

assuredcommunications®

RF-7800S-TR

Secure Personal Team Radio

Secure voice, data, and position for every team member

Completely automatic and hands-free operation

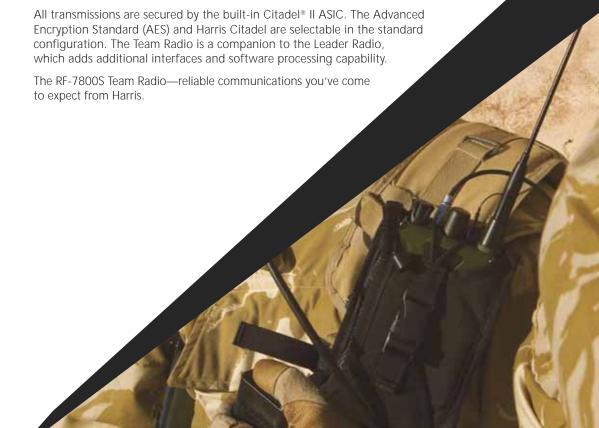
Seamless voice and data integration with upper-echelon neworks

The RF-7800S-TR provides secure, digitized voice and data communications to every member of the team without distracting his or her attention from the task at hand. The radio's small, lightweight design fits easily in a pocket, and may be powered by a rechargeable lithium-ion battery or an optional primary battery holder using commercially available AA batteries.

A unique infrastructureless digital wireless network allows reliable communications even when backbone and trunk services are not available or out of range. The network is designed to provide robust, long-range operation even in the most challenging urban terrain. Full duplex, priority-based voice conferencing allows several simultaneous talkers on the net with an unlimited number of listeners—resulting in a more natural, dynamic operating environment, free from the constraints of a traditional half-duplex radio.

A leader's priority break-in ensures that critical orders are received even when the network is active. The 14-position channel selector may be customized to meet any combination of communication requirements including interoperable voice communications with standard two-way radios and wireless intercom operation. The operator needs only to select the appropriate channel on the selector knob—everything else is automatic. The radio is data-enabled and incorporates a built-in SPS GPS receiver, allowing easy-to-use position tracking and messaging services. A standard USB data interface allows connection of PC or PDA devices for enhanced data applications. A short-range wireless accessory port is included which allows wireless remote control of the radio, including push-to-talk activation.





Specifications for the RF-7800S-TR

Interfaces General Frequency Range 350 to 450 MHz USB 2.0 Multi-function Data Configuration/Control **Channel Spacing** 25 KHz, 500 KHz or 1.2 MHz RF SMA, 50 ohm nominal, unbalanced **Net Presets** 14 programmable presets with talkgroups **Transmitter** 16 kbps FSK or 135/338 kbps GMSK Modulation **Specifications** Voice Operation Full duplex, 3 simultaneous talkers Power Output 2 watts, adjustable to 1 W, 0.25 W **Unlimited listeners** Priority break-in Frequency Stability +/- 1 ppm Selectable VOX or push-to-talk **Data Operation** Simultaneous data and voice Receiver **USB RNDIS Device Specifications** Location (self) Built-in GPS with automatic Sensitivity position report **Audio Output** 0 to 75 dbA with standard Alerts Audible network warnings headphone Battery Rechargeable, 8-hour life, optional alkaline battery pack Standard Features Simultaneous, full-duplex voice **Aux Power** DC input for charging / external for multiple speakers power pack Automatic Whisper Mode USB digital data interface Range Open terrain: 1-2 km Embedded GPS Urban: 500-800 m Jungle: up to 500 m Software Architecture Upgradeable via USB port Included with **Transceiver** Small whip antenna Encryption Selectable Rechargeable li-lon battery FIPS-197 AES 256-bit Operator's card Citadel 256-bit Color Black (FED-STD-595B 37038) or Green (FED-STD-595B 34094) **Optional**

Environmental

(MIL-STD-810F)

Shock/Vibration Ground portable

> **Immersion** 2 meters

Size with Battery 171 x 80 x 35 mm (max)

(maximum envelope)

Radio Weight 300g

Temperature -30 to +65 C



Additional batteries

Lightweight headset Configuration kit Li Ion battery charger

