

BASE STATION AND REPEATER SYSTEMS

**SINGLE/DUAL INTEGRATED,
INTERCHANGEABLE
50-WATT MULTIBAND
SYSTEMS**

Long-Range And

Range Extension

Multimission System With

Quick-Dismount Pull-And-

Go Versatility



The Base Stations & Repeaters are integrated, high-performance multiband radio systems using a suite of battle proven and interchangeable components, including the AN/PRC-152(C) SCA-based handheld radio and the same power amplifier used in the AN/VRC-110 Vehicular Systems. For long-range applications and increased communications reliability, these systems provide the necessary 50 watts in the 30 to 90 MHz frequency range, with multiple power output options available in the 90 to 512 MHz band. Flexible wide-ranging AC/DC input power options are also available.

The advanced architecture of the system ensures this multiband handheld-based system maintains superior performance as a base station or repeater. The AN/PRC-152(C) handheld radio can be quickly removed from the system while remaining powered on during contingency operations.

Covering 30 to 512 MHz, the AN/PRC-152(C) handheld provides SINCGARS, Havequick II, VHF/UHF AM and FM, and MIL-STD-188-181B, with ANDVT voice and data up to 56 kbits/sec. The amplifier features separate VHF and UHF antenna ports with automatic port switching, allowing true multimission capability—the required net is selected via the radio front panel or remote control. Antennas can be pre-configured to support ground communications, ground-to-air, or SATCOM communications. The VHF antenna port provides a 50 watt output from 30 to 90 MHz. The UHF antenna port can be optionally configured for 20 watts from 90 to 512 MHz and 50 watts UHF SATCOM output, reaching aircraft at the horizon and satellites at poor angles.

Other features of the systems include an integrated handheld battery charger (battery remains attached to the radio) with simultaneous operation and charging, hot jerk-and-run capability, LS-671 speaker interface, and advanced heat sinking for an extended-use duty cycle.



Specifications for the Base Station and Repeater Systems

General	
Frequency Range	30-512 MHz
Power Input	Flexible power inputs with 12-32 VDC and 115 or 230 VAC at 47-400 Hz inputs supported
Transmission Modes	FM, AM (90-512 MHz), PSK, CPM
Tuning Resolution	10 Hz
Presets	99
Transmitter	
Output Power	30-90 MHz: 5, 20 or 50 watts PEP 90-512 MHz: 5 watts PEP, Optional 20 watts with 50 watts in SATCOM bands
Harmonic Suppression	Greater than 45 dBc typical
Spurious Suppression	VHF: Greater than 80 dBc typical UHF: Greater than 50 dBc typical
Receiver	
Sensitivity	-112 dBm @ 12 dB SINAD (FM)
Image Rejection	Greater than 80 dB
IF Rejection	Greater than 70 dB
Physical Specifications	
Height	10.2 inches
Depth	13.4 inches
Width	7.5 inches (single channel)
Width	15.2 inches (dual channel)
Weight	23 lbs (single channel), varies per configuration
Environmental	
Temperature	-30°C to 60°C
Shock/Vibe	MIL-STD-810F
Sand & Dust	MIL-STD-810F
Interfaces	
Data	RS-232
Remote Control	RS-232
VHF Antenna Port	50 Ohm BNC
UHF Antenna Port	50 Ohm BNC
Audio	LS-671 compatible
Battery Charger	Six-hour charge time

Radio Interoperability

Crypto Fill Devices	AN/CYZ-10 DTD (supports DS-101, DS-102 and Mode 2/3) KYX-15, KYK-13
Crypto Modes	KY-57, ANDVT/KYV-5, KG-84C, AES, FED-STD-1023, AES
Radios	AN/PRC-117F, AN/PRC-113, AN/PRC-119A/B, AN/PRC-148, AN/PRC-77, PSC-5, AN/PRC-139, XTS-5000, ARC-210, ARC-164, ARC-231

Key Radio Waveforms

SINCGARS
VHF/UHF AM/FM
HAVEQUICK II
MIL-STD-188-181B
HPW

Key Radio Features

SCA v2.2
Sierra II programmable Type-1 crypto
Built-in speaker/microphone
Full numeric keypad
NVG compatible display
MELP
Wireless cloning



Specifications are subject to change without notice.