

STATUS: Limited Standard

CLASSIFICATION OF EQUIPMENT: Unclassified

USING SERVICE: See note below\*

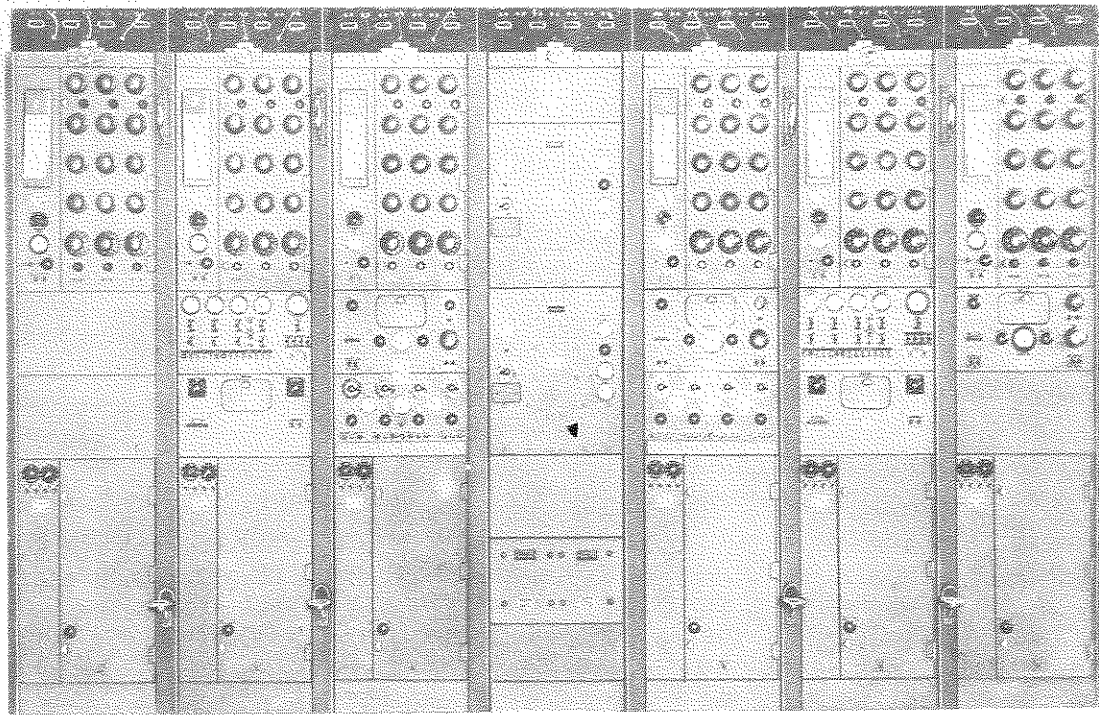
DATE OF THIS SHEET: 29 May 52

**AN/FRR-TYPE**

SERVICE TYPE NUMBER:

RBP, RBP-1 and -2

DIVERSITY RADIO RECEIVING EQUIPMENT



RBP

Diversity Radio Receiving Equipments RBP, RBP-1, and RBP-2 are shore-based dual diversity a-m (cw, mcw, and voice) units. Six h-f superheterodyne receivers may be used, either as two three-set units, three two-set units, or six individual units, for diversity reception of long range signals. A typical installation places the antennas for the respective receivers 1,000 feet apart.

The space diversity system is used to counteract the fading characteristics of long range signals.

Each of the six identical receivers covers the 3- to 24-mc range in three bands, is designed for extreme stability, excellent selectivity, and very high gain and includes automatic gain control.

Signal control panels are used for switching, combining, and monitoring signals.

Three-tone keyer units are used and keying speeds up to 500 dot cps are possible.

For best results, fishbones, rhombics, open V, or other antennas which afford good directional characteristics should be used.

Seven antenna panels are available.

\* RBP: Navy, Army.  
RBP-1, -2: Navy.

<b>AN/FRR-TYPE</b>	:SERVICE TYPE NUMBER	INSTRUCTION LITERATURE: NavShips 900,478; 95250
	RBP, RBP-1 and -2 DIVERSITY RADIO RECEIVING EQUIPMENT	CLASSIFICATION OF EQUIPMENT: Unclassified USING SERVICE: See note below* DATE OF THIS SHEET: 29 May 52

**MAJOR COMPONENTS**

QUANT	NAME OF COMPONENT	DIMENSIONS (IN) INSTALLED	WEIGHT (LBS)
6	RF Amplifier Unit CRV-50096	28 x 19 x 8-1/4	83
6	Intermediate Frequency Amplifier Unit CRV-50097	28 x 19 x 9-1/4	85
2	Signal Control Panel CRV-50099, CRV-50120	10-1/2 x 19 x 5-7/8	17
2	AF Amplifier Unit CRV-50098	10-1/2 x 19 x 10-1/4	32
2	Rectifier Power Unit CRV-20136	21 x 19 x 9-5/8	123

**OPERATIONAL CHARACTERISTICS**

TACTICAL USE: Shore stations.

INSTALLATION: Ground, fixed.

APPROXIMATE RANGE (IN MILES): Long.

CAN COMMUNICATE WITH: AN/ARC-2, -5, -8, -21, -25; AN/ART-13; AN/CRT-3; AN/FRC-10; AN/FRT-5, -6, -15, -17, -18; AN/GRC-9, -13, -26; AN/MRC-2, -6, -16, -20, -22; AN/PRC-7, 19, -20; AN/SRT-4; AN/TRQ-1; AN/URT-2, -3, -4; AN/VRC-1, -4; BC-191, -339, -401, -447, -610; MBS; MQ; OA-60A/FRT, -60B/FRT; RC-52; SCR-177, -188, -193, -274, -281, -399, -499, -506, -536, -543, -585, -694; T-4/FRC, -83/SR, -158/FRT, -159/FRT, -171/FR, -172/FR, -173/FR, -174/FR, -175/FR, -177/FR, -180/FR; TBA; TBC; TBK; TBL; TBM; TBN; TBO; TBU; TBW; TBX; TCB; TCC; TCE; TCH; TCK; TCP; TCS; TCZ; TDE; TDF; TDH; TDN; TDO; TEB; TEC; TEF; Collins 18S-4 (AF Model); Collins 32V-2; Fisher TS 25-3; Marconi TH-41-B Westinghouse Type MW; Wilcox 96D, 99A.

**TECHNICAL CHARACTERISTICS**

FREQUENCY RANGE IN MEGACYCLES: 3 - 24, in 3 bands.

Band 1: 3 - 6.

Band 2: 6 - 12.

Band 3: 12 - 24.

TYPE MODULATION: Am.

TYPE OF SIGNAL: Cw, mcw, voice.

POWER OUTPUT: Telephone: 60 mw into 600 ohms.

Telegraph: 6 db above 1.5 to 12.0 mw with attenuator pad out.

POWER REQUIREMENTS: 813 w, 98 - 125 v, 60 cyc, 1 phase ac.

**PHYSICAL CHARACTERISTICS**

Diversity Radio Receiving Equipment RBP, RBP-1, or RBP-2 measures 88-5/8 x 142-5/16 x 44-5/16 inches.

\* RBP: Navy, Army.

RBP-1, -2: Navy.