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WITH
"PRACTICAL WIRELESS"
NOVEMBER 1963

Practical Wireless Beginner's SHORT WAVE TWO

PRICE
5/-

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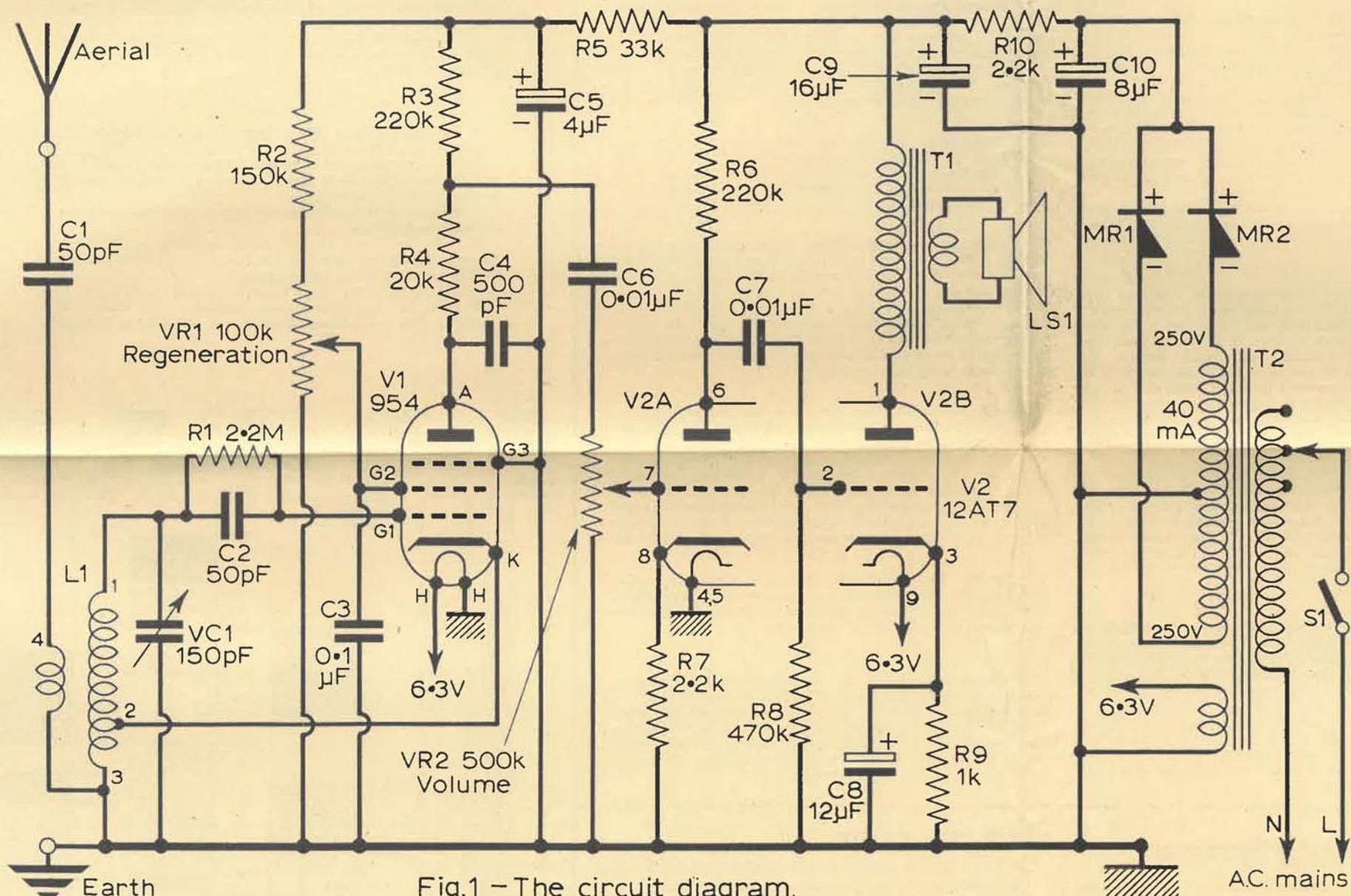


Fig.1 - The circuit diagram.

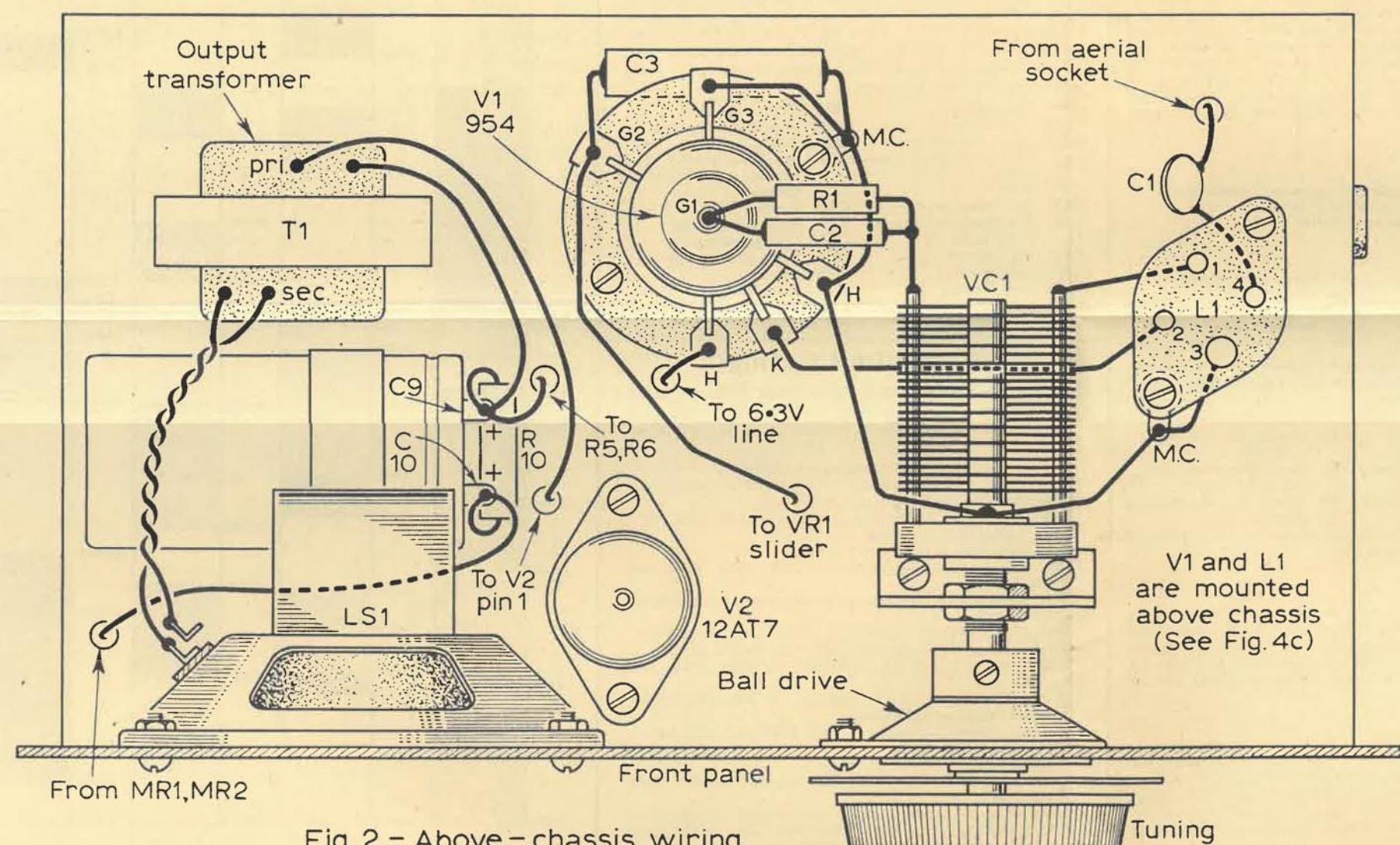


Fig.2 - Above - chassis wiring.

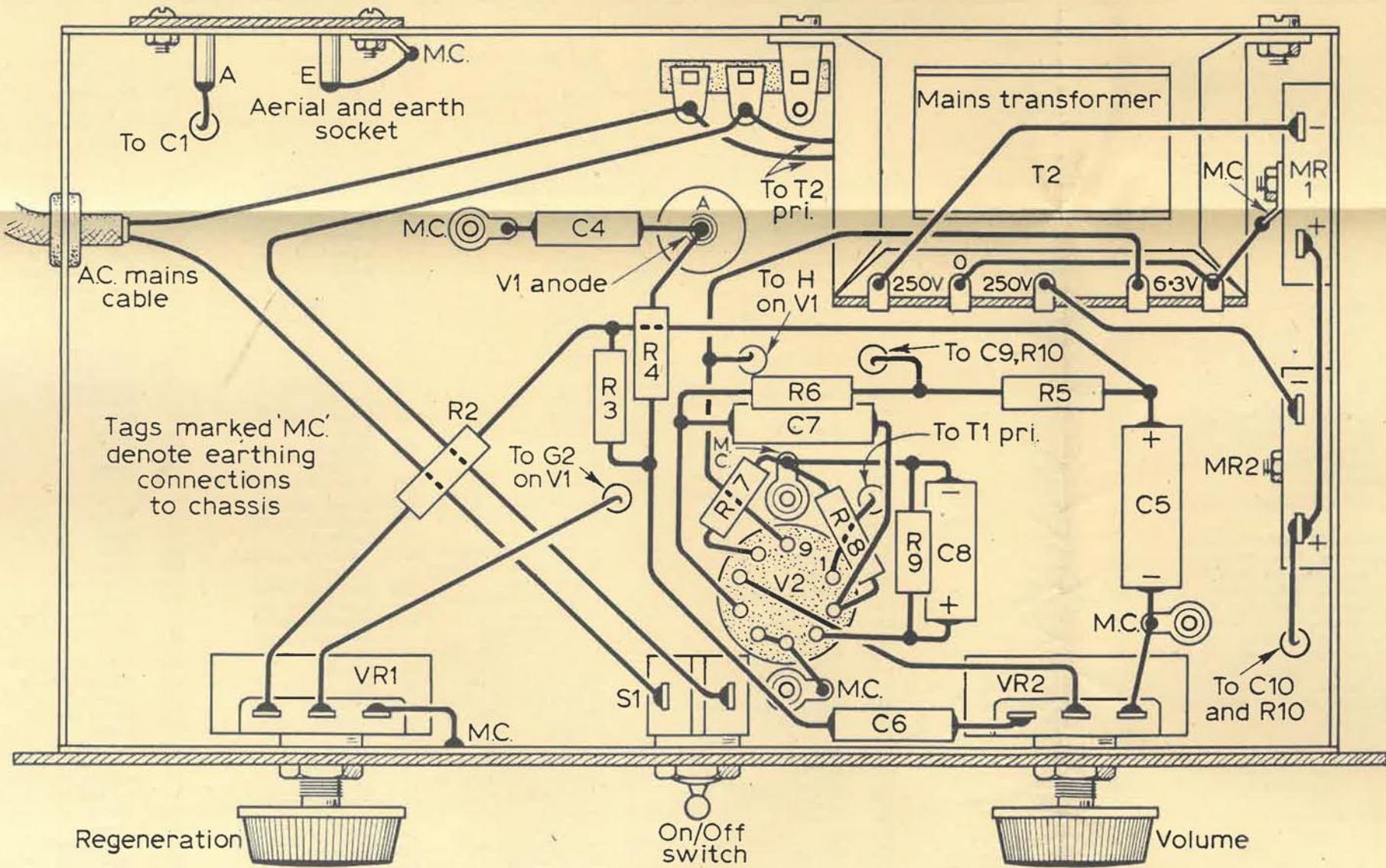
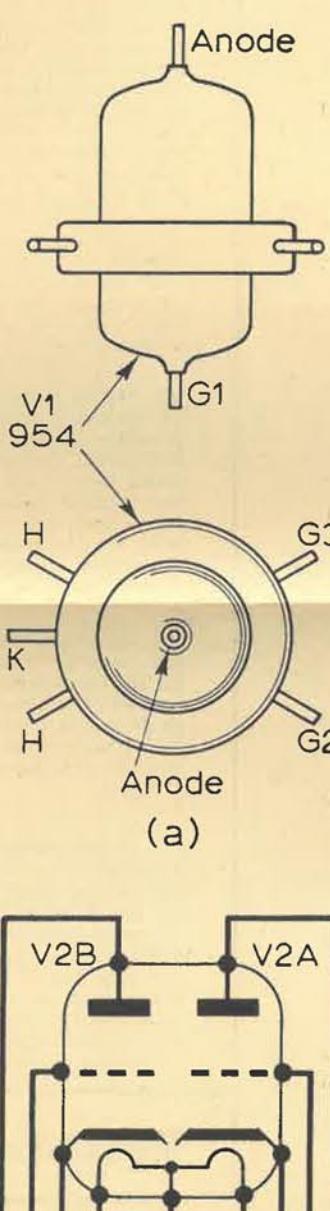


Fig.3 - Below-chassis wiring.



COMPONENTS LIST

Resistors:	R1 2·2MΩ	R6 220kΩ
	R2 150kΩ	R7 2·2kΩ
	R3 220kΩ	R8 470kΩ
	R4 20kΩ	R9 1kΩ
	R5 33kΩ	R10 2·2kΩ 3W w.w.

All 10% 1/2W carbon, except where otherwise indicated
VR1 100kΩ wire-wound potentiometer
VR2 500kΩ carbon potentiometer

Capacitors:

C1 50pF mica or ceramic	C2 50pF mica or ceramic
C3 0·1μF paper	C4 500pF mica or ceramic
C5 4μF electrolytic 350V	C6 0·01μF paper
C7 0·01μF	C8 12μF electrolytic 25V
C9 16μF	C10 8μF } dual electrolytic 350V
C10 8μF } dual electrolytic 350V	V1 150pF air dielectric variable

Transformers:

T1 Output transformer 60 : 1
T2 Small mains transformer. Tapped primary. Secondaries: 250-0-250V 40mA; 6·3V 1A

Valves:

V1 954	V2 12AT7
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Other Circuit Components:

L1 2½in. diameter loudspeaker 2-3Ω
S1 Toggle switch s.p.s.t.
MRI, 2 Contact cooled rectifier 250V 40mA

Miscellaneous:

Ball drive 6 : 1 ratio. Knobs: one 2in. diameter, two 1in. diameter. One 9BA valveholder. Ribbed 4-pin plug-in coil formers (Eddystone). Coil holder (Eddystone). Aerial-earth socket strip. Tag strip (2 insulated). Chassis 7in. x 4in. x 2½in. approx. Panel 6in. x 7½in.

COIL WINDING DATA

1-4Mc/s (250-75 metres)
100 turns 34sw.g., tap at 2 turns. Aerial coupling, 20 turns.
2-5-7.5Mc/s (120-40 metres)
50 turns 32sw.g., tap at 1½ turns. Aerial coupling, 15 turns.
6-7.5-22Mc/s (44-13-6 metres)
16 turns 30sw.g., tap at ½ turn. Aerial coupling, five turns.
14-5-50Mc/s (20-6-6 metres)
54 turns 30sw.g., tap ½ to ½ turn. Aerial coupling, two turns.
40-100Mc/s (7.5-3 metres)
2½ turns 20sw.g., double spaced, tap at ½ turn. Aerial coupling, one turn.

The two larger coils are close wound. The other
coils are on threaded formers, and spaced 21 turns
per inch. Aerial windings are near the tuned
winding as indicated in Fig. 4(d).

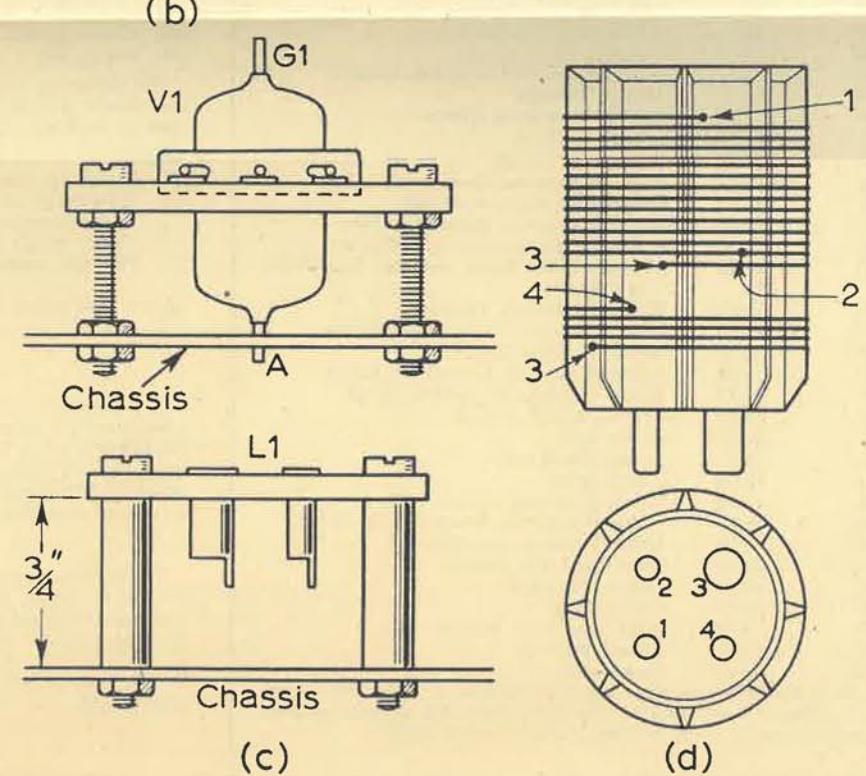


Fig.4 - Coil and valve details.

Material.....18swg. aluminium

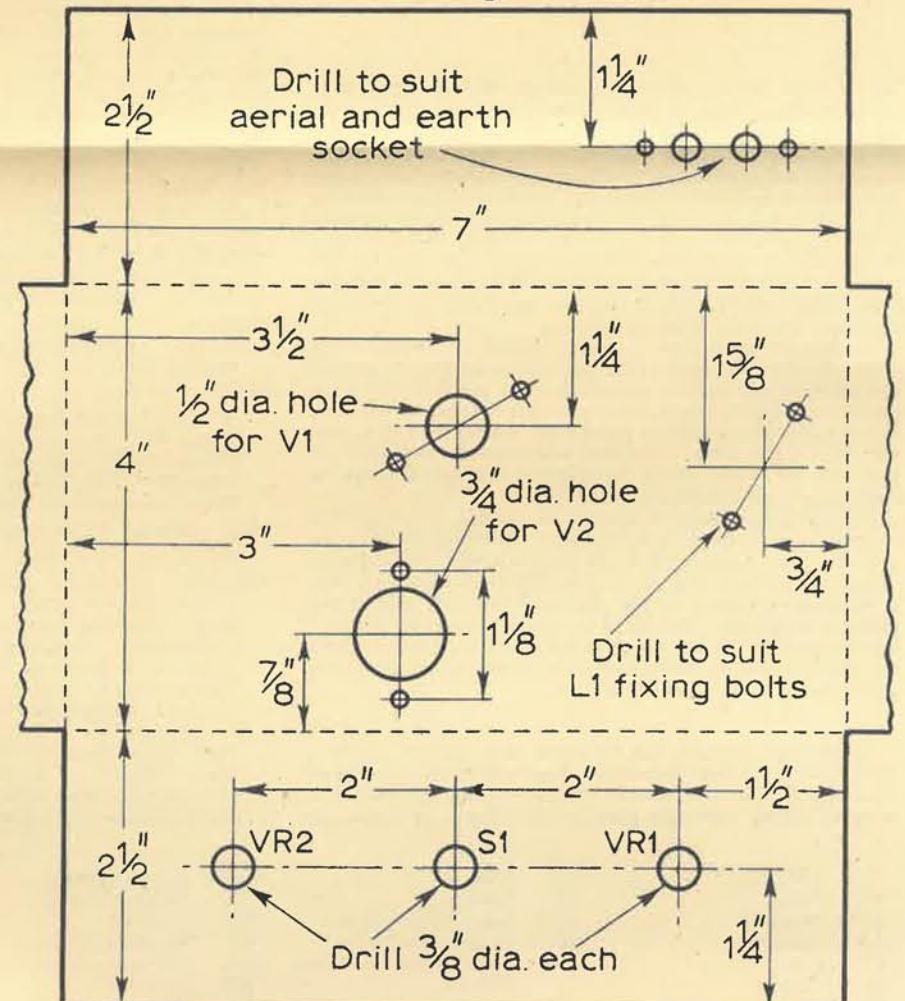


Fig.5 - Chassis drilling details.