

WIRELESS SET No. 62

DATA SUMMARY

PURPOSE

General purpose, low-power, tropicalized, transceiver, providing R.F. and C.W. facilities. Primarily intended for vehicle station but also man- or animal-pack.

DESCRIPTION

Set housed in steel case, with internal 12V rotary transformer. Receiver: normal 8-valve superhet, one R.F. mixer and separate local oscillator, two I.F.s., detector A.V.C., pentode output and beat oscillator for C.W.

Sender: Uses local oscillator plus beat oscillator plus mixer, buffer and P.A.

Modulation, two-stage microphone amplifier. Send-receive switching by pressel key.

PHYSICAL DATA

Weight: 29 lb.

Height: 8½ in.

Length: 17½ in.

Width: 13½ in.

FREQUENCY

Coverage: 1.6—10 Mc/s in two ranges, 1.6—4 Mc/s and 4—10 Mc/s. (8-10 Mc/s to be used only in emergency.)

Internal: I.F., 460 kc/s.

PERFORMANCE

Sensitivity: 3µV for 10mW and signal/noise of 20db.

Range: 14 miles on R/T, 20 miles on C.W. (14 ft. rod.)

Issue 1, 21 Jul. 1945

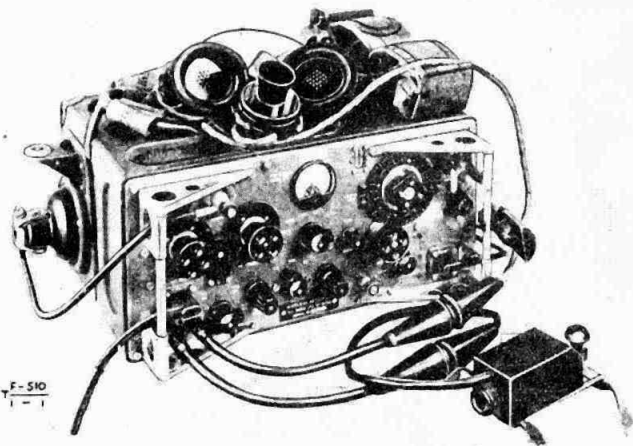


Fig. 1—General view of equipment

TELECOMMUNICATIONSF 218
640'**ELECTRICAL AND MECHANICAL
ENGINEERING REGULATIONS****POWER REQUIREMENTS AND CONSUMPTION**

Battery, secy. port, 12V.
 Consumption : Listening watch, 3.0A.
 Receive, 3.7A.
 Send R/T, 4.6A
 Send C.W., 5.0A.

VALVES

Circuit ref.	Type	Function
V1A	ARP 12	R.F. amplifier, sidetone rectifier
V1B	ARP 12	Mixer
V1C	ARP 12	Local oscillator
V1D	ARP 12	1st. I.F.
V1E	ARP 12	2nd. I.F.
V2A	AR 8	Det. A.V.C., 1st. microphone amplifier
V3A	CV 65	Receiver output sidetone
V3B	CV 65	2nd. microphone amplifier
V4A	ARTH 2	Sender mixer, beat oscillator
V5A	ARP 35	Buffer
V6A	VT 510	Power amplifier

REMARKS

Set is immersion-proof for 5 minutes ; will float.

SPECIAL FACILITIES

Remote aerial up to 50 ft., using Aerial coupling unit J. Remote control by units L up to $\frac{1}{4}$ mile, using D.3, and $\frac{1}{2}$ mile, using assault cable. Junctions, remote control, No. 1 and No. 2 can be used in lieu of Remote control units L. Station includes crystal calibrator.

END