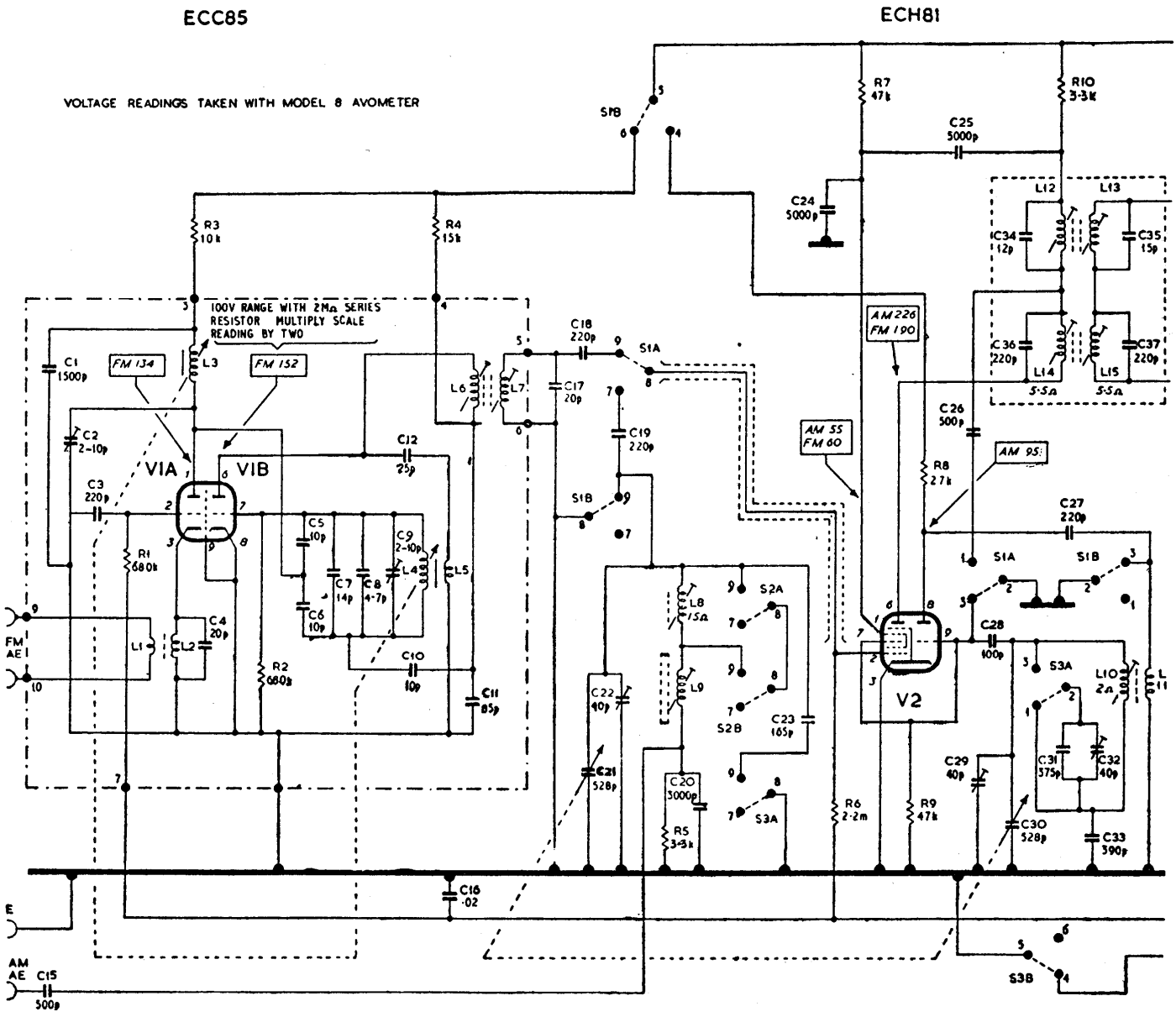
FERGUSON Models 389RG, 601RG

General Description: Model 389RG is a five-valve, three-waveband, A.M./F.M. auto-radiogram with provision for stereo connections. Model 601RG has a similar chassis with the addition of a tuning indicator. These chassis are basically A.C. versions of that used for Model 384U, and most of the servicing information for that model is applicable. Record changer B.S.R. Monarch Type UA8 with pick-up cartridge Type TC8M.

Power Supplies: A.C. mains, 200–250 volts, 50 c/s. (60-c/s. motor pulleys available from B.S.R.).

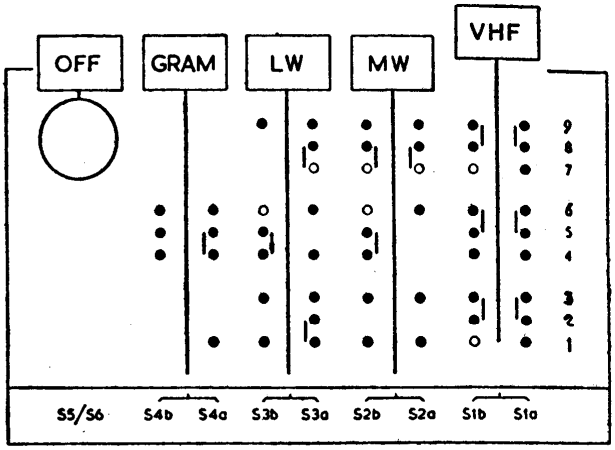
Valves: (V1) ECC85; (V2) ECH81; (V3) EF89; (V4) EABC80; (V5) EL84; (V6) EM81 (Model 601RG only). Typical voltages shown on circuit diagram measured with Avo Model 8 (20,000 ohms/volt).



CIRCUIT DIAGRAM—

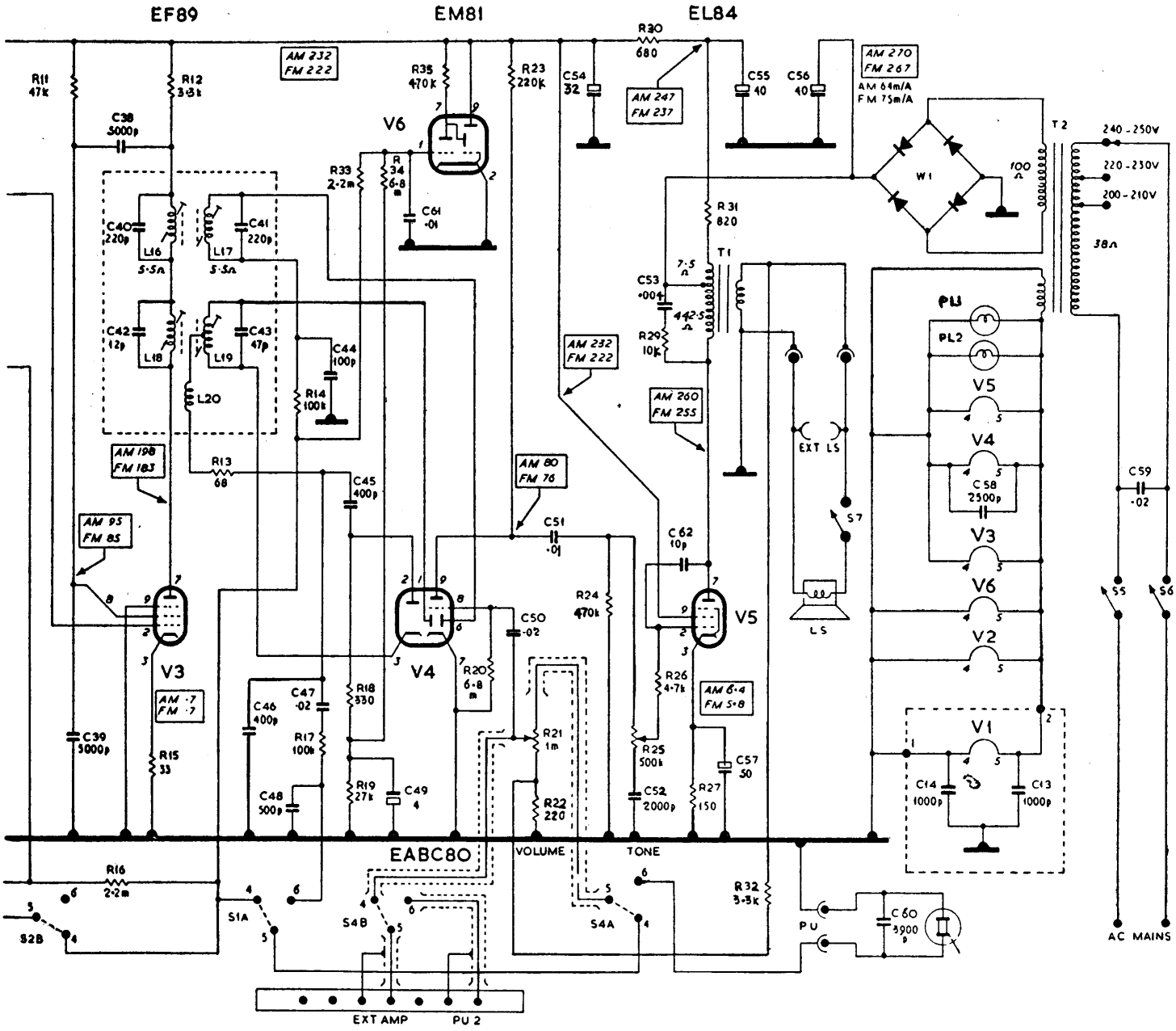
Component Notes:

2 per cent, C31, C33, C36, C37, C40, C41,
2½ per cent, C11,
5 per cent, C4, C12, C17, C20, C23, C34, C35, C42, C43, C61, C62
350 v. A.C., C53
P100 C5, C6, C7, C10
N750 C8
½ W R27, R30
1 W. R31
Log. R21, R25



PIANO KEY SWITCH CONTACTS SHOWN IN VHF-FM POSITION. SWITCH VIEWED FROM UNDERSIDE OF CHASSIS.

Circuit Variations: Circuit diagram is for Model 601RG. Model 389RG is identical except that V6 and associated components R33, R34, R35 and C62 are omitted.



FERGUSON MODEL 601RG

Drive Cords: A similar arrangement is used to that illustrated under Model 384U.

A.M. Tuning: Allow 4 ft. 3 in. of nylon braided cord and, with gang fully open, proceed as follows: Knot one end of cord and anchor in slot provided in drive drum at end nearest gang. Wind cord one turn in clockwise direction round drum and continue as shown in diagram. Before winding final turns round drum, ensure that tensioning pulley is exerting tension on cord. When winding complete, end of cord must be secured round moulded peg in top of drum and tucked into groove provided. Apply a little cellulose adhesive to the two turns round peg. Fit cursor so that, with gang fully closed, cursor is aligned with markers at right-hand end of scale. Tip of cursor should ride on outside of guide loop.

F.M. Tuning: Allow 4 ft. 3 in. nylon braided cord, tie one end to self-tapping screw in F.M. drive drum. Arrange cord as shown, finishing with one complete turn round drum. Attach tension spring to end of cord and anchor to peg moulded in drum so that cord is under sufficient tension to ensure that drive is free from backlash. Fit cursor so that tip rides within guide loop and, with tuning spindle turned fully anti-clockwise, adjust cursor position to align it with scale marker at left-hand end of scale.

Tuner Drive: Owing to difficulty of fitting slugs to cord with sufficient accuracy to provide satisfactory tracking, makers' replacement cord (Z17223) with slugs already fitted should be used. Note that tuning cores must be inserted with closed and open ends of cores in correct positions as shown. Check that cursor is correctly positioned on cursor-drive cord and untie knot in cord " A " preparatory to threading it through hole in F.M. drive spindle. Cord should then be re-knotted 1 in. beyond spindle when cord " B " is pulled out to its limit. Pull knot up against spindle and, with drum-locking screw slackened off to allow spindle to be rotated separately, turn spindle clockwise to take up any slack. Attach tension spring to cord " B " approximately 4 in. from tuner-unit pulley. Tighten up drive-drum locking screws and rotate turning control one turn clockwise. Cord " B " may then be wound round tuner-drive spindle in anti-clockwise direction and tension spring anchored in slot in spindle as shown. Cord must be under sufficient tension to eliminate backlash. Unit should then be re-aligned, afterwards checking that at extremes of cursor sweep at least one turn of cord remains around spindle.