

7.2.2. Amplifier Section

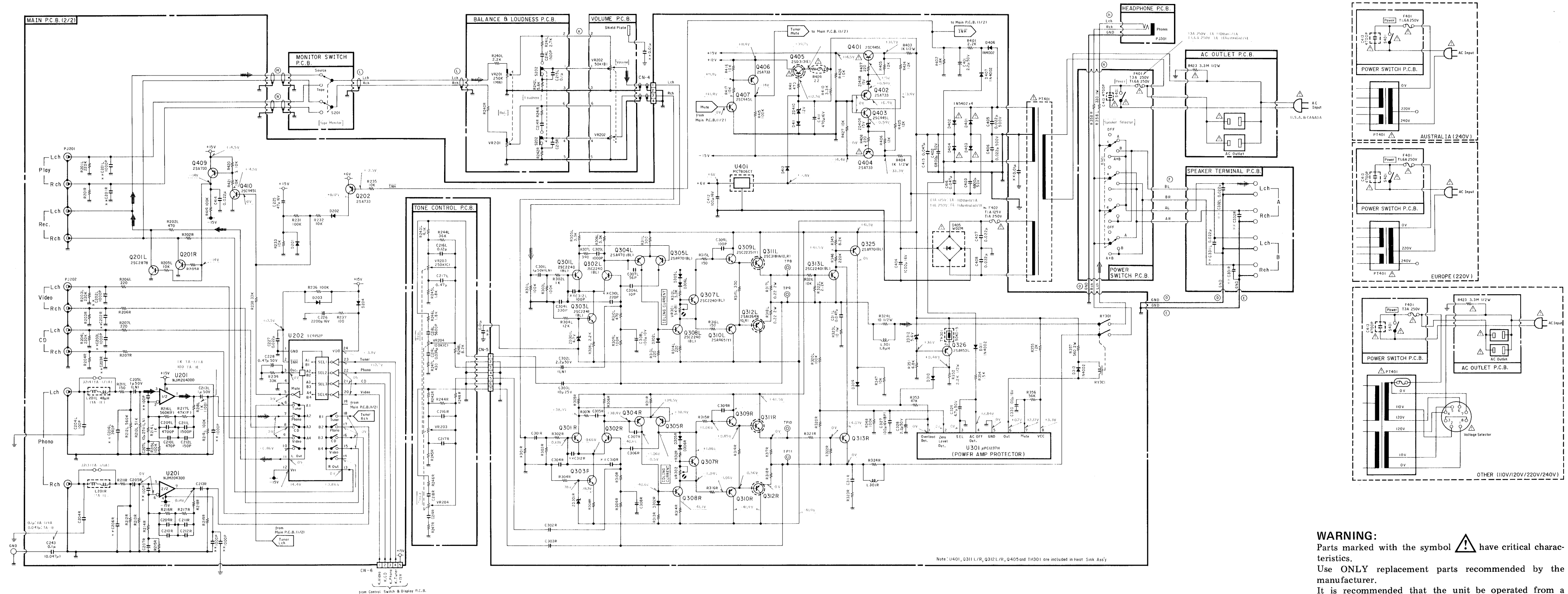

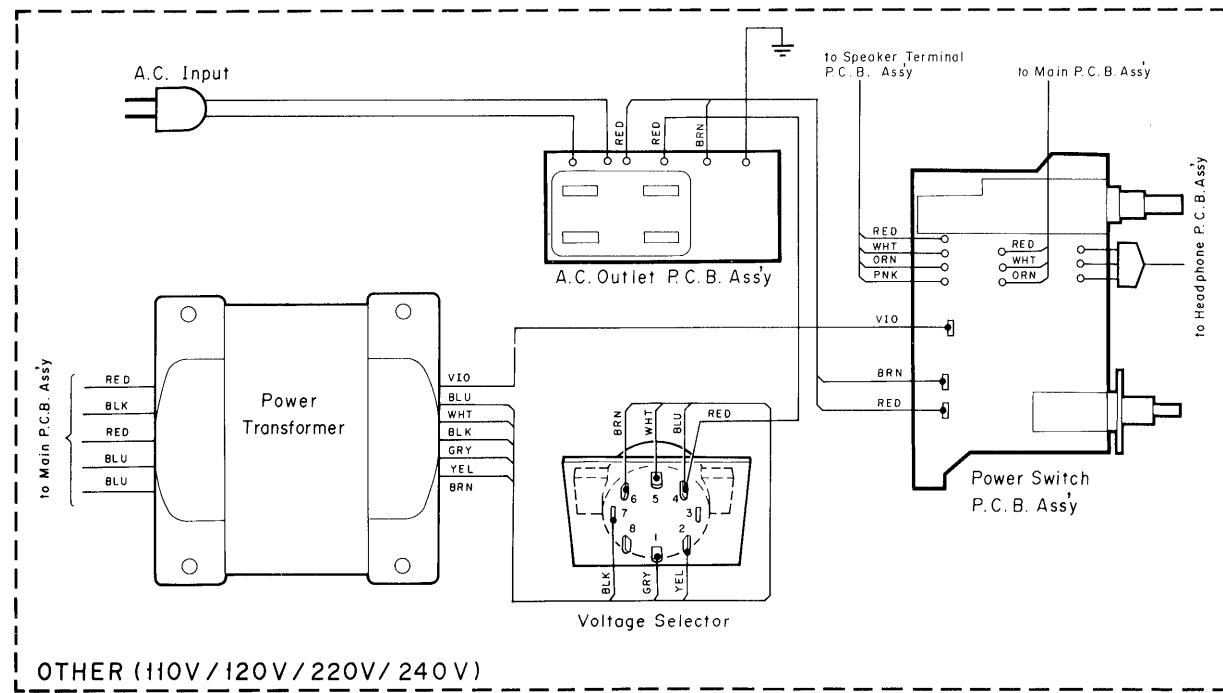
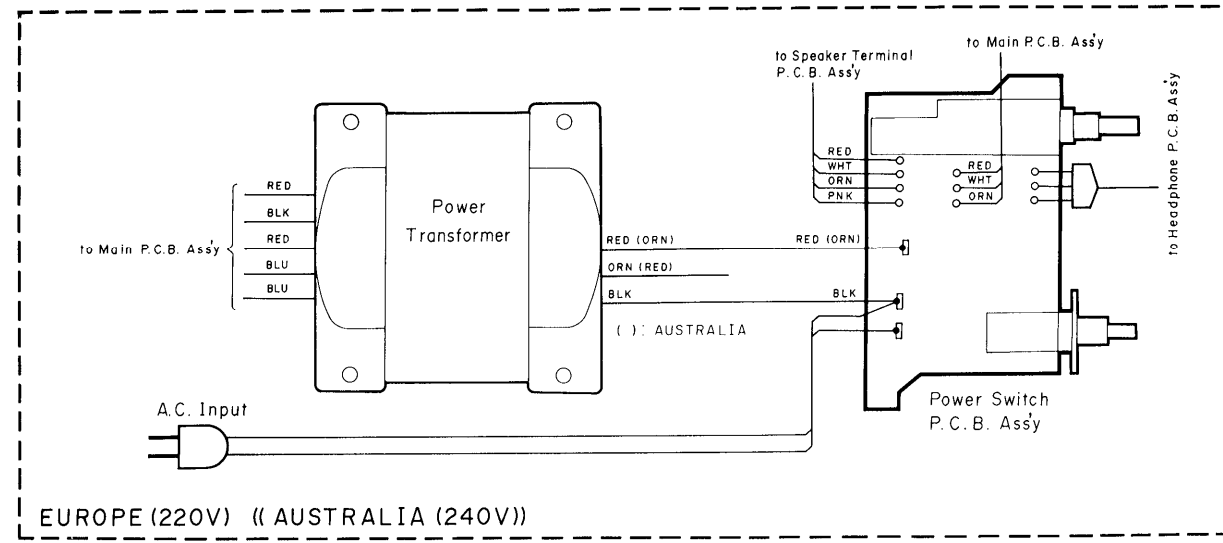


Fig. 7.2.2.

**WARNING:** Parts marked with the symbol  have critical characteristics. Use ONLY replacement parts recommended by the manufacturer. It is recommended that the unit be operated from a suitable DC supply or batteries during initial check-out procedures.

8. WIRING DIAGRAM



- Notes: 1. Table of wire colors  
 BRN — Brown      BLU — Blue  
 RED — Red        VIO — Violet  
 ORN — Orange    GRY — Gray  
 YEL — Yellow    WHT — White  
 GRN — Green     BLK — Black
2. Component side view of the P.C.B. is illustrated unless otherwise specified.
3. Wire tube color is shown in ( ).

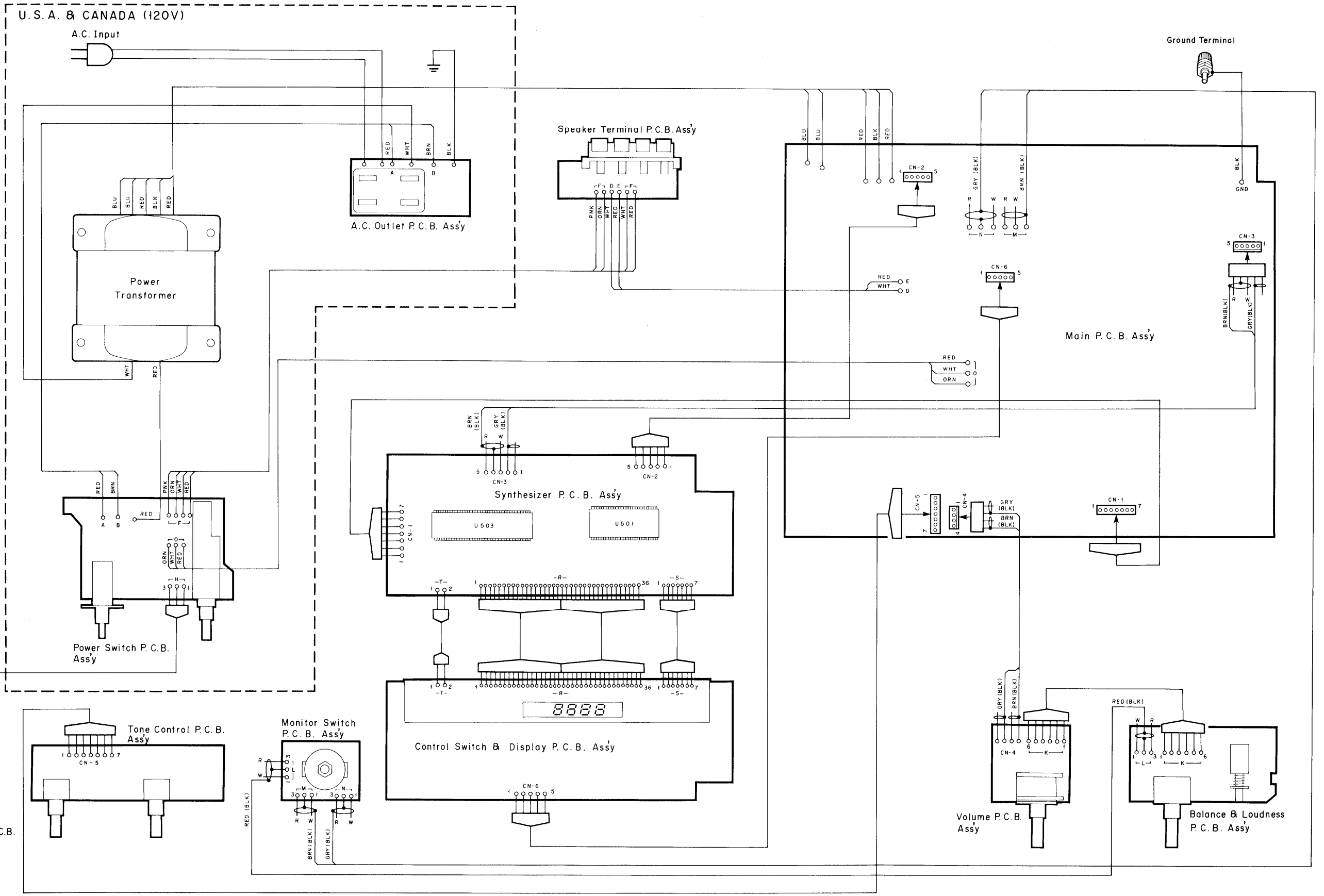


Fig. 8

7. SCHEMATIC DIAGRAMS

Schematic Ref. No.	Part No.	Description	Schematic Ref. No.	Part No.	Description	Schematic Ref. No.	Part No.	Description	Schematic Ref. No.	Part No.	Description	Schematic Ref. No.	Part No.	Description
T101	OB51271A	AM IFT Coil	R143	OB09689A	RK 3.3K 1/6W J	R415	OB09725A	RK 100K 1/6W J	C209L,R	OB05652A	CML 4700P 50V J	OB81931A	Antenna Terminal	
T102	OB51272A	FM DET (A) Coil			R416,417	OB09701A	RK 10K 1/6W J	C210L,R	OB09270A	CP 470P 100V J		OB81931A	(TA-1 & TA-1A) (1)	
T103	OB51273A	FM DET (B) Coil			R419	OB09725A	RK 100K 1/6W J	C211L,R	OB05653A	CML 1500P 50V J		OB81979A	Antenna Terminal	
L101	OB51269A	AM ANT Coil	R144,145	OB09717A	RK 47K 1/6W J	R420,421	OB09701A	RK 10K 1/6W J	C212L,R	OB41895A	CSP 150P 50V J	OB83362A	(TA-1E) (1)	
L102	OB51270A	AM OSC Coil	R146	OB20513A	RK 56K 1/2W J	R424,425	OB09263A	RK 12K 1/4W J	C213L,R	OB01405A	CE 1μ 50V	OB83362A	Lead Wire BLK	
L103L,R	OB51276A	Inductor 39mH K	R148L,R	OB09709A	RK 22K 1/6W J	R426,427	OB01888A	RK 10K 1/4W J	C225	OB01403A	CE 47μ 16V	OB83482A	180mm (1)	
L104	OB51274A	P. Coil 22μH K-P	R149L,R	OB09701A	RK 10K 1/6W J		VC101	C Trimmer 10P	C226	OB40083A	CE 2200μ 16V	OB83482A	Terminal Pin (L)	
L105,106	OB51274A	P. Coil 22μH K-P	R150L,R	OB09717A	RK 47K 1/6W J		CC 0.022μ 50V Z	C227	OB09291A	CC 0.022μ 50V Z	C228	OB09291A	(TA-1E) (4)	
L107	OB51274A	P. Coil 22μH K-P	R151L,R	OB09689A	RK 3.3K 1/6W J		C104	CC 560P 50V K	C228	OB40111A	CE 0.47μ 50V	OM04191A	Fuse Label T1A	
L108	OB51274A	P. Coil 22μH K-P	R152L,R	OB09725A	RK 100K 1/6W J		C106	CSP 390P 100V J	C243	OB01603A	CML 0.1μ 50V K		(TA-1E) (1)	
L201L,R	OB51266A	Audio Coil 48μH (TA-1E)	R153L,R	OB09689A	RK 3.3K 1/6W J		C107	CC 22P 50V J		OB09387A	CC 0.047μ 50V Z			
L301L,R	OB51275A	Audio Coil 1.8μH	R154L,R	OB09683A	RK 1.8K 1/6W J		C108	CC 5P 50V C			CC 1μ 50V (LN)			
VR102	OB32128A	Semi VR 20K	R156	OB09717A	RK 47K 1/6W J		C109	CC 0.022μ 50V Z			CC 2.2μ 50V (LN)			
VR104	OB32126A	Semi VR 5K					C110	CC 0.01μ 50V Z			CC 10μ 25V			
VR105	OB32132A	Semi VR 500K	R162	OB09677A	RK 1K 1/6W J		C111	CC 0.047μ 50V Z			CC 10μ 25V			
VR106	OB32141A	Semi VR 250K (TA-1 (Other))	R163	OB09705A	RK 15K 1/6W J		C112	CC 0.047μ 50V Z			CC 0.01μ 50V Z			
VR301,302	OB32126A	Semi VR 5K	R201L,R	OB09733A	RK 220K 1/6W J		C113	CC 47μ 16V			CC 0.022μ 50V Z			
R101	OB09701A	RK 10K 1/6W J	R202L,R	OB09669A	RK 470 1/6W J		C114	CC 0.047μ 50V Z			CC 82P 50V J			
R102	OB09717A	RK 47K 1/6W J	R203L,R	OB09733A	RK 220K 1/6W J		C115	CC 0.047μ 50V Z			CC 4.7μ 50V			
R103	OB09689A	RK 470 1/6W J	R204L,R	OB09733A	RK 220K 1/6W J		C116	CC 82P 50V J			CC 3.3μ 50V			
R104	OB09677A	RK 1K 1/6W J	R205L,R	OB09701A	RK 10K 1/6W J		C117	CC 10μ 25V			CC 0.022μ 50V Z			
R105	OB09725A	RK 100K 1/6W J (TA-1E)	R206L,R	OB09661A	RK 220 1/6W J		C118	CC 10μ 25V			CC 0.01μ 50V Z			
R106	OB09721A	RK 68K 1/6W J (TA-1E)	R207L,R	OB09661A	RK 220 1/6W J		C119	CC 0.022μ 50V Z			CC 0.01μ 50V Z			
R107	OB09727A	RK 120K 1/6 W J (TA-1E)	R208L,R	OB09657A	RK 150 1/6W J		C120	CC 0.01μ 50V Z			CML 0.1μ 50V J			
R108	OB09637A	RK 22 1/6W J	R209L,R	OB09743A	RK 560K 1/6W J		C121	CML 0.1μ 50V J (TA-1 (Australia) & TA-1E)			CC 100P 50V J			
R109	OB09695A	RK 5.6K 1/6W J	R210L,R	OB09718A	RK 51K 1/6W J						CC 100μ 16V (BP)			
R110	OB09701A	RK 10K 1/6W J	R211L,R	OB09718A	RK 51K 1/6W J						CC 2.2μ 50V			
R111	OB09701A	RK 10K 1/6W J	R212L,R	OB09677A	RK 1K 1/6W J						CC 4.7μ 50V			
R112	OB09687A	RK 2.7K 1/6W J	R213L,R	OB09725A	RK 100K 1/6W J						CC 100μ 16V			
R113	OB09637A	RK 22 1/6W J	R214L,R	OB09725A	RK 100K 1/6W J						CC 100μ 16V			
R114	OB09667A	RK 390 1/6W J	R215L,R	OB09725A	RK 100K 1/6W J						CC 2.2μ 50V			
R115	OB09699A	RK 8.2K 1/6W J	R216L,R	OB22542A	RM 560K 1/6W F						CC 2.2μ 50V			
R116	OB09665A	RK 330 1/6W J	R217L,R	OB22419A	RM 47.0K 1/6W F						CC 6800μ 50V			
R117	OB09677A	RK 1K 1/6W J	R218L,R	OB09677A	RK 1K 1/6W J						CC 1000μ 16V			
R118	OB09665A	RK 330 1/6W J									CC 0.022μ 500V Z			
R119,120	OB09693A	RK 4.7K 1/6W J (TA-1 (Other))									CC 0.022μ 50V Z			
R121	OB09693A	RK 4.7K 1/6W J (TA-1 & TA-1E)									CC 4.7μ 50V			
R122	OB09665A	RK 330 1/6W J (TA-1 & TA-1E)									CC 100μ 16V			
R123	OB09689A	RK 3.3K 1/6W J (TA-1 & TA-1E)									CC 0.022μ 50V Z			
R124	OB09699A	RK 8.2K 1/6W J (TA-1 & TA-1E)									CC 470μ 16V			
R125	OB09671A	RK 560 1/6W J (TA-1 & TA-1E)									CC 100μ 16V			
R126	OB09647A	RK 56 1/6W J (TA-1 & TA-1E)									CC 0.022μ 50V Z			
R127	OB09677A	RK 1K 1/6W J (TA-1 & TA-1E)									CML 0.047μ 50V J			
R128	OB09693A	RK 4.7K 1/6W J (TA-1 (Other))									Relay VB-24MBU			
R129	OB09689A	RK 3.3K 1/6W J (TA-1 (Other))									Slide Switch 2-2 (TA-1 (Other))			
R130	OB09677A	RK 1K 1/6W J									Fuse T1A 250V (TA-1 (Australia) & TA-1E)			
R131	OB09721A	RK 68K 1/6W J									Fuse T1A 125V (TA-1 (Other) & TA-1A)			
R132,133	OB09701A	RK 10K 1/6W J									4P RCA Jack			
R134	OB09689A	RK 3.3K 1/6W J									6P RCA Jack			
R135	OB09709A	RK 22K 1/6W J (TA-1 (Australia) & TA-1E)									7P Post			
	OB09717A	RK 47K 1/6W J (TA-1 (Other) & TA-1A)									6P Post			
R136	OB09695A	RK 5.6K 1/6W J									5P Post (TA-1A)			
R137	OB09713A	RK 33K 1/6W J (TA-1 & TA-1E)									5P-T Post			
	OB09711A	RK 27K 1/6W J (TA-1A)									4P-T Post			
R138	OB09701A	RK 10K 1/6W J									7P Post			
R139	OB09689A	RK 3.3K 1/6W J									5P Post			
R140	OB09651A	RK 82 1/6W J									2P Ribbon Cable			
R141	OB09745A	RK 680K 1/6W J (TA-1 (Australia) & TA-1E)									20mm			
R142	OB09697A	RK 6.8K 1/6W J (TA-1 (Australia) & TA-1E)									Front-end FE306-A14 (TA-1 & TA-1A)			
											Front-end FE407-G58 (TA-1E)			
											CML 1800P 50V J (TA-1A)			
											CPP 820P 100V J			
											CC 10μ (Other)			
											CML 1500P 50V J			
											CML 1000P 50V J			
											CML 3900P 50V J			
											CML 1000P 50V J (TA-1E)			
											CML 1000P 50V J (TA-1E)			
											CML 1000P 50V J (TA-1E)			
											CSP 100P 50V J			
											CC 390P 50V J (TA-1E)			
											CC 100P 50V Z			
											CC 100P 50V Z (TA-1E)			
											CE 1μ 50V (LN)			
											CC 390P 50V J (TA-1E)			
											CE 10μ 25V (LN)			

7.1. IC Block Diagrams

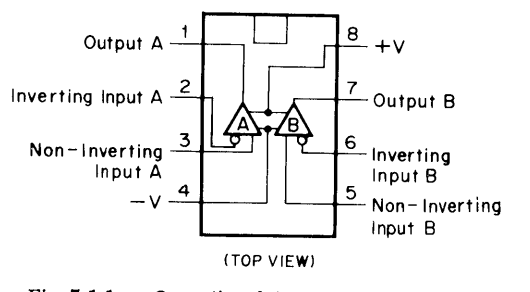


Fig. 7.1.1 Operational Amp. IC NJM2043DD

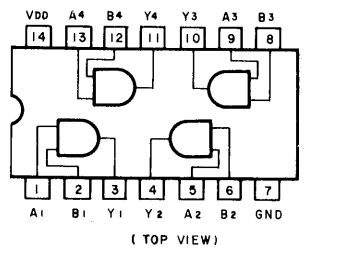


Fig. 7.1.2 AND Gate C-MOS IC μPD4081BC

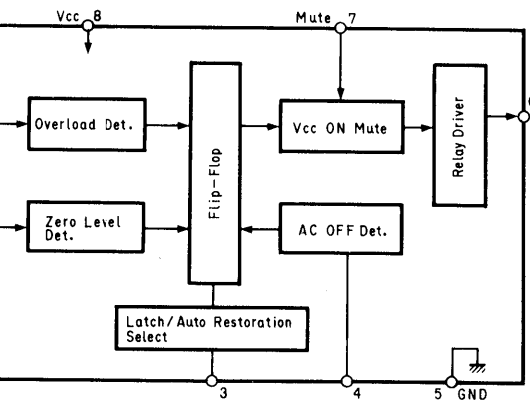


Fig. 7.1.3 Power Amp. Protector IC μPC1237H

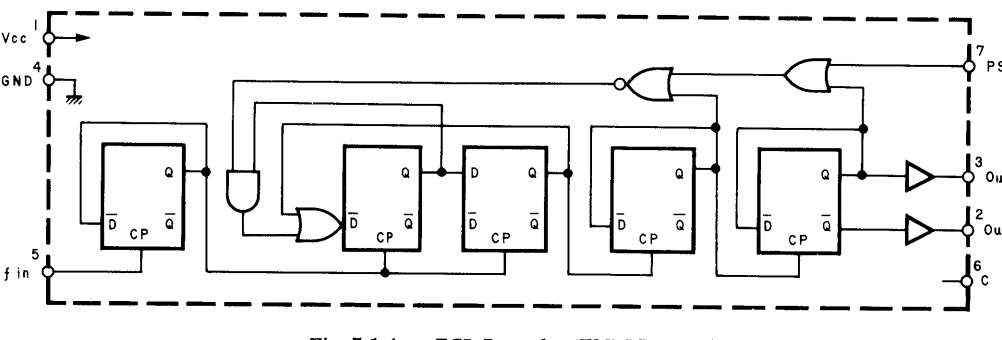


Fig. 7.1.4 ECL Prescaler (FM) IC TD6104P

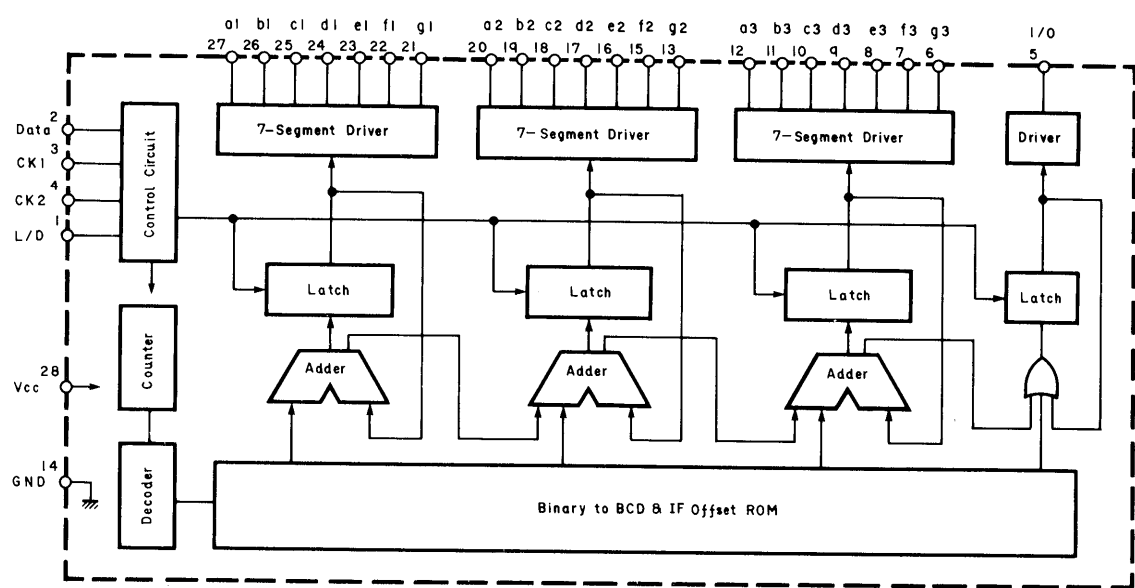


Fig. 7.1.5 Display Driver TD6301AP

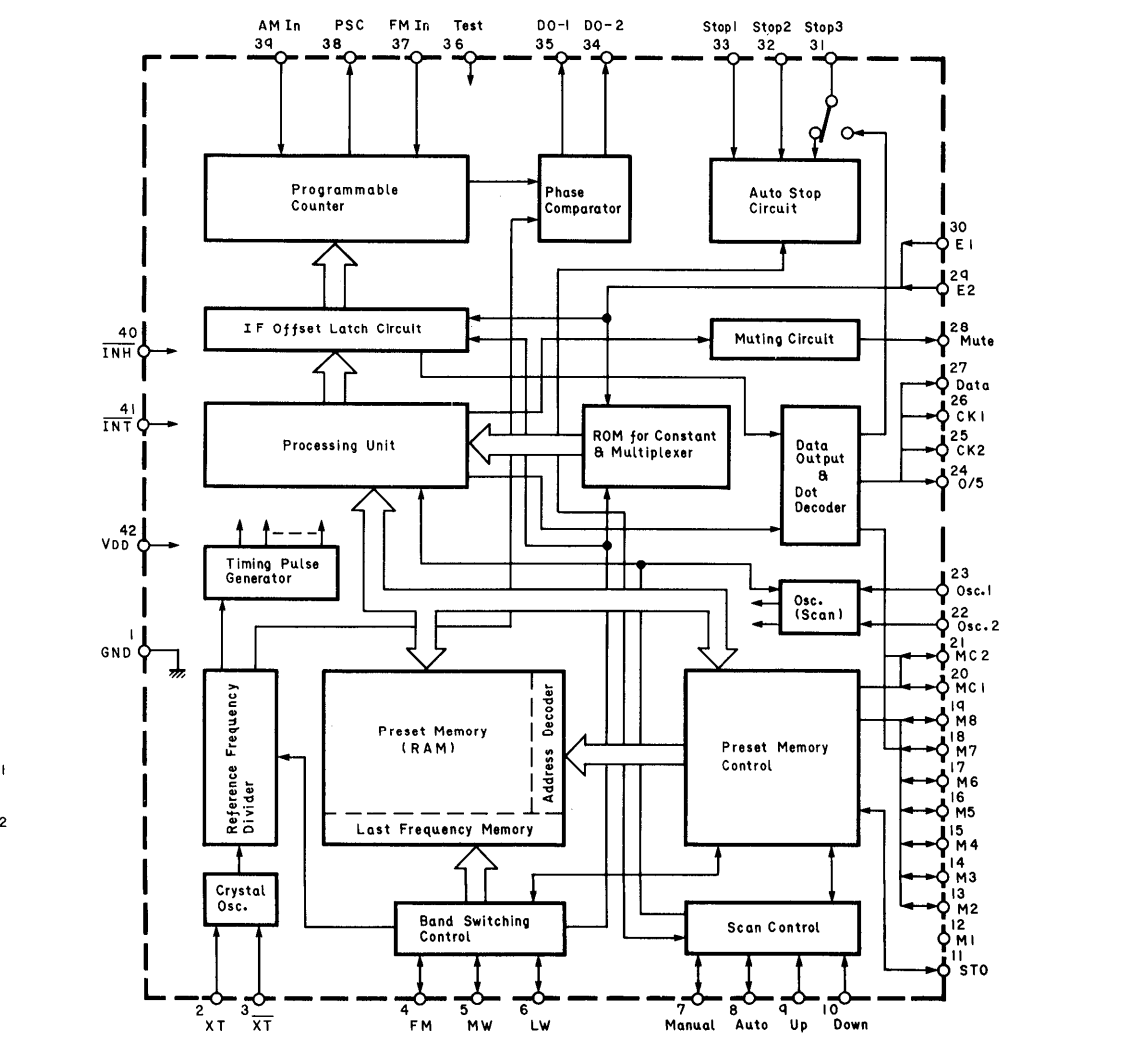
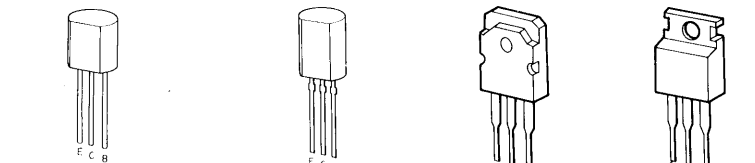
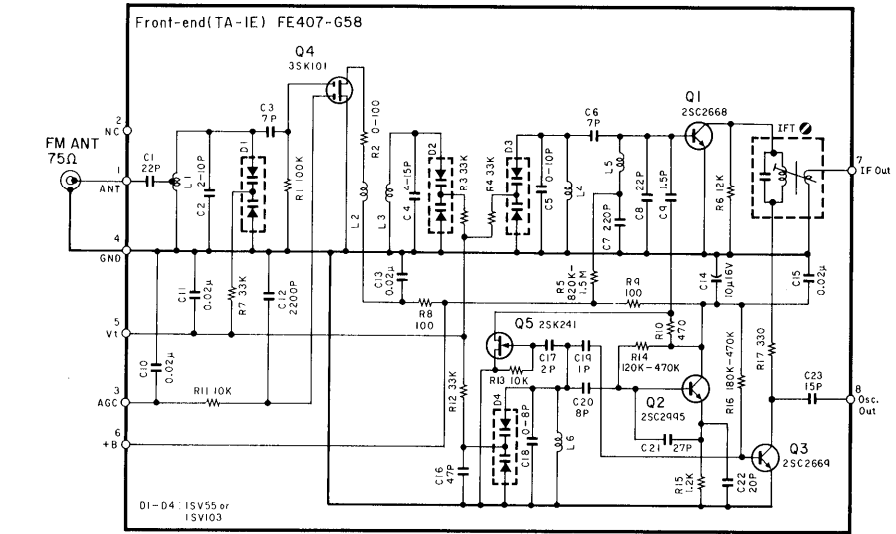
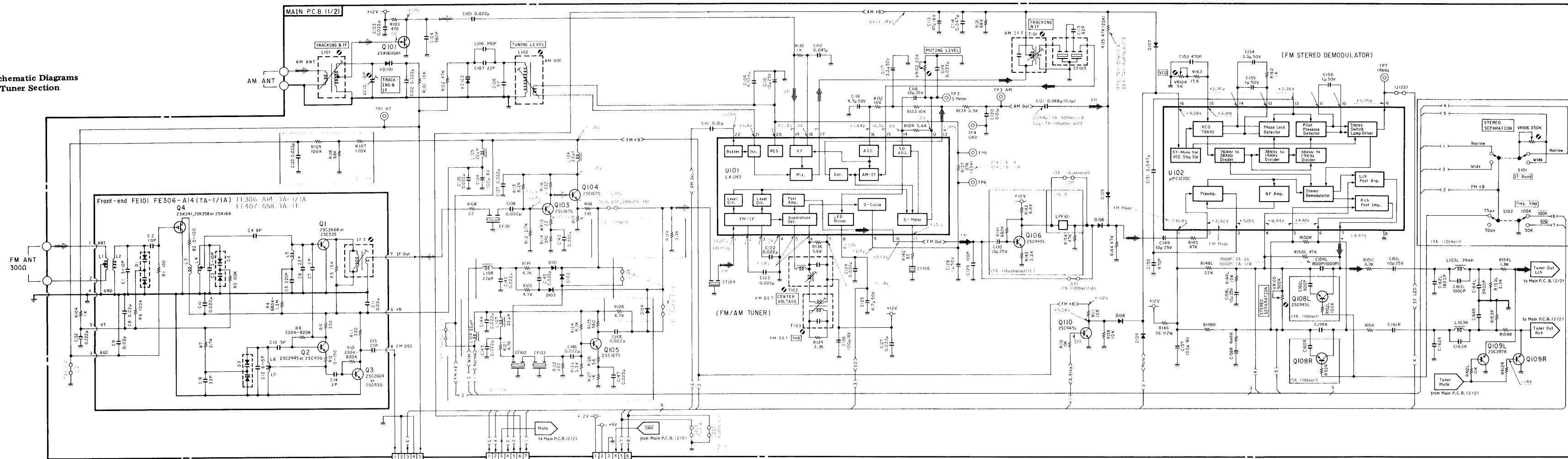


Fig. 7.1.6 PLL Synthesizer IC TC9147BP

7.2. Schematic Diagrams  
7.2.1. Tuner Section



- 2SA733
- 2SA952
- 2SA953
- 2SA970
- 2SC945
- 2SC1675
- 2SC2240
- 2SC2878
- 2SA965
- 2SC2235
- 2SA1264
- 2SC3181
- 2SD313

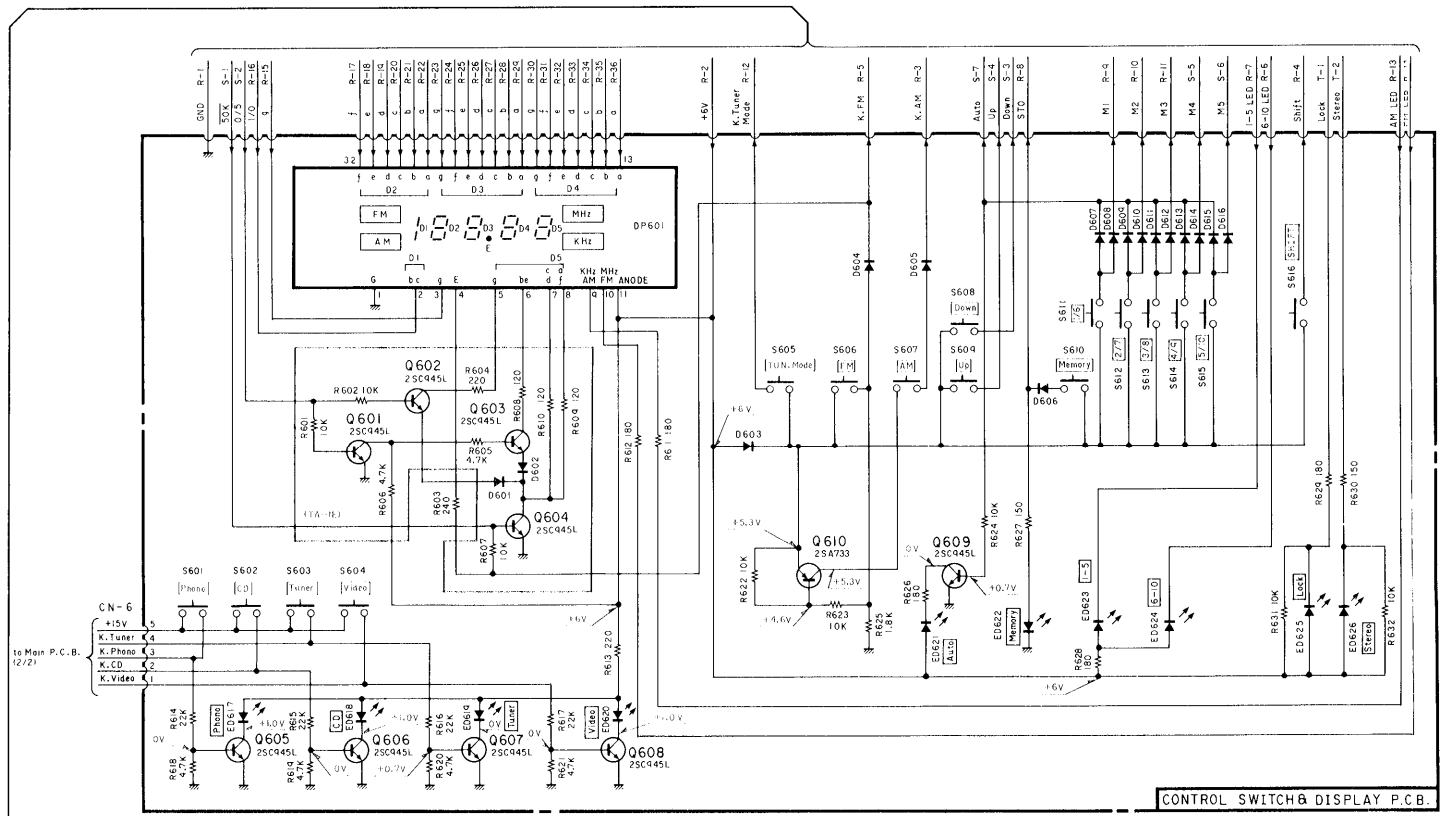
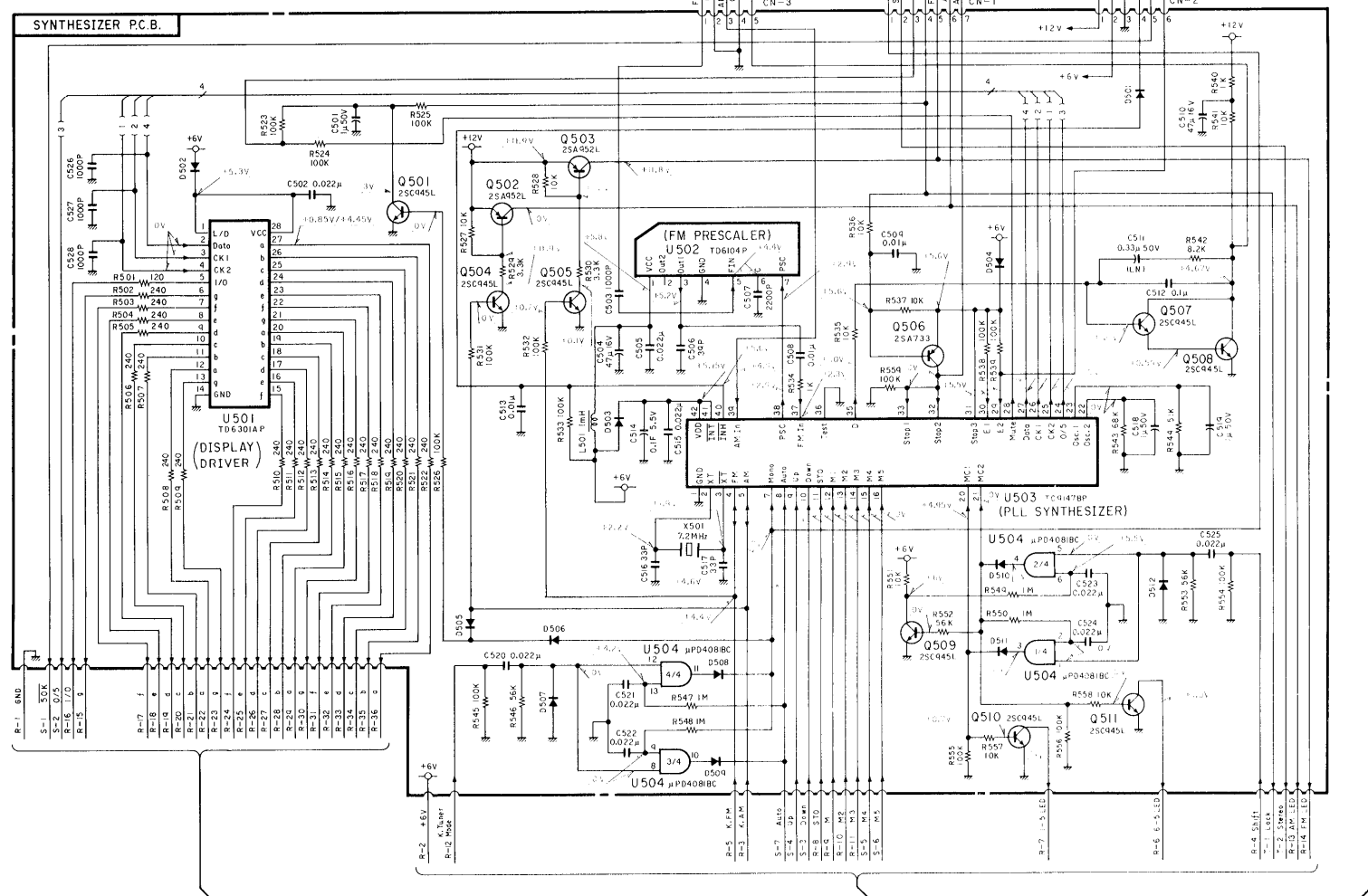


Fig. 7.2.1

- Notes:
1. Diode is 1N4148 unless otherwise specified.
  2. 2SA733, 2SA608SP, 2SA1048 and 2SA1175 are interchangeable with each other.
  3. 2SC945, 2SC536SP, 2SC2458 and 2SC2785 are interchangeable with each other.
  4. Parts marked with \*\* indicate those for TA-1E.
  5. Voltage measuring conditions
    - With no input signal applied to the input terminals.
    - With no lead connected to the speaker terminals.