

## AN/GRC-122, AN/GRC-142, AN/VSC-2, and AN/VSC-3 Radio Teletypewriter Sets

Status: STD-A; NSN: 5815-00-401-9270 (AN/GRC-142)  
 STD-A; NSN: 5825-00-401-9270 (AN/GRC-142A)  
 STD-A; NSN: 5815-00-443-5511 (AN/GRC-142B)  
 STD-A; NSN: 5815-01-100-6815 (AN/GRC-142C)  
 STD-A; NSN: 5815-01-104-7264 (AN/GRC-142D)  
 STD-A; NSN: 5815-01-095-6258 (AN/GRC-142E)  
 STD-A; NSN: 5815-00-401-9719 (AN/GRC-122)  
 STD-A; NSN: 5815-00-401-9719 (AN/GRC-122A)  
 STD-A; NSN: 5815-00-937-5295 (AN/GRC-122B)  
 STD-A; NSN: 5815-01-095-1211 (AN/GRC-122C)  
 STD-A; NSN: 5815-01-104-7264 (AN/GRC-122D)  
 STD-A; NSN: 5815-01-095-1212 (AN/GRC-122E)  
 STD-A; NSN: 5815-00-224-8129 (AN/VSC-2)  
 STD-A; NSN: 5815-00-788-8540 (AN/VSC-3)

Reference: TM 11-5815-334-10 (AN/GRC-122/142 Series)  
 TM 11-5815-331-14 (AN/VSC-2)  
 TM 11-5815-332-15 (AN/VSC-3)

### General Information

The AN/GRC-122 family consists of medium-power, vehicular-mounted HF-SSB radio sets used primarily for RATT operations; however, they are capable of AM and SSB voice and CW operation. With the addition of a Navy standard 1 kw Radio Frequency Amplifier AM-3924/URT and Antenna Coupler AN/URA-38A, the AN/GRC-122 becomes an AN/GRC-122(V)2. This modified version provides the capability for long-range communications of 3,862 km (2,400 mi). The AN/GRC-122 and the AN/GRC-142 are both shelter mounted. The AN/VSC-2 is mounted in a jeep and the AN/VSC-3 in an armored personnel carrier. Except for minor changes, all sets are similar and will replace the older family of RATT sets. The AN/GRC-122 has replaced the AN/GRC-26D. The AN/GRC-142 has replaced the AN/GRC-46. The AN/VSC-2 has replaced the AN/VSC-1. The AN/VSC-3 has replaced the AN/VRC-29. Secure FSK operation is possible when the above sets are used in conjunction with Electronic Teletypewriter Security Equipment TSEC/KW-7 or the TSEC/KG-84A. The TSEC/KY-65 (Parkhill) will be used for secure-voice operation with the AN/GRC-106.

NOTE: The only difference between the AN/GRC-122 and the AN/GRC-142 is that the AN/GRC-122 has an additional receiver-transmitter and teletypewriter set allowing duplex operation.

Technical Characteristics

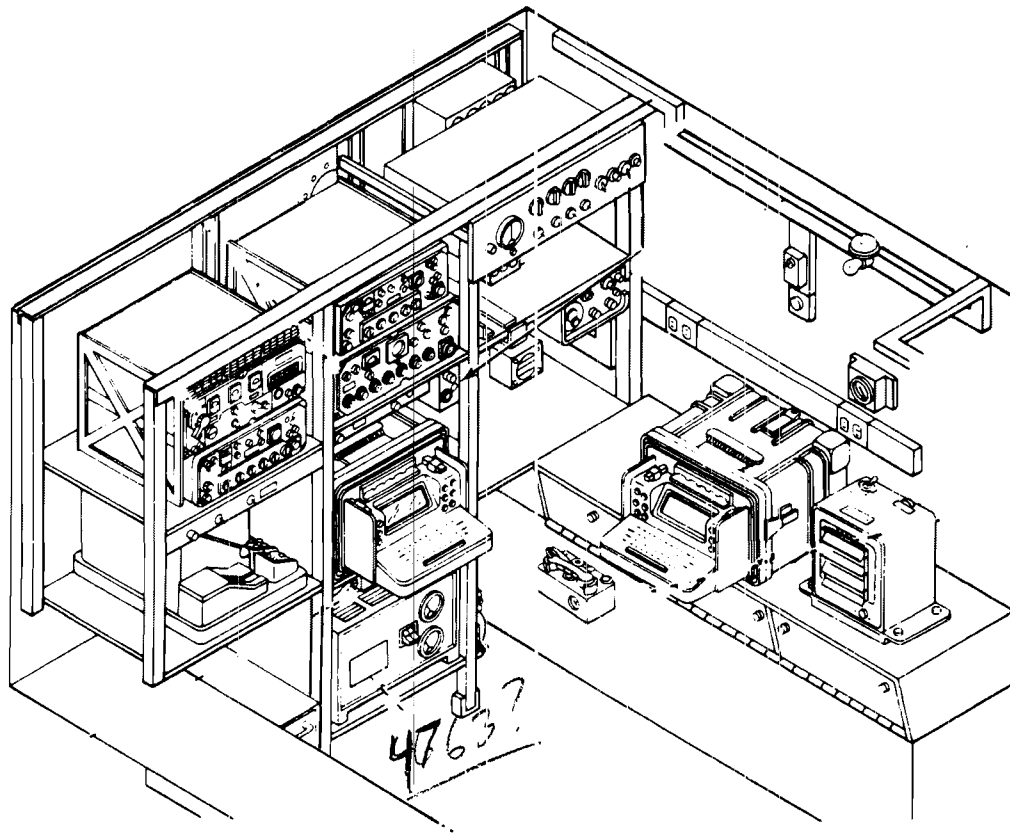
Frequency Range-----2 to 29.999 MHz  
 Planning Range-----Use short and intermediate distance  
 ground wave and sky wave propagation  
 charts (FM 11-486-6)  
 Number of Channels-----RT-662, 28,000 with a channel every 1 kHz;  
 RT-834, 280,000 with a channel every  
 100 Hz  
 Power Input-----28.5 V DC (115 V AC for TT-4, TT-76,  
 TT-98, and UGC-74 is supplied through  
 the control box and inverter)  
 Power Source-----AN/GRC-122/142, vehicle power system or  
 Generator PU-620  
 AN/VSC-2, vehicle power system or  
 Generator PU-675( )  
 AN/VSC-3, vehicle power system or  
 auxiliary power unit  
 Power Output-----3A3A, 3A3J, 400 W PEP; 0.1A1, 1.1A1, 200 W  
 Antenna-----4.57 m (15 ft) whip, or doublet AN/GRA-50  
 Tuning-----Digital  
 Squelch-----Noise  
 Type of Service-----3K00J3E (USB), 3K00R3E (USB), 100HA1A,  
 1K10A1A, and double-sideband AM  
 (receive only)

EQUIPMENT CONFIGURATIONS							
NOMEN	RT-662	AM-3349	MD-522	AN/UGC-74	TT-76	AN/GRA-6	Weight
AN/GRC-122	2*	1	1	2	1	1	831.7 kg (1,832 lb)
AN/GRC-142	1	1	1	1	1	1	769.1 kg (1,694 lb)
AN/VSC-2	1	1	1	1	0	0	681.9 kg (1,502 lb)
AN/VSC-3	1	1	1	1	1	0	661.0 kg (1,456 lb)

\*One RT-662 is used as a receiver only.

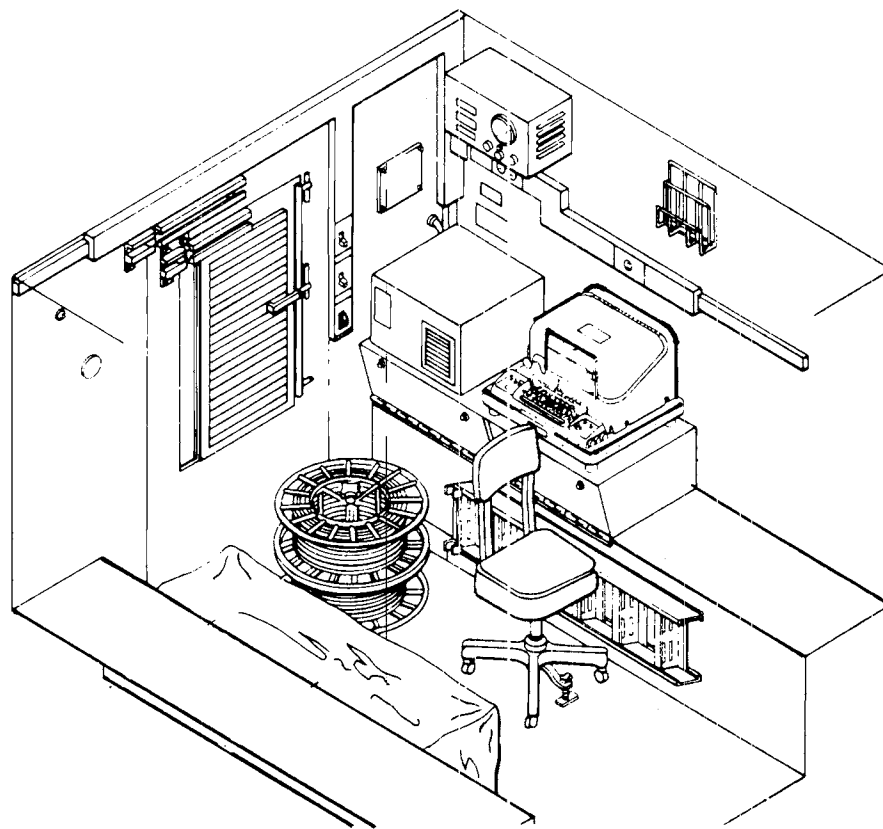
*J-4024*  
*5815-01-215-6183* *DML "A"*

# AN/GRC-122 Radio Teletypewriter Set



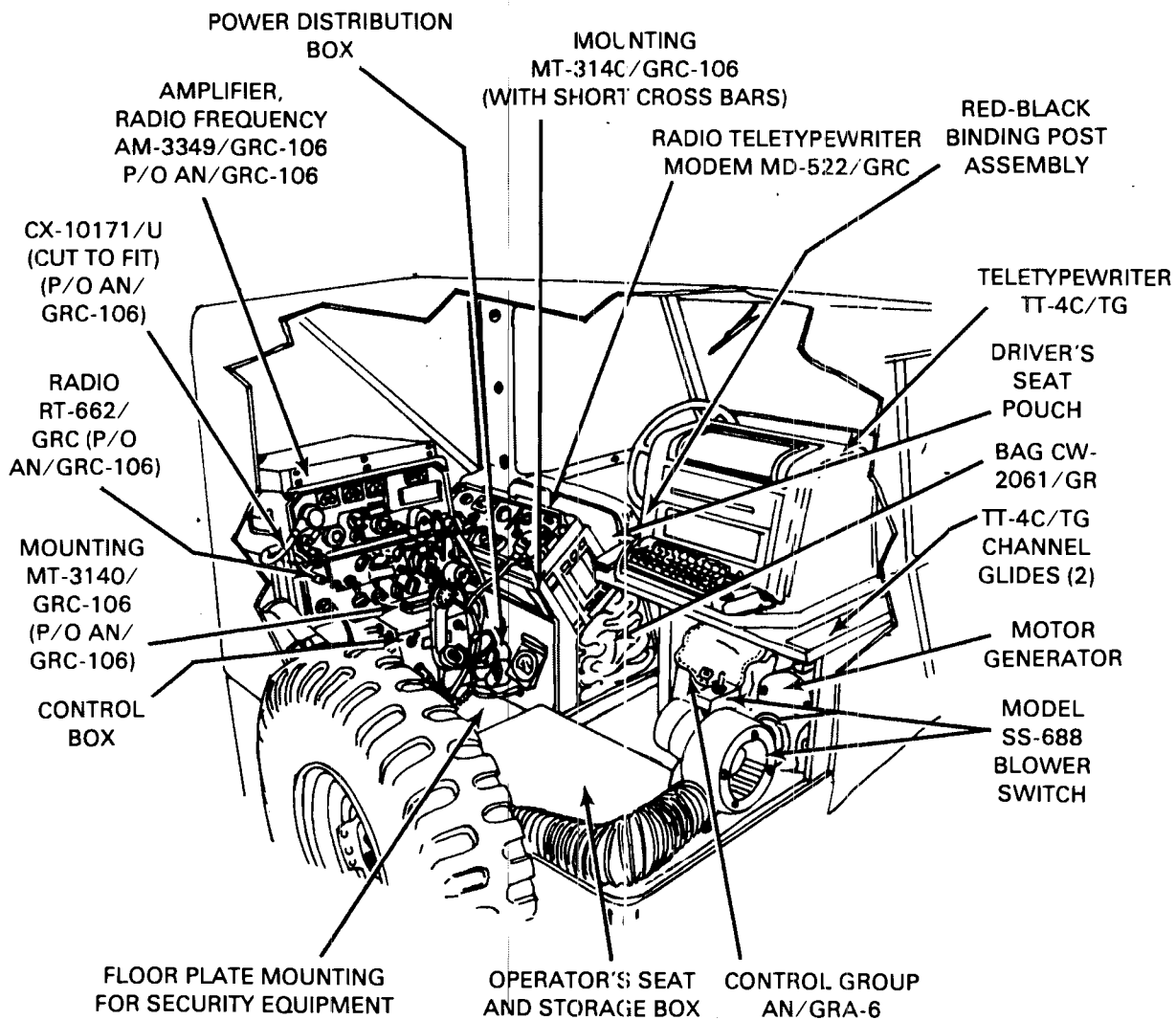
FRONT CURBSIDE VIEW

**AN/GRC-122  
Radio Teletypewriter Set (continued)**



REAR ROADSIDE VIEW

# AN/VSC-2 Radio Teletypewriter Set



# AN/VSC-3 Radio Teletypewriter Set

