

# Fire Communications

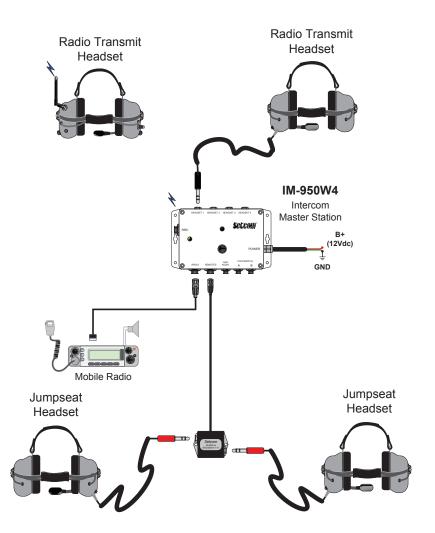
Firefighters have relied on Setcom's communications equipment for over forty-five years. A pioneer in the field, Setcom is still an industry leader because it works with users to develop the kind of innovative, tailor-made products professionals depend on. Public safety professionals in all fifty states, most major U.S. cities, and more than twenty countries worldwide rely on Setcom.

# Tradition of Quality, Experience and Innovation

- Premier communications systems and accessories for all widely-used portable and mobile radios.
- Outstanding quality and durability; time-tested designs: Setcom's products have been designed, engineered and assembled in the USA for over 45 years. Thousands of firefighters rely on Setcom's equipment every day.
- Meticulous attention to quality: No product leaves Setcom without being fully tested. Your satisfaction is our highest priority.
- **Customer-driven innovation:** Setcom will work with you to develop a system that meets your needs.

### **Unequalled Service and Support**

- Dedicated technical support available 55 hours every week.
- Responsive, in-house service department, combined with fully repairable parts and components, decreases your lifetime cost of ownership.
- Two-year warranty on system components and workmanship.



### **Major Product Offerings**

Intercoms	Setcom has an intercom system for nearly every emergency vehicle. Over one thousand structural fire departments and the majority of major aircraft rescue firefighting (ARFF) departments depend on Setcom's equipment.	
Headsets	Setcom offers a variety of headsets for high, medium and low-noise environments.	

Over the years Setcom has solved difficult communications problems by making products for unique applications. If you have a challenging communications problem, please call. Chances are Setcom has, or can craft, a product that will meet your needs.







# **Intercoms**

Setcom makes an intercom system for nearly every emergency vehicle, all backed by quality and service that you can rely on.

Wireless headsets available for intercom systems below. See headset information page.

System	Application	Description	
950	Engines, Pumpers, Aerials, Quints, Brush Trucks, EMS and Other Apparatus	Setcom's most popular and versatile intercom, the system 950 was developed specifically for fire fighters. Its simplicity of design cuts costs, not corners. Its quality is second to none. Plug-n-play components ensure easy installation.	
950W4	Engines, Pumpers, Aerials, Quints, Brush Trucks, EMS and Other Apparatus	The System 950W4 has all of the features of the System 950, with one added benefit. It has an internal wireless module, which eliminates the need to install an additional headset base station for one wireless headset.	
Liberator MAX	Engines, Pumpers, Aerials, Quints, Brush Trucks, EMS and Other Apparatus	Setcom's easiest system to set up and use, with a 1 to 2 box install. Designed for up to 7 radio transmit positions and 8 talk group channels.	
900SP	Engines, Pumpers, EMS, Battalion Chief Vehicles, Marine, and Interior Applicatons	The System 900SP packs an entire one-person system into a rugged single box, with a quick and easy installation. This system allows for communications on up to three radios with a variety of medium-to-heavy duty headsets.	
900SPW4	Engines, Pumpers, EMS, Battalion Chief Vehicles, Marine, and Interior Applicatons	The System 900SPW4 has all of the features of the System 900SP, with one added benefit. It has an internal wireless module, which elimnates the need to install a headset base station for the wireless headset.	
977	Fire Boats, Vessels, Rescue Boats and Open-Air Vehicles.	Setcom's System 950 fitted in weatherproof boxes, with watertight twist-lock connectors for headsets. Ideal for rescue boats and other outdoor applications.	
977W4	Fire Boats, Vessels, Rescue Boats and Open-Air Vehicles.	The System 977W4 has all of the features of the System 977, with one added benefit. It has an internal wireless module, which eliminates the need to install an additional headset base station for one wireless headset.	
1310	ARFF Apparatus	With its unique split audio feature, the System 1310 is the standard for ARFF Apparatus. It allows ARFF professionals to hear the intercom and fire dispatch radio in one ear and the tower radio in the other.	
1600	ARFF Apparatus and Command Vehicles	A four-person, six radio intercom, the System 1600 is ideal for Command Vehicles. It allows crew members to select, monitor and transmit over all six radios.	





# INTERCOM SYSTEM-PROFESSIONAL PRODUCT TABLE

	Professional Use				
Intercom System Series	Vehicle Liberator MAX	900SP/950/977	1300	1600	
Application / Design Description	The greatest advancement in vehicle crew communications. Easiest install, radio integration. 8 talk groups	Setcom's most versatile crew communication system. Highly modular vehicle intercom system that accommodates most situations/radios.	Premier dual radio system. Unique split audio feature allows users to distinguish between simultaneous traffic on 2 different radios.	A 4-person, 6 radio intercom. The System 1600 is ideal for command vehicles. It allows crew members to select, monitor and transmit over all 6 radios simultaneously.	
Recommended # of Radios	1> 2	1> 2	2> 3	3> 6	
Recommended Number of Crew Members	2> 7	1> 10	1> 8	1> 4	
Number of Radio Transmit Positions	1> 7	1> 5	1> 5	1> 4	
Wireless Headset Option	1		✓		
Portable Radio Integration	1	/	✓		
Entertainment Audio (iPod, Weather Radio)		/	✓		
Optional Bluetooth Cell Phone Connection		/	✓		
Vehicle Installation Required	1	1	<b>√</b>	<b>√</b>	
		Applications:			
Civilian Watercraft	1	<b>✓</b>			
Public Safety / Border Patrol Marine Vessels	1	✓	1		
Structural Fire Apparatus	1	1	1		
Incident Command- Battalion Chief Vehicles / Mobile Command Centers	1	✓	1	1	
ARFF Vehicle	1		1	1	
Workboats	1	/	1		
Trains	1	/	1		
Transit Systems	1	<b>✓</b>	1		
Wild Land Fire / Brush Trucks	1	1	1		
Industrial Situations	1	<b>✓</b>	1		



## LIBERATORMAX PUBLIC SAFETY SYSTEM

Introducing LiberatorMAX, the most advanced communications system for fire apparatus. Multi-person system that is versatile and simple to use, making it a great solution for communication needs in many public safety applications. Easiest install on the market with only one base station required for all wireless headsets to be connected.

- Up to 7 radio transmit and/or intercom positions.
- 16 talk group channels.
- No syncing / pairing.
- Ability to integrate portable radio into the headset allowing the user to simultaneously communicate over the portable radio, mobile radio, and intercom.
- Range: Up to 1,500 feet (line of sight).
- Premium dual-speaker headset with noise reduction rating of 23dB.
- "Instant On" Advanced motion sensor technology is integrated into the headset. The headset shuts down after 15 minutes of inactivity and will automatically turn back on when the user picks up the headset.
- Full duplex intercom communications without any push-to-talk (PTT) or vox settings required.
- 15 hours battery life.
- Waterproof, noise-cancelling microphone for rugged conditions.
- Charge anywhere with a 120VAC to 12VDC wall charger or 12VDC power supply.
- Heavy-duty and durable design to extend life in a demanding environment. Perfect for harsh public safety situations.
- If no mobile radio communication is required, this system can function as a stand-alone system without a base station away from the vehicle. Perfect for search and rescue operations.
- Available in Behind-the-Head Style.

### **Wireless Applications and Uses:**

- Truck-to-truck communication capabilities
- Brush truck/wildland fire apparatus
- Tailboard
- Ladder
- Aerial platform or basket
- Pump operator
- Search and rescue
- Incident Command
- Engines / pumpers
- Fire boat / marine patrol
- Ambulance/ EMS vehicles
- Spotter positions
- Fire training







### Setcom's most popular and versatile intercom, developed specifically for firefighters.

#### The System 900's simplicity of design cuts costs, not corners:

- With outstanding durability and a 25-year legacy, the System 950 is a top-quality intercom that has been put to the test by thousands of fire departments.
- This modular system accommodates up to three radios, ten firefighters and fourteen positions, including eight intercom positions.
- Plug and play components and the fewest components of any leading system make the System 950 easy to install, saving you
  time and money.
- Repairable parts decrease the lifetime cost of ownership, and fast repair turnaround decreases downtime.
- Setcom stands behind every system with dedicated technical support staff and an in-house service department.

### **Specifications:**

Master Station	<ul> <li>Full-duplex intercom, allowing normal conversation among firefighters</li> <li>All firefighters hear both radio and intercom traffic</li> <li>Protection against radio frequency interference (RFI), electro-magnetic interference (EMI) and ground loops</li> <li>Audio input jack allows crew to enjoy entertainment audio in non-emergency situations</li> <li>Available with optional driver's and officer's footswitches</li> </ul>		
Headsets	<ul> <li>Noise reduction rating (NRR) of 23dB, meeting NFPA 1500 and OSHA regulations</li> <li>Volume controls and push-to-talk (PTT) buttons in the headsets make the system easy to install, use an</li> <li>Radio PTT in headsets keys the radio; only the keying headset transmits over the radio</li> <li>Radio transmit headsets are always live on the intercom; available with portable radio adapter cables (I use with portable radios</li> <li>Intercom PTT in jumpseat headsets permits intercom access and prevents unwanted noise from vacant posterior coil-cord eliminates the need for extension cables</li> <li>Cadmium-bronze, coil-cord conductors prevent broken conductors and intermittent audio</li> </ul>		
Speakers	<ul> <li>Rigidly mounted in the headset to prevent broken leads</li> <li>Specifically designed for radio traffic in the voice frequency range</li> </ul>		
Microphone	<ul> <li>Waterproof, amplified microphone provides excellent noise cancellation, a superior signal-to-noise ratio and voice transmission</li> <li>Flexible-boom with counter-wound beryllium-alloy springs resists work-hardening and fatigue</li> </ul>		
Cabling	<ul> <li>Double shielded cabling (one shield on the microphone line and another on the overall cable) prevents radio frequency and electro-magnetic interference</li> <li>Interconnecting cables are fitted with waterproof connectors</li> </ul>		
Warranty	Two years		

### **Components:** The System 950's versatile components make it suitable for most fire apparatus.

setcom



System 950W4

Jumpseat Extension Station





Pump Panel/Tailboard Station

CSB Series Headset



# 900SP Single-Person System





# 900SP/900SPW4

An advanced single-person system for industrial vehicle, workboat, and interior building applications, the System 900SP allows for communications on up to two radios with a variety of wired or wireless, medium-to-heavy duty headsets.

The modular system can accommodate up to:

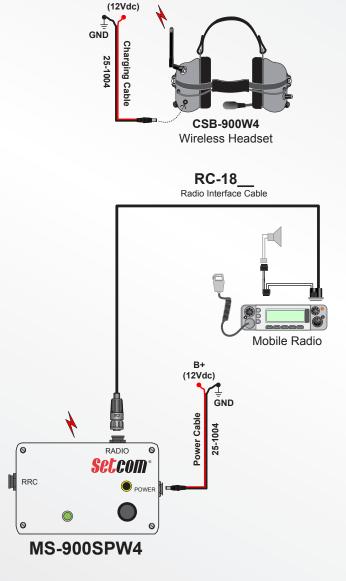
- 2 radios
- 1 user
- 1 primary and 1 remote station (optional)

Plug and play components and the fewest components of any leading system make the 900SP the easiest and fastest wireless system on the market to be installed and deployed. The option to have a wireless module integrated internally in the System 900SP housing makes the system highly versatile for today's advanced industrial applications.

900SP options can be found on the next page.

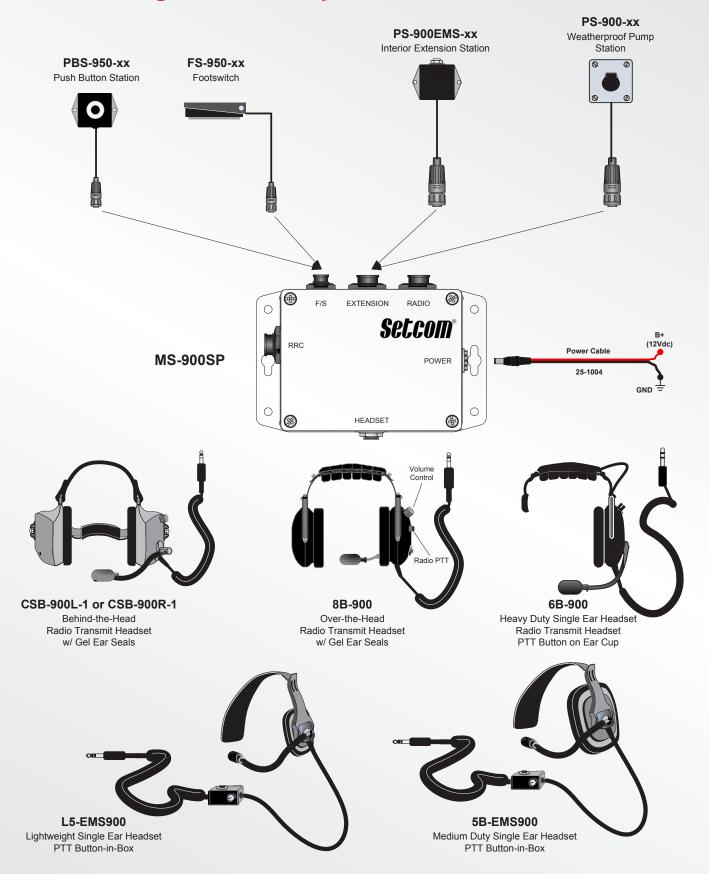
# **900SP Sample Diagram RC-18** Radio Interface Cable B+ (12Vdc) Mobile Radio Power Cable EXTENSION RADIO Setcom RRC POWER 0 HEADSET **MS-900SP** 6B-900 Heavy Duty Single Ear Headset Radio Transmit Headset PTT Button on Ear Cup

### 900SPW4 Sample Diagram





# 900SP System Options





# Headsets

#### Setcom offers a variety of headsets for high, medium and low-noise environments.

#### Setcom's headsets feature:

- Outstanding quality and durability
- Compatibility with the full range of Setcom intercom systems
- Wireless and wired options available
- Refurbishment program which dramatically extends useable life, even in the most demanding environments
- Variety of volume control and push-to-talk options:
  - When used with a Setcom intercom system, the volume control(s) and push-to-talk button(s) are typically either located in the headset or integrated into the intercom system's master or remote stations.
  - For single headset applications, volume control and push-to-talk button are offered in a number of designs, including in the headset and in-line.

#### **Headset Alternatives**

#### **Liberator Wireless Headsets**

- "Instant On" Advanced motion sensor technology has been integrated into the Liberator headset for ease of use and increased battery life
- Up to 1200 ft range. Typical Range 300ft.
- Up to 30 hours of continuous talk time allows for more uses with fewer charges
- Available in Behind-the-Head styles
- Encrypted wireless link for maximum security
- Noise reduction rating of 23dB

#### CSB Series Headsets - Behind the Head

- Premium dual-speaker headset with a noise reduction rating of 24dB
- Cut-away ear cups allow headset to be worn under most helmets
- Waterproof, flexible-boom microphone provides excellent noise cancellation, a superior signal-to-noise ratio and clear voice transmission
- The standard for most System 950 and 977 applications

#### 8B Series Headsets - Over the Head

- Premium dual-speaker headset with a noise reduction rating of 23dB
- Over-the-head headband and innovative noise insulation contribute to a lightweight headset that is more comfortable than most high-noise headsets
- Microphone swivels 270 degrees allowing headset to be worn right or left dress (except with Setcom's System 1310)
- Waterproof, flexible-boom microphone provides excellent noise cancellation, a superior signal-to-noise ratio and clear voice transmission
- The standard for most System 1310 applications as well as other extended-use applications in high-noise environments





# Headsets (cont.)

#### 6B Series Headsets - Single Ear / Over the Head

- Rugged, single-ear headset for medium-to-low noise industrial environments
- Comfortable for extended use applications such as command centers where having one ear open helps with communication
- Swivel boom allows headset to be worn right or left dress
- Waterproof, flexible-boom microphone provides excellent noise cancellation, a superior signal-to-noise ratio and clear voice transmission

#### 5B Series Headsets - Single Ear

- Rugged, lightweight single-speaker headset for low-noise environments
- Extremely comfortable for extended-use applications such as dispatch or command centers as well as EMS patient care
- Swivel boom allows headset to be worn right or left dress
- Waterproof, flexible-boom microphone provides excellent noise cancellation, a superior signal-to-noise ratio and clear voice transmission

#### L5 Series Headsets - Single Ear / Lightweight

- Lightweight headset for low noise environments
- Electret microphone and single speaker
- Extremely comfortable for extended-use, light duty applications such as dispatch or control centers
- Stainless steel, swivel boom allows headset to be worn right or left dress
- Radio connectors available for all commonly used portable radios





# **Liberator Wireless Headset**

Setcom Corporation brings you the next generation of headsets for fire apparatus intercom systems. Beyond its state-of-the-art features, our wireless headset is the most functional and durable wireless headset available.

#### The Liberator Wireless Headset Features:

- Backward compatibility with existing wired Setcom 900, 900SP, 950 and 1300 systems
- Installs within minutes on Setcom 950 and 1300 ARFF systems
- Backward compatibility with all major fire apparatus intercom systems from other vendors
  - Installs within minutes on other systems

### **Specifications**

#### **Liberator Wireless Headsets**

- Up to 1200 feet of range (line of sight). Typical fireground range 300ft.
- "Instant On" No need to turn the headset on and off. Advanced motion sensor technology has been integrated into the Liberator Headset. Headset shuts down after 15 minutes of inactivity and will automatically turn back on when the firefighter picks up the headset.
- Up to 30 hours of continuous talk time allows for more uses with fewer charges
- Encrypted wireless link for maximum security
- Elimination of some cables reduces intercom installation time and cost
- Ability to integrate portable radio into the headset allowing the firefighter to simultaneously communicate over two radio channels. (Fireground and Dispatch)
- Premium dual-speaker headset with noise reduction rating of 23dB
- Heavy-duty and durable design to extend life in a demanding environment
- Available in Behind-the-Head Style
- · Will operate while plugged into vehicle's power
- Direct cell phone integration capability (optional)

### **Wireless Applications and Uses**

- Pump-panel
- Ladder
- Incident scene / fireground
- Tailboard
- Aerial platform or basket
- Brush truck / wildland fire apparatus

### Warranty

Two years

### **Components**



## **Components**







System 900SPW4 System 950W4 1300 Intercom

# **BLUETOOTH-ENABLED CELL PHONE INTERFACE**

- Only Setcom offers an interface to your wireless headset and vehicle intercom system with a Bluetooth-enabled cell phone.
- Integration applications include:
  - Interfacing a cell phone into a Battalion Chief's vehicle command post communication system
  - Allowing paramedics to easily speak over the phone with doctors while in route to the hospital
  - Adding cell phone capabilities to a mobile command center intercom system
  - Communicating with non-traditional information sources while on the fireground

### Direct Connection via Liberator Wireless Headset

- Command Center on Your Head Communicate with all important radio / audio devices with a single headset. With the Liberator headset, you're able to connect to:
  - up to 3 mobile radios
  - a portable radio
  - a cell phone
  - apparatus intercom system
  - entertainment audio source plugged into System 950 intercom
- Easy to Use Simply press a switch and you are connected to your cell phone in less than two seconds.
- Direct Connection to Mobile Phone No interface box between the Liberator wireless headset and mobile phone.
- Hear Your Call Let the 23dB noise attenuation of your Liberator headset reduce the background noise so that you can effectively hear the caller on the other end.
- Only from Setcom Only manufacturer to offer a direct connection to your wireless device from the Liberator wireless headset via the Bluetooth standard.







Designed in partnership with one of the nation's largest aircraft rescue firefighting (ARFF) departments, Setcom's System 1310 is the premier dual radio system and a standard among major U.S. airports.

#### The System 1310 addresses the communications challenges of ARFF departments like no other system:

- The system's unique split audio feature allows you to clearly distinguish between simultaneous traffic on two radios.
- Intercom traffic and fire dispatch radio in the left ear; airport tower radio in the right.
- Split audio eliminates switching between radio channels and minimizes the loss of critical radio transmissions.
- Setcom stands behind the system with dedicated technical support staff and an in-house service department.

### **Specifications:**

#### Master & • Separate radio circuits allow simultaneous transmission on both radios from different stations · Sophisticated electronics prevent two crew members from transmitting on the same radio at the same time **Remote Stations** • On-off switch and volume control for each radio • Panel lights indicate when a particular radio is keyed by any crew member · Heavy-duty, three-position push-to-talk (PTT) switch: Center position for "monitor", left for fire radio and right for tower radio • Full-duplex intercom, allowing normal conversation among firefighters • Audio input jack allows firefighters to listen to music in non-emergency situations · Protection against radio frequency interference (RFI), electro-magnetic interference (EMI) and ground loops Split audio: Intercom traffic and the fire radio on one speaker and the airport tower radio on the other Headsets Noise reduction rating (NRR) of 23dB, meeting NFPA 1500 and OSHA regulations • Wireless option available (see insert for more details) • 6-foot coil-cord eliminates the need for extension cables Cadmium-bronze, coil-cord conductors prevent broken conductors and intermittent audio • Rigidly mounted in the headset to prevent broken leads **Speakers** • Specifically designed for radio traffic in the voice frequency range Waterproof, amplified microphone provides excellent noise cancellation, a superior signal-to-noise ratio and clear Microphone voice transmission Flexible-boom with counter-wound beryllium-alloy springs resists work-hardening and fatigue Double shielded cabling (one shield on the microphone line and another on the overall cable) prevents radio Cabling frequency and electro-magnetic interference Interconnecting cables terminated with locking connectors for easy installation and maintenance Two years Warranty

# Components: Setcom has developed components to suit every situation and will gladly configure a System 1310 for your needs.



Master Station 8B Series Headset CSB Series Headset





Designed to provide the ultimate solution for Mobile Incident Command Vehicles as well as ARFF vehicles, Setcom's System 1600 redefines radio interoperability.

The System 1600 addresses the communications challenges of incident command like no other system:

- This system allows crew members to select, monitor, and transmit over all 6 radios in the command center application.
- The unique design provides up to four crew members with the ability to individually control each radio from a remote station.
- The systems allows the departments radio resource to be utilized more effectively. No need to deploy multiple radios at multiple positions.
- Setcom stands behind the system with dedicated technical support staff and an in-house service department.
- Ideal for Mobile Command Vehicles, Battalion Chief Vehicles, Incident Command Vehicles and ARFF / Crash Trucks.

### **Specifications:**

#### • Separate radio circuits allow simultaneous transmission on up to six radios Master & System supports up to four radio transmit stations. **Remote Stations** · Sophisticated electronics prevent two crew members from transmitting on the same radio at the same time Each remote station has a separate off-on-PTT toggle switch and volume control for each radio · The radio toggle switch locks up to turn off audio, locks center to monitor incoming radio traffic, and held down momentarily to transmit via the radio (push-to-talk) The intercom locking toggle switch located in the center of the remote station locks up for intercom audio-off, center for intercom listen-only, down for intercom full duplex Interconnect cables are terminated with DB-25 connectors, eliminating any soldering required to install or replace components. Protection against radio frequency interference (RFI), electromagnetic interference (EMI) and ground loops Noise reduction rating (NRR) of 23dB, meeting NFPA 1500 and OSHA regulations **Headsets** Wireless option available (see insert for more details) 6-foot coil-cord eliminates the need for extension cables Cadmium-bronze, coil-cord conductors prevent broken conductors and intermittent audio Rigidly mounted in the headset to prevent broken leads **Speakers** Specifically designed for radio traffic in the voice frequency range • Waterproof, amplified microphone provides excellent noise cancellation, a superior Microphone signal-to-noise ratio and clear voice transmission Flexible-boom with counter-wound beryllium-alloy springs resists work-hardening and fatigue • Double shielded cabling (one shield on the microphone line and another on the overall cable) Cabling prevents radio frequency and electro-magnetic interference Interconnecting cables terminated with locking connectors for easy installation and maintenance Two years Warranty

# **Components:** Setcom has developed components to suit every situation and will gladly configure a System 1600 for your needs.



Master Station 8B Series Headset CSB Series Headset



# OTHER MARKETS

In addition to fire applications, Setcom is a leader in the following markets:



### **Police Motorcycle Communications**

Setcom has been the dominant leader in police motorcycle communications since we pioneered the market in 1970. Ruggedized helmet communications systems for the most demanding riders.



### **Industrial**

With decades of understanding the communications requirements of industrial professionals, Setcom offers many single and multi-person system to enhance your crews' communication capabilities. Our systems also offer the hearing protection they need according to OSHA vrequirements. Headsets and intercoms are available for any high or ultra-high noise environment.



## Marine — Public Safety / Military

Leveraging Setcom's 45 years of experience servicing the communications requirements of public safety vehicles and maritime communications knowledge, Setcom's public safety marine - boat systems are designed for optimal performance on public safety radio systems while on the water.



### **Go-Fast / Airboats**

Whether you call it a go-fast, cigarette, or airboat, these watercrafts are incredibly noisy environments that require superior hearing protection and the ability to guickly and easily communicate with onboard crew and onshore support staff. Setcom provides a number of different intercom configurations for any type of boat.

