

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



Question

What is the 3M™ Scott™ Ska-Pak AT Supplied-Air Respirator (SAR)?

Answer

Designed to enhance worker confidence, the Ska-Pak AT is 3M's most advanced pressure-demand supplied-air respirator.

The Ska-Pak AT SAR is a combination Type C positive pressure respirator with escape cylinder for entry and escape from hazardous atmospheres, confined space or immediately dangerous to life or health (IDLH) environments.

Equipped with the added benefit of an automatic, hands-free air transfer capability, it is designed as an airline working set that also provides emergency respiratory protection and escape capability with its hip-mounted cylinder in the event of primary air source interruption to help reduce worker distress.

Question

Where can the Ska-Pak AT SAR be used?

Answer

The Ska-Pak AT SAR can be used in environments that are IDLH or could become IDLH.

The Ska-Pak AT SAR is ideal for many applications, including confined space operations, hazardous materials handling, and general maintenance jobs for numerous markets, including chemical, petrochemical, oil and gas, ship-building and public utilities.

Question

What does the Ska-Pak AT consist of?

Answer

The respirator consists of an adjustable harness to support the respirator on the body of the user, a cylinder and valve assembly for storing compressed breathing air, an automatic transfer pressure reducing regulator and coupling mounted on the cylinder valve, a cylinder pressure gauge with an electronic alarm, an airline connection hose, a hose assembly connecting the pressure reducer to the mask-mounted regulator (MMR) with Vibralert, and a full facepiece assembly.

Question

What is the Automatic Transfer (AT)?

Answer

The Automatic Transfer mechanism is a hands-free transfer that can detect an interruption in the supplied-airline air pressure and automatically switch to the breathing cylinder while warning the user through the Vibralert tactile alarm that the respirator has transferred to cylinder air by vibrating the facepiece.

Question

What are the key features of the Ska-Pak AT Supplied-Air Respirator?

Answer

- Type C combination Supplied-Air Respirator with escape cylinder that is NIOSH approved to provide respiratory protection during entry into, work in and escape from hazardous, confined space, or immediately dangerous to life or health (IDLH) situations.
- Hands-free, Automatic Transfer (AT) pressure reducer which can detect an interruption in the supplied-airline air pressure and automatically switch to the breathing cylinder.
- E-Z Flo Regulator with Vibralert (Audible & Tactile end-of-service time indicator alarm).
- The E-Z Flo Regulator with Vibralert is designed for easy use with gloved hands, enables easy breathing, and has a twostep secure attachment and removal to help ensure worker confidence.
- Option to choose the E-Z Flo Vibralert Regulator with Quick Disconnect (QD) fitting for easy removal from SAR when needed.
- A cylinder valve mounted pressure gauge.
- A remote pressure gauge with 90% air visual alarm (LED).
- E-Z Klip cylinder retention system for quick, easy cylinder change out.
- Two padded harness styles: Fire Resistant Kevlar® or nylon harness either equipped with shoulder padding for worker comfort.
- Multiple cylinder pressures, durations, and airline connector options.
- Top-Down Convertibility.

Question

How is air supplied?

Answer

Breathing air is supplied to Ska-Pak AT SAR from a remote source. This source may be a permanent or portable cascade system, or an in-plant system for compressed breathing air.

Question

What type of supply air should be used?

Answer

As a Type C respirator, the Ska-Pak AT SAR requires an air supply that meets the requirements of the Compressed Gas Association (CGA) for Grade "D" or better breathing air. These requirements include air containing no less than 19.5 percent oxygen.

Complete information on CGA requirements may be obtained by requesting the Commodity Specification for Air from CGA Inc., 14501 George Carter Way, Suite 103, Chantilly, VA 20151-2923.

Question

How do I know whether I am breathing airline air or escape cylinder air?

Answer

When there is a switch-over to cylinder air, the audible and tactile Vibralert alarm will vibrate on the user's face acting as a personal alarm letting the user know they are breathing from the escape cylinder and should evacuate.

Question

How does the Ska-Pak AT SAR take advantage of 3M Scott's Top-Down Convertibility?

Answer

The Ska-Pak AT SAR is compatible with 3M Scott's AV-series facepieces, offering Scott's Top-Down Convertibility. This design platform, pioneered by 3M Scott, allows one facepiece to be used with numerous respiratory protection products, from supplied-air to air purification.

Versatility of facepiece helps lower cost of ownership through reduced fit testing, simplified training, and simplified inventory requirements.

Question

Does the Ska-Pak AT SAR have an electronic alarm?

Answer

Yes. The Ska-Pak AT utilizes a remote pressure gauge with an electronic alarm. The electronic alarm red light will continuously flash if the escape cylinder pressure has dropped below 90% (+/-5%) of full volume, indicating to an airline disruption.

Question

Does the Ska-Pak AT SAR utilize an End-of-Service Time Indicator (EOSTI)?

Answer

Yes. The Ska-Pak AT utilizes the Vibralert tactile alarm which warns the user with both an audible and tactile warning that the air supply hose pressure has been disrupted and the respirator has transferred to the cylinder air, indicating it is time to leave the potentially hazardous environment.

Question

What airline couplings are available for the Ska-Pak AT?

Answer

The Ska-Pak AT is available with Hansen, Schrader, CEJN, Hansen HK plug or Hansen HK socket industrial air interchange fittings. The variety of couplings gives users the opportunity to select a specific air supply as a dedicated source of breathing air.

Question

Is the Ska-Pak AT SAR approved to the latest standards?

Answer

The Ska-Pak AT SAR is approved to NIOSH 42 CFR Part 84.

Question

What is the shelf life for the Ska-Pak AT SAR?

Answer

Providing the apparatus is serviced regularly in accordance with the service requirements detailed in the Ska-Pak AT Service Manual, there are no shelf life limits.

Aluminum-lined, carbon fiber-wrapped cylinders are subject to the lifespan requirements of the US Department of Transportation (DOT).

However, the electronic alarm battery needs to be replaced when the low battery yellow light appears on the electronic alarm.

Question

Why does the Ska-Pak AT SAR offer 2 different Harness Options?

Answer

The different harness options are available for different application needs. The two harness styles are:

- Padded Nylon that is designed to be comfortable and lightweight.
- Padded fire-resistant Kevlar® for high heat environments or when there is potential for sparking.

Question

What escape cylinder options are available?

Answer

Available with the following rated cylinders:

- 3-minute 2216 psi aluminum.
- 5-minute 3000 psi carbon.
- 10-minute 3000 psi carbon.
- 15-minute 4500 psi carbon.

Question

Can the Ska-Pak AT SAR connect to a 3M Scott external air source?

Answer

Yes. The Ska-Pak AT SAR can be connected to the 3M[™] Scott[™] portable air sources to build a complete supplied-air system such as the 3M[™] Scott[™] Mobile Air Cart or the 3M[™] Scott[™] TRC-1 (Technical Rescue Carts) Air Cart.

These external air sources accommodate various compressed air cylinder quantities, sizes and can provide an uninterrupted supply of breathing air for several respirator users.

Question

What is the maximum length of hose that may be used to supply air to the Ska-Pak AT SAR?

Answer

When employed as an entry/egress system with Hansen, Schrader or CEJN couplings, the Type C airline respirator is capable of being used with up to 300 feet of airline hose (including a maximum of 12 individual segments).

When Hansen HK fittings are employed, the respirator shall be capable of being used up to 150 feet with a maximum of 6 airline segments from the air source.

3M™ Scott™ Airline Hoses are available from 3M™ Scott™ Fire & Safety in Black neoprene rubber material.

Question

Can the air supply pressure for Ska-Pak AT SAR exceed 125 psig?

Answer

An air source exceeding 125 psig may be used providing the pressure can be reduced to the Ska-Pak AT's pressure range. The air source must have a safety pressure relief valve to prevent pressures greater than 125 psi from reaching the end user.

Question

What is the minimum air supply requirement for Ska-Pak AT SAR?

Answer

The air supply system must be capable of maintaining the air pressure at the point of attachment of the supply hose to the air supply system at no less than 80 psig.

Question

What type of maintenance is required?

Answer

Routine maintenance requirements are described in Ska-Pak AT's operating and maintenance instructions, which are shipped with each unit.

Question

Where can I get service for the Ska-Pak AT should it be required?

Answer

3M™ Scott™ Fire & Safety offers an extensive service center network. Authorized technicians can quickly perform any required service, ensuring that critical safety equipment is repaired and placed back into service with minimal downtime.

