supply System

The RIT-Pak III is the fire service industry’s first, all-inclusive portable air supply system and one of the most comprehensive RIT system available on the market. Developed with input from RIT instructors and firefighters from across the country, the RIT-Pak III is field designed and tested. The system is comprised of a pressure reducer, high-pressure charging wand, low-pressure air supply hose, mask-mounted breathing regulator, facepiece, and a highly durable carrying case.

- Available in 2.2, 4.5, or 5.5 cylinder pressures
- Accommodates up to a 75-min cylinder duration
- Compatible with Air-Pak SCBA equipped with Universal EBSS
- Hi-Viz orange with 3M™ Scotchlite™ Reflective Material
- Skid plate for ease of dragging and added durability
- External pressure gauge with HUD style lights
- Audible bell alarm
- Universal-capable, low-pressure hose
**3M™ Scott™ HushAir Connect 7500 Compressor**

**3M™ Scott™ RevolveAir Connect Charge Station**

The HushAir Connect 7500 compressor is the next generation breathing air system with an innovative, simple-to-operate user interface, utilizing a 7500psi design to decrease fill times and increase capacity, in a safer, easier-to-maintain package. The RFID-enabled SmartTouch Controller is able to detect and select how to most efficiently fill nearly any 3M Scott RFID-enabled SCBA cylinder with minimal user input or training.

- Smarter, simpler-to-use, cylinder fill station
- New touchscreen SmartTouch Controller with user access control
- Automatic RFID cylinder data-logging, compliant with NFPA 1989, includes fill date, identification of the person performing the fill, serial number, breathing air source, final cylinder pressure, rated duration, and most recent hydrostatic test date
- Automatic fill pressure selection utilizing RFID technology
- 89% increase in cylinder fills vs. existing 6000psi systems
- One of the quietest compressors on the market
- Available in a range of power options and motor sizes to fit nearly any application
- All components fit through a standard 36” door opening
- Continuous electronic monitoring of system performance, including voltage, pressure, temperature, output, oil life, filter life, general maintenance and system performance
- Remote diagnostic capability and troubleshooting from 3M Scott service technicians
3M™ Scott™ V320 Thermal Imager

Today’s firefighters operate in extreme conditions, where temperatures are capable of rising faster and where visibility is reduced in seconds. Conditions within these environments can put firefighters in situations where their safety is compromised and they must have a complete understanding of the environment. The V320, featuring a 320x240 sensor, and equipped with extended battery life, provides firefighters with mission critical information that enables firefighters to make better decisions in extreme conditions.

- **320x240 High Resolution Sensor** - Provides clear images, enabling firefighters to navigate through limited-visibility conditions
- **Extended Battery Life** - Up to eight-hour runtime with a removable, rechargeable battery
- **Single-Button Operation** - Single-button ON/OFF provides easy deployment. No menus required
- **3.5” High-Contrast Display** - Ensures the image on the display can be seen in multiple light conditions
- **Fast Startup Time** - Ready for use within five seconds of activating the power button – without the use of a standby model
- **Lightweight, Durable Design** - Designed to withstand the extreme conditions
- **Ergonomics** - Ergonomically designed and balanced for comfort with a gloved hand

3M™ Scott™ X380 & X380N Thermal Imager

The X-Series thermal imaging camera provides firefighters with the combination of situational awareness, lightweight design, and robust features. The high-resolution quality enables firefighters to interpret a fire scene and make more-informed tactical decisions.

- **High Resolution Detection** – See more with high pixel resolution (384 x 288) enabling a clear image
- **Tactical Color** – As the temperature increases, colors grow in intensity from gray, yellow, orange, to red. Transparent color capability enables firefighters to see structure through the colorization
- **Menu-Free Performance** - See in multiple environments without the need of selecting modes in a menu
- **Hot-Spot Tracker** - Immediately identify the hottest part of the scene and display its relative temperature. Ideal for overhaul, search and rescue, and risk assessment
- **Cold-Spot Tracker** - Immediately identify the coldest part of the scene and display its relative temperature. Ideal for hazmat environments.
- **Intelligent Focus** – See an object in clear detail, with no manual adjustment required
- Also available as a NFPA 1801 approved camera
Air-Supplied

3M™ Scott™ Ska-Pak AT Supplied Air Respirator

The Ska-Pak AT is the most advanced supplied air respirator from 3M Scott, equipped with the added benefit of a patented, automatic, hands-free air transfer capability. If the primary air supply to the respirator is interrupted, the air source is instantly switched to the portable air cylinder without user intervention. Upon transfer, the Vibralert tactile alarm system activates, vibrating the user’s facepiece and alerting the user that the respirator has transferred to cylinder air. The Ska-Pak AT is ideal for many applications, including confined space operations, hazardous materials clean-up and maintenance jobs for numerous markets, including chemical, petrochemical, oil & gas, ship building and public utilities.

Product Features:

• Automatic, hands-free transfer from external air source to cylinder in the event of primary air source interruption
• Personal, tactile Vibralert alarm lets wearer know their air source has been transferred to cylinder air
• “Onboard” cylinder low pressure indicator for ultimate safety and awareness
• Includes E-Z Flo Pressure Demand Regulator with First Breath Activation and low exhalation resistance for easy breathing and reduced user fatigue
• Three harness styles:
  • A padded Polypropylene harness – chemically-resistant and lightweight
  • A padded Kevlar harness – ideal in high heat environments or when there is potential for sparking
  • An integrated full-body harness – ideal for confined space applications
3M™ Scott™ TRC-1 Air Cart

In continuing the tradition of 3M Scott’s dedication to our customers’ demanding needs, the TRC-1 (Technical Rescue Carts) Air Carts provide an uninterrupted supply of breathing air for up to eight users simultaneously. The TRC-1 Air Cart also features a unique air control switch that has the ability to utilize common or isolated air sources on the left and right outlet banks. When in isolated mode, this enables the cart to provide two separate, dedicated air sources for both a primary work team and a rescue team.

Product Features:

- Eight outlet ports which can provide an uninterrupted supply of breathing air for up to eight respirators simultaneously
- High-pressure inlet supply connector enables use of a high-pressure air supply such as a compressor or cascade system
- Air source selector switch for the ability to utilize common or isolated air sources on the left and right outlet banks; this enables the cart to provide two separate, dedicated air sources for both a primary work team and a rescue team utilizing cylinders and the high-pressure inlet supply
- Independent, fail-safe-open, sealed regulators on the respirator and the auxiliary supply side provides for independent adjustment of outlet pressures
- Loud, aspirating end-of-service whistle alarm indicating low cylinder pressure and a loud, pneumatic end-of-service bell indicating low-pressure condition on the auxiliary high-pressure inlet source
- Internal check valve to prevent manifold contamination with use of tools
- Manufactured for use with 2216, 4500 and 5500 psi cylinders
3M™ Scott™ C420 Plus PAPR

The 3M Scott C420 Plus PAPR is designed for use in CBRN and non-CBRN applications, and provides a cooling effect that extends user wear times in humid environments and long-duration operations, such as decontamination or rescue. It also keeps the facepiece from fogging. Decontamination is made easy with detachable parts that can be cleaned according to the situation encountered.

- The 3M Scott C420 Plus PAPR can be used for CBRN and non-CBRN applications.
- Approved for both NIOSH CBRN and NIOSH 42 CFR, part 84 applications
- Rechargeable and single use batteries to support long work hours
- PVC-coated belt for easy decontamination
- Two cartridge design for lower overall cost
3M™ Scott™ 40MM Series Cartridges and Canisters

3M Scott offers multiple 40mm cartridges and canisters for wide range of protection and applications:

**NIOSH** - APR applications: utilize HE/P100 Cartridge, MPC PLUS, or Enforcement Cartridges

**NIOSH** - PAPR applications: utilize HE/P100 Cartridge, MPC PLUS, MPC 40PF and Enforcement Cartridges

**NIOSH CBRN** - APR and PAPR applications: utilize the CBRN Cap-1 / Canister

- Protection for industrial and CBRN response
- 40mm thread enables air-purifying and powered air purifying use
- 5-10 year shelf life, depending on cartridge