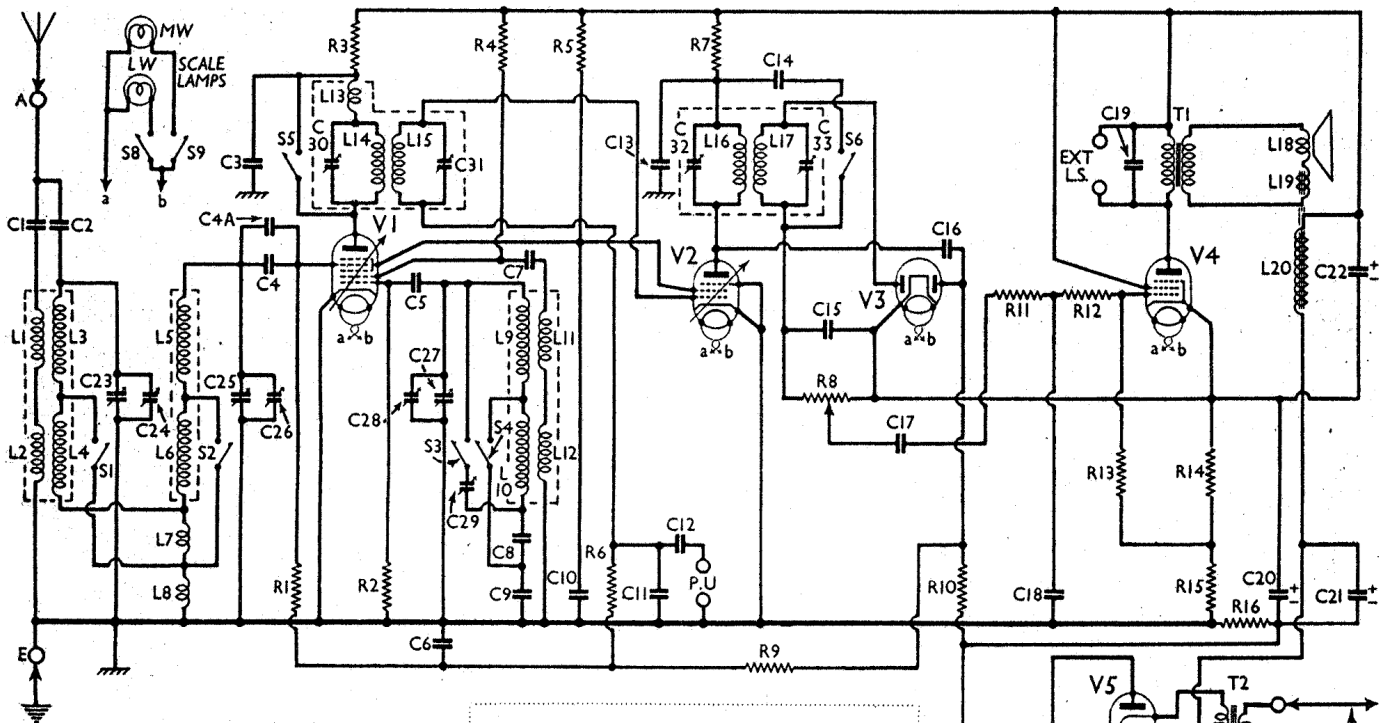


COSSOR - 364 & 376



COMPONENTS AND VALUES

Resistances	Values (ohms)
R1	V1 tet. cont. grid resistance .. 1,000,000
R2	V1 osc. grid resistance .. 50,000
R3	V1 tet. anode decoupling .. 5,000
R4	V1 osc. anode resistance .. 50,000
R5	V1 and V2 S.G.'s H.T. feed .. 25,000
R6	V2 cont. grid decoupling .. 1,000,000
R7	V2 anode decoupling .. 5,000
R8	Manual volume control .. 500,000*
R9	A.V.C. line decoupling .. 1,000,000
R10	V3 A.V.C. diode load .. 1,000,000
R11	V4 grid I.F. stoppers .. 50,000
R12	V4 grid I.F. stoppers .. 50,000
R13	V4 grid resistance .. 2,000,000
R14	V4 G.B. and A.V.C. delay .. 130
R15	V4 G.B. and A.V.C. delay .. 250
R16	V4 G.B. and A.V.C. delay voltage resistances .. 25

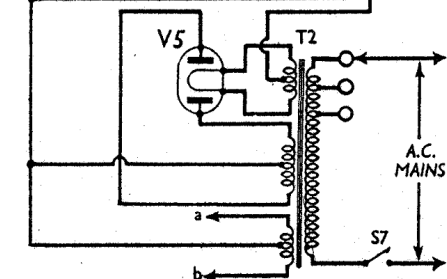
Condensers	Values (μF)
C1	Aerial series condenser .. 0.0005
C2	Capacitive aerial coupling to B.P. pri. .. 0.000025
C3	V1 tet. anode decoupling .. 0.01
C4	V1 tet. cont. grid condensers .. 0.001
C4A	V1 tet. cont. grid condensers .. 0.002
C5	V1 osc. grid condenser .. 0.0002
C6	A.V.C. line decoupling .. 0.005
C7	V1 osc. anode condenser .. 0.01
C8	Osc. L.W. tracker .. 0.001
C9	Osc. M.W. tracker .. 0.002
C10	V1 and V2 S.G.'s by-pass .. 0.1
C11	V2 cont. grid decoupling .. 0.001
C12	Gram. pick-up coupling .. 0.01
C13	V2 anode decoupling .. 0.01
C14	L.F. coupling to R8 (gram.) .. 0.01
C15	I.F. by-pass .. 0.0002†
C16	Coupling to V3 A.V.C. diode .. 0.0001
C17	L.F. coupling to V4 .. 0.002
C18	V4 grid I.F. by-pass .. 0.0001
C19	Fixed tone compensator .. 0.005
C20*	V4 cathode by-pass .. 25.0
C21*	H.T. smoothing .. 8.0
C22*	H.T. smoothing .. 8.0
C23	Band-pass primary tuning .. —
C24	Band-pass primary trimmer .. —
C25	Band-pass secondary tuning .. —
C26	Band-pass secondary trimmer .. —
C27	Oscillator tuning .. —
C28	Oscillator main trimmer .. —
C29	Oscillator L.W. trimmer .. —
C30	1st I.F. trans. pri. tuning .. —
C31	1st I.F. trans. sec. tuning .. —
C32	2nd I.F. trans. pri. tuning .. —
C33	2nd I.F. trans. sec. tuning .. —

Circuit diagram of the Cossor Model 364 A.C. superhet. In the radio-gram model (736), the only difference is that a variable tone control circuit, comprising a fixed condenser and a variable resistance in series, is connected across C19.

Other Components	Values (ohms)
L1	Aerial coupling coils .. 6.0
L2	Aerial coupling coils .. 7.0
L3	Band-pass primary coils .. 6.8
L4	Band-pass primary coils .. 14.0
L5	Band-pass secondary coils .. 6.8
L6	Band-pass secondary coils .. 14.0
L7	Band-pass coupling coils .. 0.2
L8	Band-pass coupling coils .. 0.8
L9	Oscillator tuning coils .. 4.0
L10	Oscillator tuning coils .. 0.0
L11	Oscillator anode coils .. 8.5
L12	Oscillator anode coils .. 8.5
L13	V1 anode S.W. choke .. Very low
L14	1st I.F. trans. { Pri. .. 43.0
L15	1st I.F. trans. { Sec. .. 47.0
L16	2nd I.F. trans. { Pri. .. 43.0
L17	2nd I.F. trans. { Sec. .. 47.0
L18	Speaker speech coil .. 1.8
L19	Hum neutralising coil .. 0.1
L20	Speaker field winding .. 2,000.0
T1	Speaker input trans. { Pri. .. 800.0
T2	Speaker input trans. { Sec. .. 0.35
T2	Mains trans. { Pri. total .. 45.0
T2	Mains trans. { Heater sec. .. 0.1
T2	Mains trans. { Rect. fil. sec. .. 0.15
T2	Mains trans. { H.T. sec. .. 1,100.0
S1-S4	Waveband switches .. —
S5	Radio muting switch (gram.) .. —
S6	Radio-gram. change-over .. —
S7	Mains switch .. —
S8	L.W. scale lamp switch .. —
S9	M.W. scale lamp switch .. —

VALVE ANALYSIS

Readings of valve voltages and currents given in the table overleaf were measured with the receiver operating on A.C. mains of 225 V, with the transformer adjusted to the 220 V tap, in accordance with the manufacturers' instructions. The volume control was at maximum and there was no signal input, while the receiver was tuned to the bottom of the M.W. band. Voltages were measured on the 1,200 V scale of an Avometer, with chassis as negative.



Valve	Anode Volts	Anode Current (mA)	Screen Volts	Screen Current (mA)
V1 41MPG*	230	0.9	100	4.2
V2 MVS/Pen	200	5.7	100	1.4
V3 DD4	—	—	—	—
V4 42MP/Pen	210	32.0	230	5.7
V5 442BU	330†	—	—	—

* Osc. anode (G2) 140 V, 2.6 mA.
† Each anode, A.C.

GENERAL NOTES

Switches.—There are nine switches, ganged together in a single unit. S1-S4 are for waveband switching, S5 for radio

Switch	M.W.	L.W.	Gram.
S1	C	O	O
S2	C	O	O
S3	C	O	O
S4	C	O	O
S5	O	O	C
S6	O	O	C
S7	O	O	C
S8	O	O	C
S9	C	O	C

Coils.—The signal frequency and oscillator coils are in three screened units on the chassis deck, and one un-screened unit (L7, L8) beneath the chassis. The screens are easily removable.

The band-pass secondary unit, L5, L6, also contains C4A, a .002 μF condenser in parallel with C4 (.01 μF), which is beneath the chassis.

The oscillator unit, L9-L12, also contains C8, C9 and C29, the latter being adjustable through a hole in the screen.

The I.F. units are also in similar screens on top of the chassis, and it should be noted that the first of these (L14, L15), also contains the S.W. choke, L13.

* Electrolytic. † Pre-set. ‡ 0.0001 μF when R8 is 1,000,000 Ω. § Two condensers in parallel.