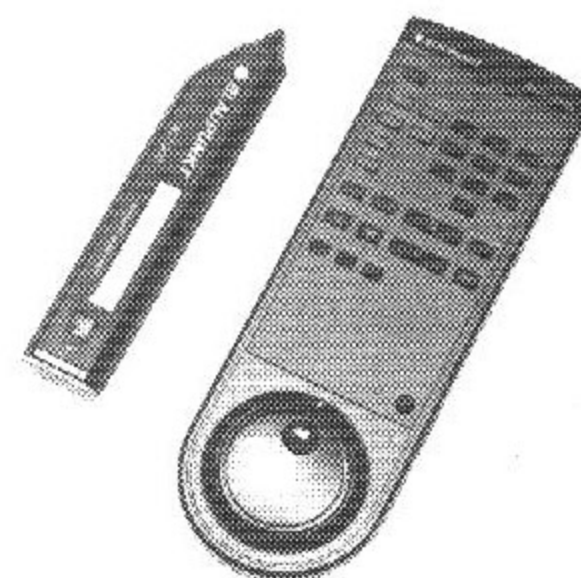
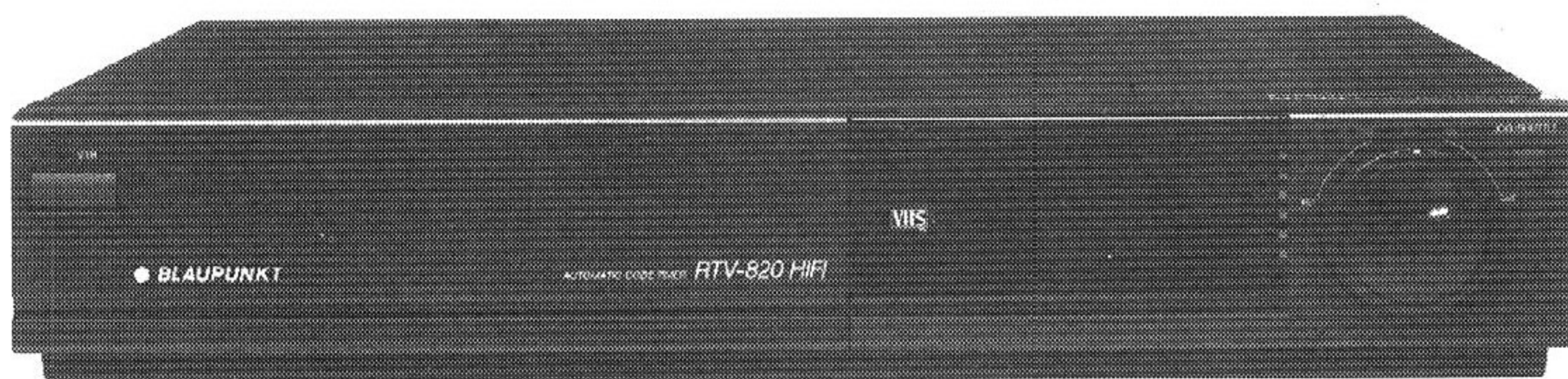
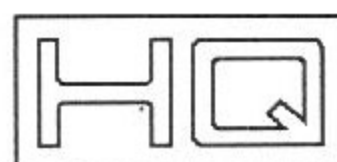


Kundendienstschrift · Service Manual

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MC/VKD 1 D90 420 030



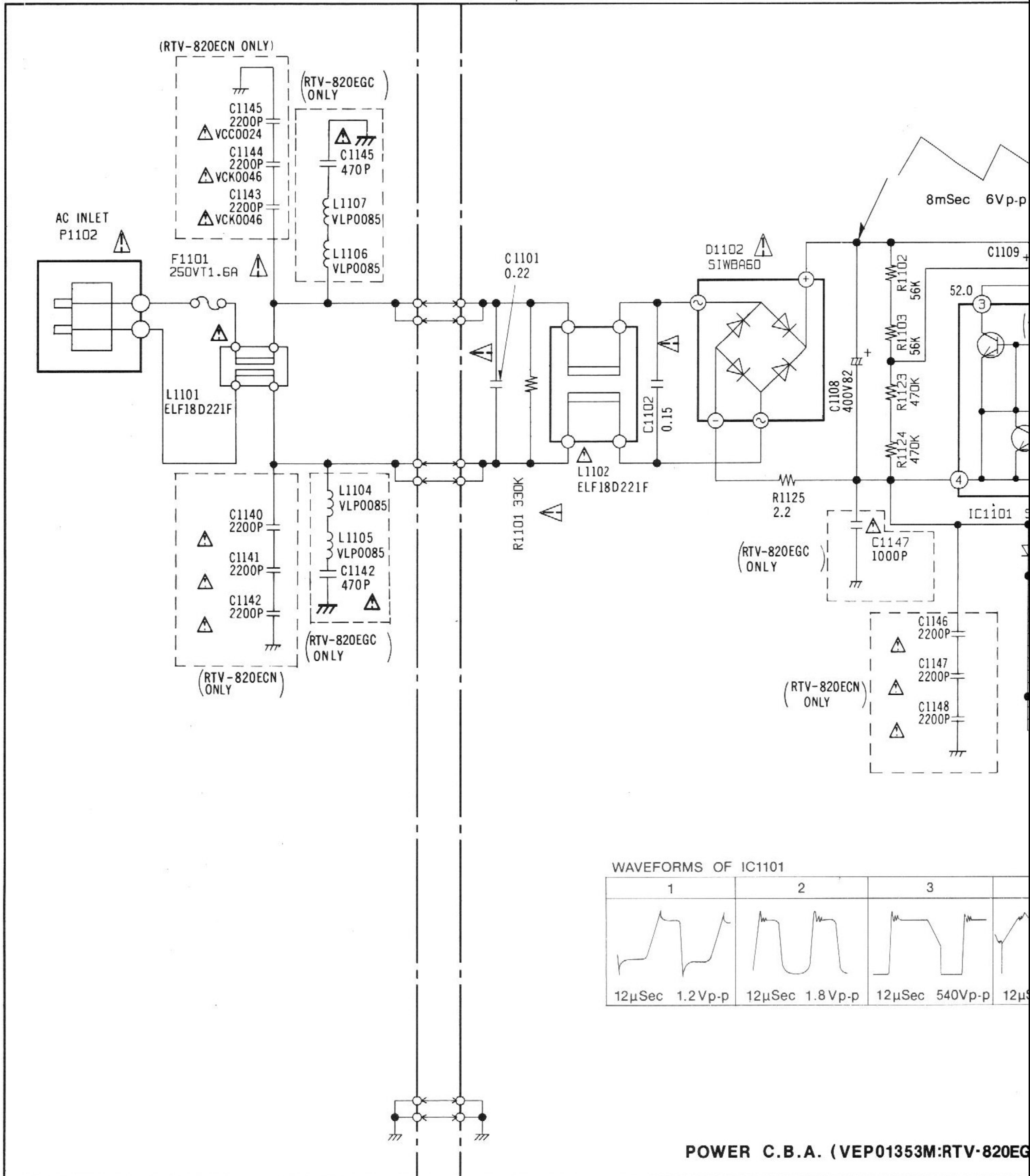
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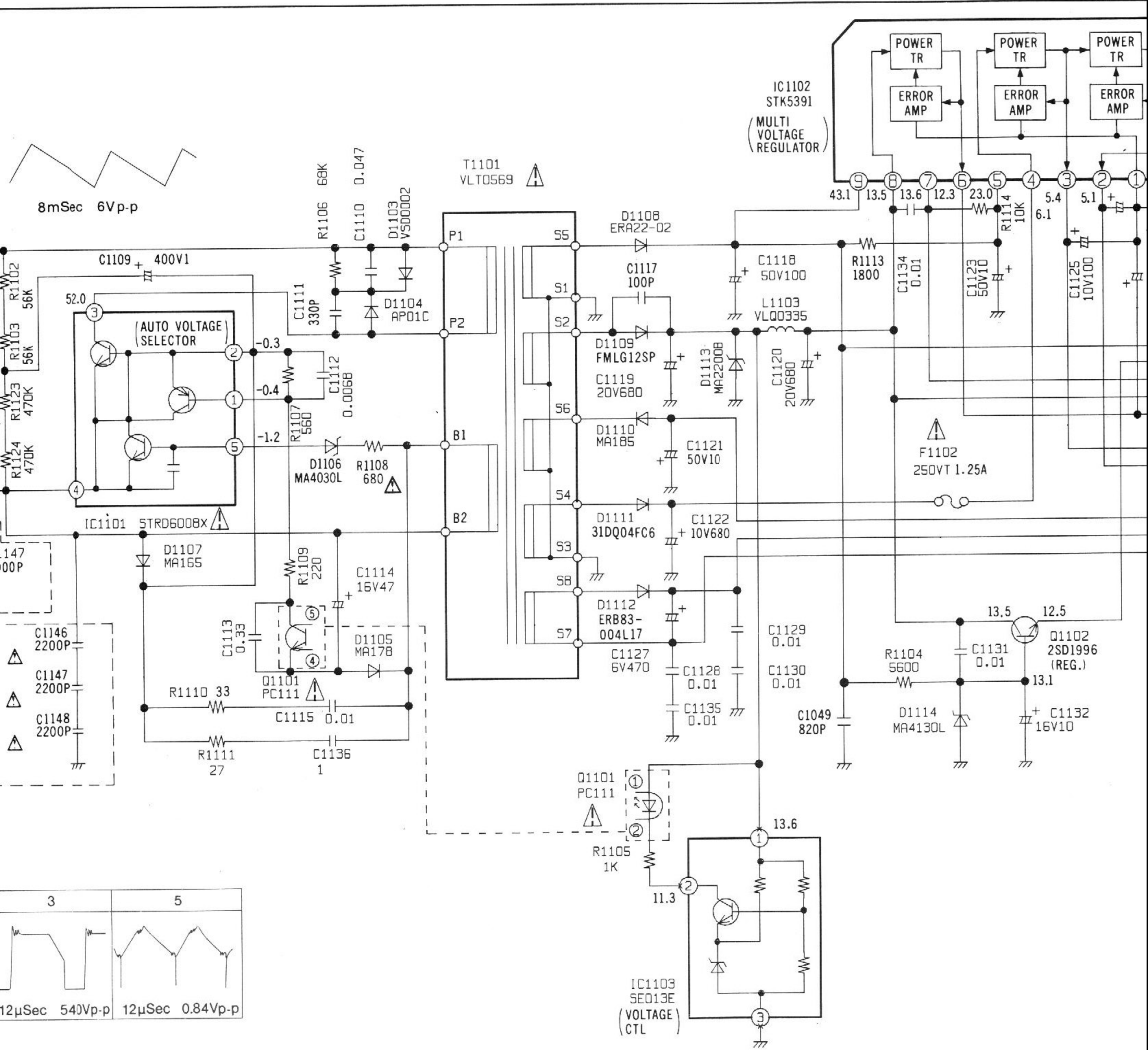
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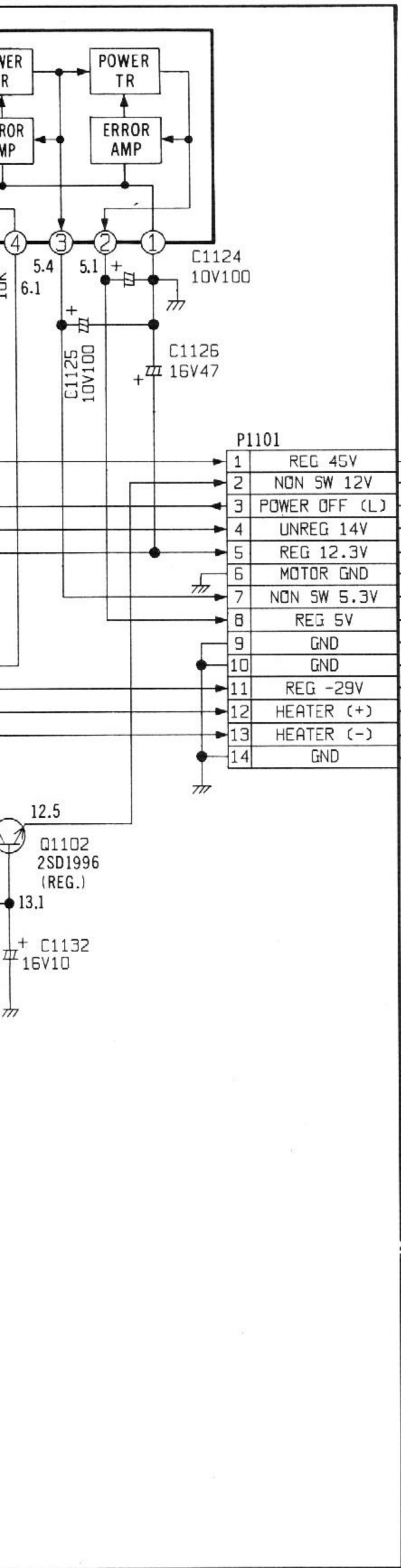
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Schaltbild Netzteil Power Supply Schematic Diagram



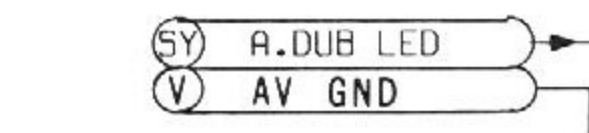
Gleichspannungen Tol ± 15% mit Digitalvoltmeter gegen Masse gemessen (Primär = IC 1101 pin 4 / Sekundär = Masse).



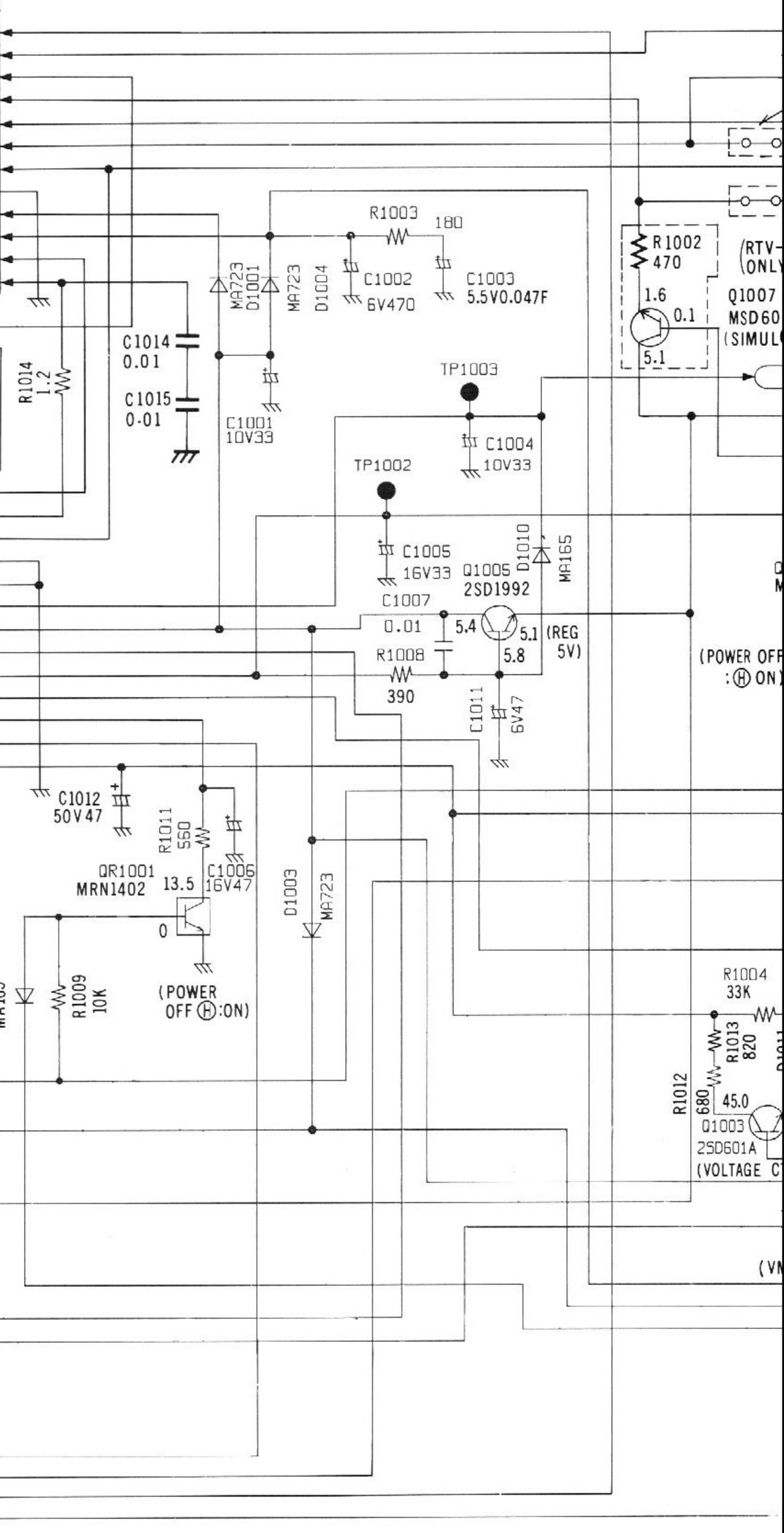
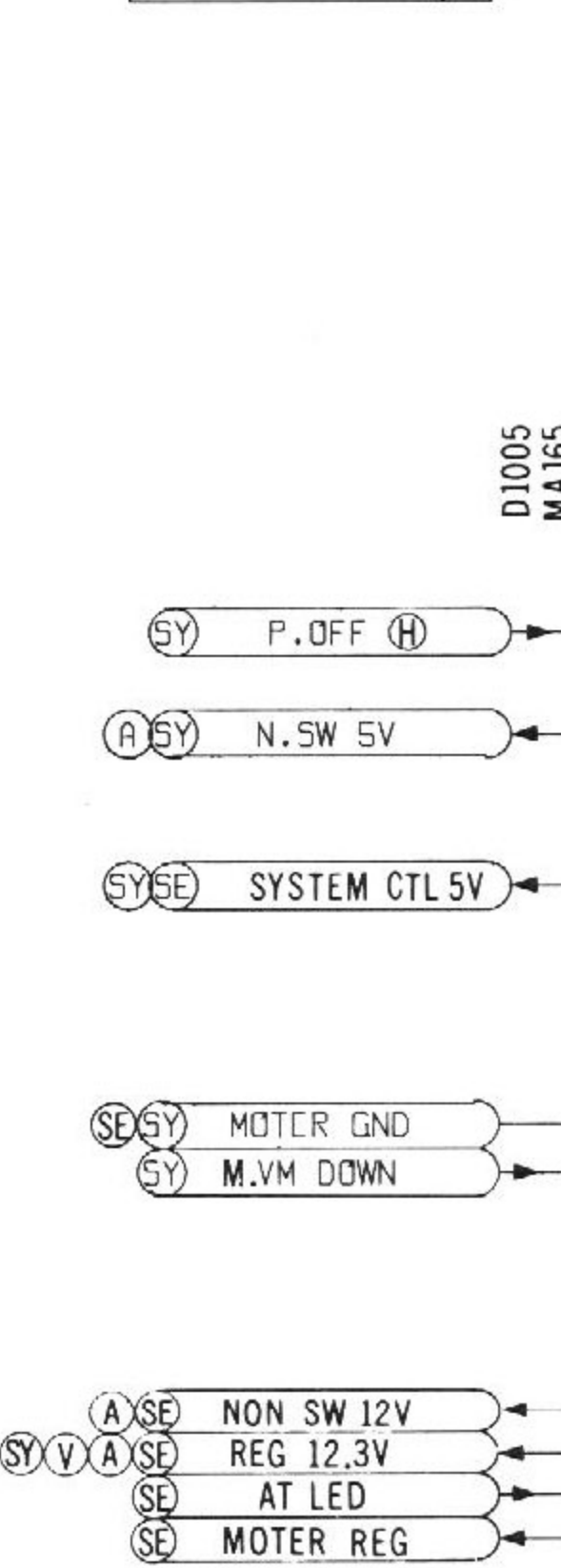


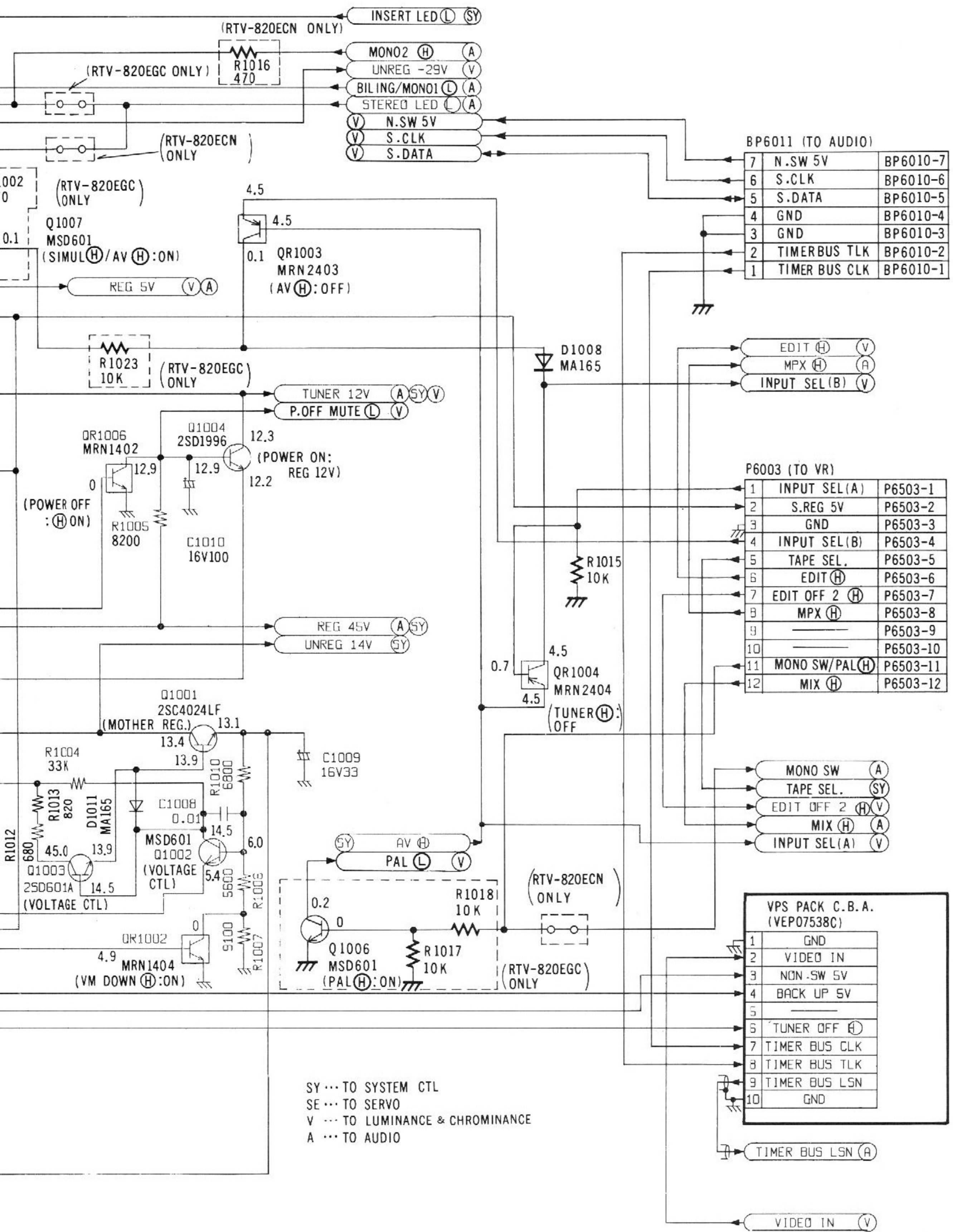
P7401 (TO TIMER)

P7501-13		13
P7501-12	AT LED (L)	12
P7501-11	INSERT LED (L)	11
P7501-10	A.DUB.LED (L)	10
P7501-9	SIMUL(H)/STEREO(L)	9
P7501-8	BILING/MONO1(L)	8
P7501-7	STEREO(L)/MONO2(H)	7
P7501-6	UNREG -29V	6
P7501-5	GND	5
P7501-4	NON SW 5V	4
P7501-3	BACK UP 5V	3
P7501-2	HEATER (L)	2
P7501-1	HEATER (R)	1



P1001		15
AV GND		14
HEATER DC (-)		13
HEATER DC (+)		12
UNREG -29V		11
GND		10
GND		9
REG 5V		8
NON SW 5.3V		7
MOTOR GND		6
REG 12.3V		5
UNREG 14V		4
POWER OFF (L)		3
NON SW 12V		2
REG 45V		1





SY ... TO SYSTEM CTL
 SE ... TO SERVO
 V ... TO LUMINANCE & CHROMINANCE
 A ... TO AUDIO

BP6011 (TO AUDIO)

7	N.SW 5V	BP6010-7
6	S.CLK	BP6010-6
5	S.DATA	BP6010-5
4	GND	BP6010-4
3	GND	BP6010-3
2	TIMERBUS TLK	BP6010-2
1	TIMER BUS CLK	BP6010-1

P6003 (TO VR)

1	INPUT SEL(A)	P6503-1
2	S.REG 5V	P6503-2
3	GND	P6503-3
4	INPUT SEL(B)	P6503-4
5	TAPSEL	P6503-5
6	EDIT	P6503-6
7	EDIT OFF 2	P6503-7
8	MPX	P6503-8
9		P6503-9
10		P6503-10
11	MONO SW/PAL	P6503-11
12	MIX	P6503-12

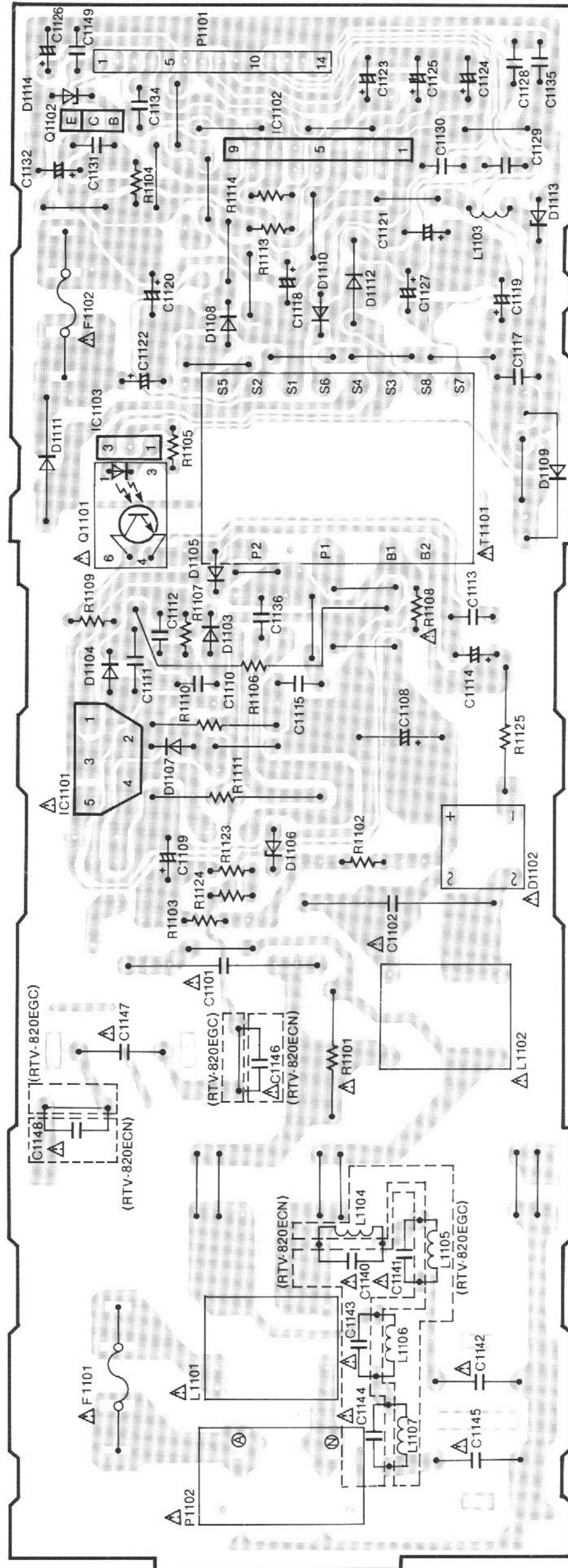
VPS PACK C.B.A. (VEP07538C)

1	GND
2	VIDEO IN
3	NON-SW 5V
4	BACK UP 5V
5	
6	TUNER OFF
7	TIMER BUS CLK
8	TIMER BUS TLK
9	TIMER BUS LSN
10	GND

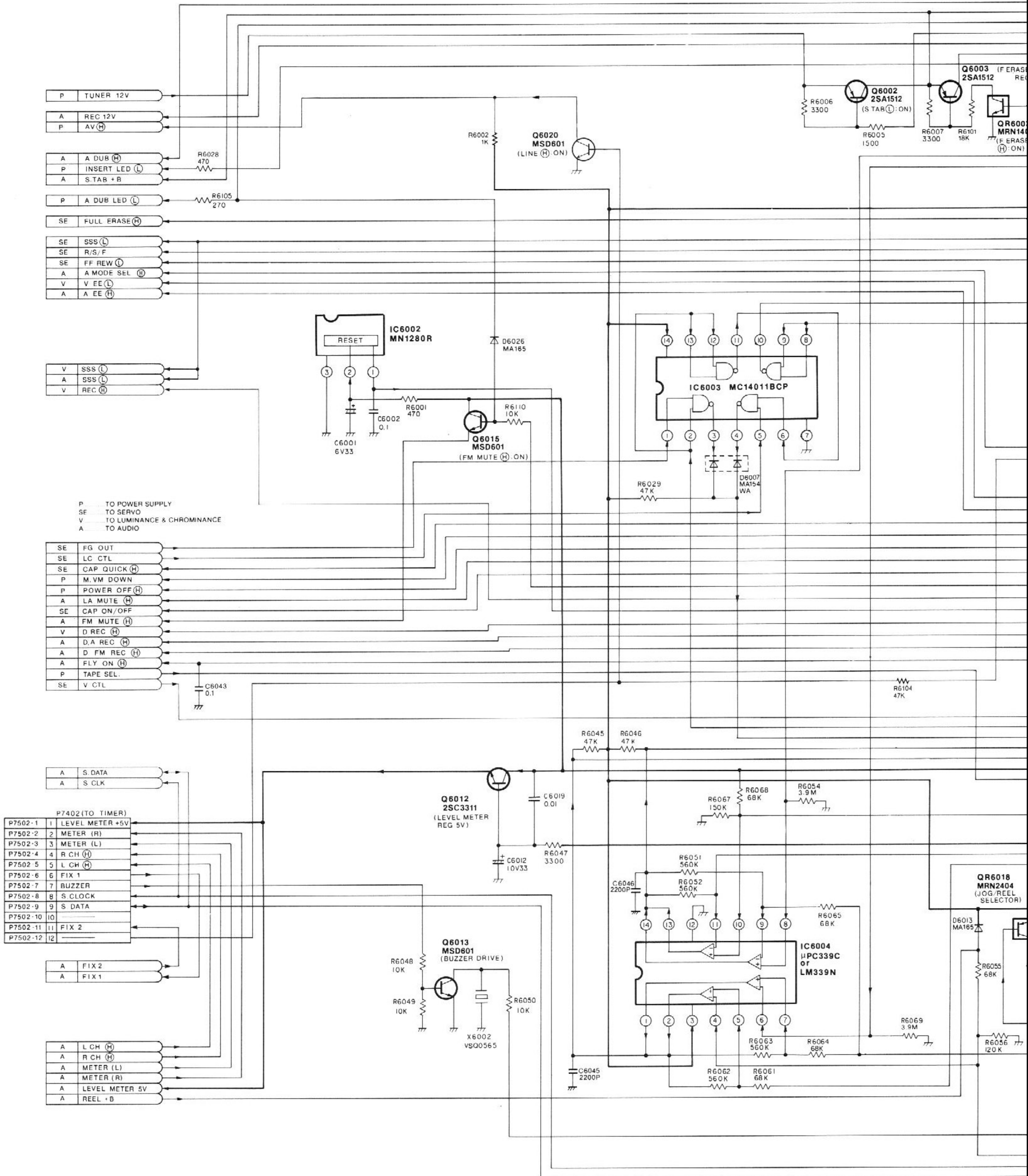
TIMER BUS LSN (A)

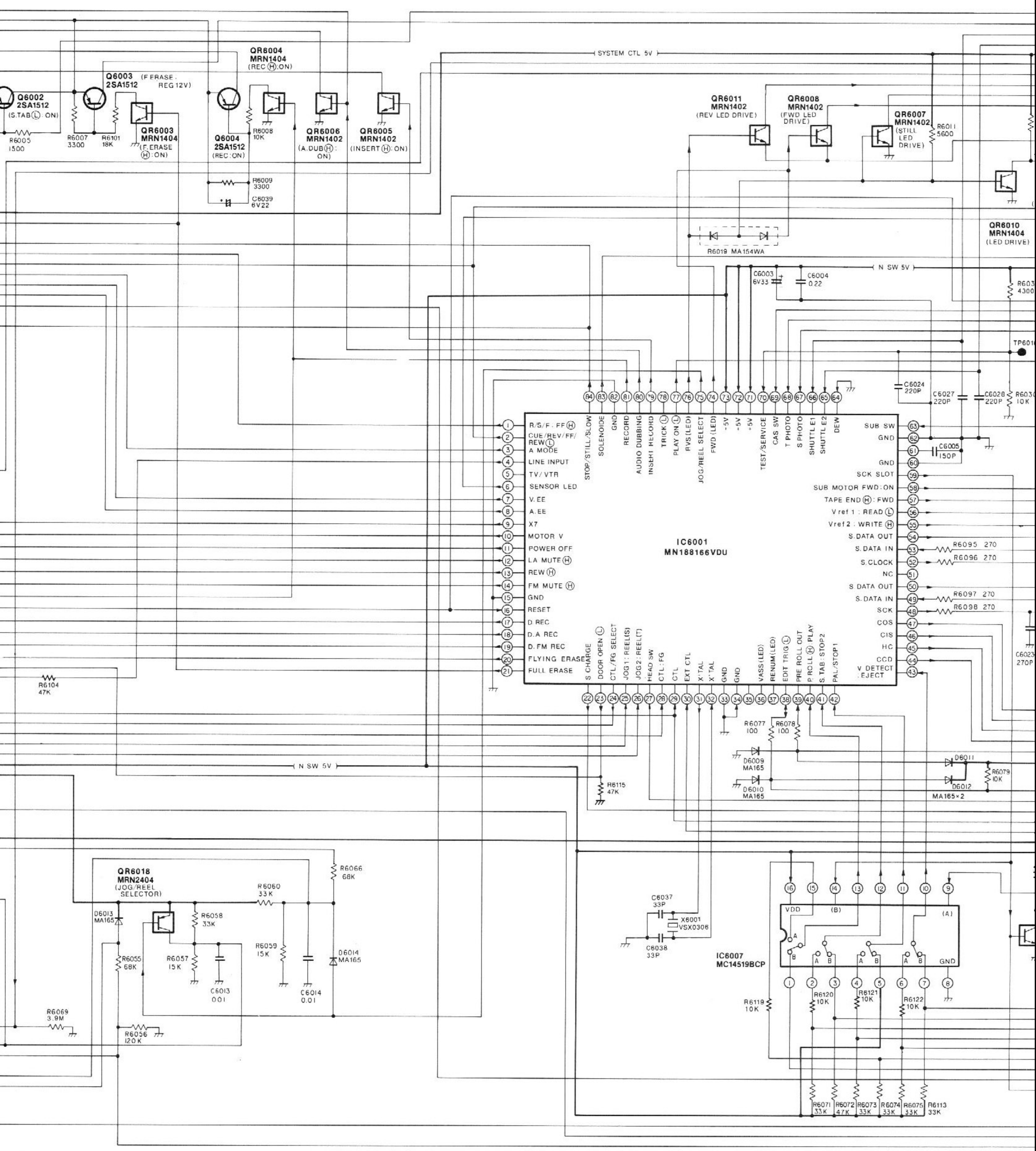
VIDEO IN (V)

Netzteilplatine Power Supply C.B.A.



Schaltbild der Systemsteuerung System Control Schematic Diagram





Q6002 2SA1512 (S.TAB ON)

Q6003 (F.ERASE REG 12V) 2SA1512

QR6003 MRN1404 (F.ERASE ON)

QR6004 MRN1404 (REC ON)

QR6005 MRN1402 (INSERT ON)

QR6006 MRN1402 (A.DUB ON)

QR6007 MRN1402 (STILL LED DRIVE)

QR6008 MRN1402 (FWD LED DRIVE)

QR6011 MRN1402 (REV LED DRIVE)

QR6010 MRN1404 (LED DRIVE)

IC6001 MN188166VDU

1 R/S/F: FF (H)

2 CUE/REV/FF/REW (L)

3 A MODE

4 LINE INPUT

5 TV/VTR

6 SENSOR LED

7 V.EE

8 A.EE

9 X7

10 MOTOR V

11 POWER OFF

12 LA MUTE (H)

13 REW (H)

14 FM MUTE (H)

15 GND

16 RESET

17 D REC

18 D.A REC

19 D.FM REC

20 FLYING ERASE

21 FULL ERASE

22 S CHARGE

23 DOOR OPEN (L)

24 CTL/FG SELECT

25 JOG1: REEL(S)

26 JOG2: REEL(T)

27 HEAD SW

28 CTL: FG

29 CTL

30 EXT CTL

31 X'TAL

32 X'TAL

33 GND

34 GND

35 VASS(LED)

36 RENUM(LED)

37 EDIT TRIG (L)

38 PRE ROLL OUT

39 P ROLL PLAY

40 S.TAB: STOP2

41 PAL/STOP1

42

63 SUB SW

62 GND

61

60 GND

59 SCK SLOT

58 SUB MOTOR FWD: ON

57 TAPE END (H): FWD

56 Vref1: READ (L)

55 Vref2: WRITE (H)

54 S DATA OUT

53 S DATA IN

52 S.CLOCK

51 NC

50 S DATA OUT

49 S DATA IN

48 SCK

47 COS

46 CIS

45 HC

44 CCD

43 V DETECT

42 EJECT

QR6018 MRN2404 (JOG/REEL SELECTOR)

R6050 33K

R6058 33K

R6059 15K

R6055 68K

R6057 15K

R6056 120K

D6013 MA165

D6014 MA165

C6013 0.01

C6014 0.01

R6066 68K

R6069 3.9M

IC6007 MC14519BCP

VDD (B)

GND (A)

16

15

14

13

12

11

10

9

1

2

3

4

5

6

7

8

R6119 10K

R6120 10K

R6121 10K

R6122 10K

R6071 33K

R6072 47K

R6073 33K

R6074 33K

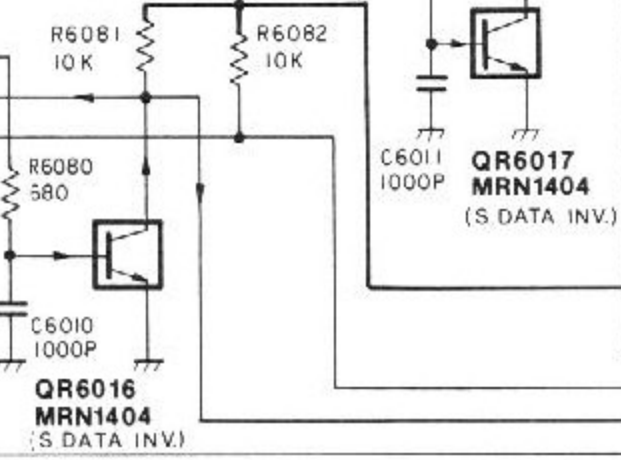
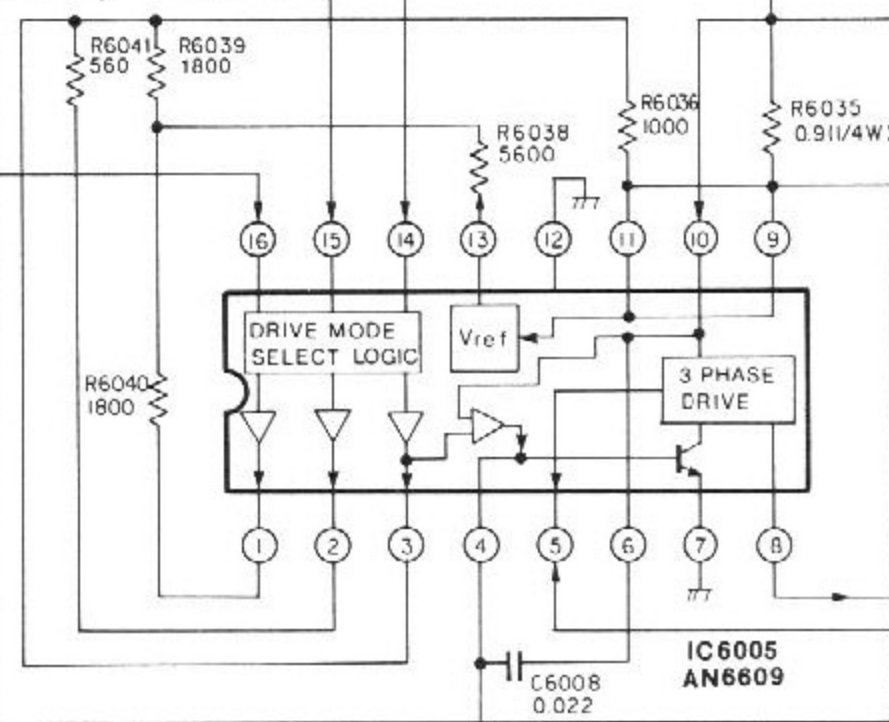
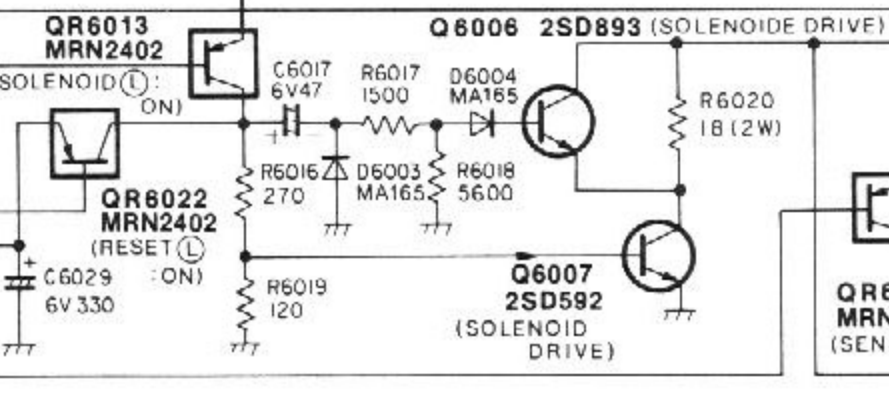
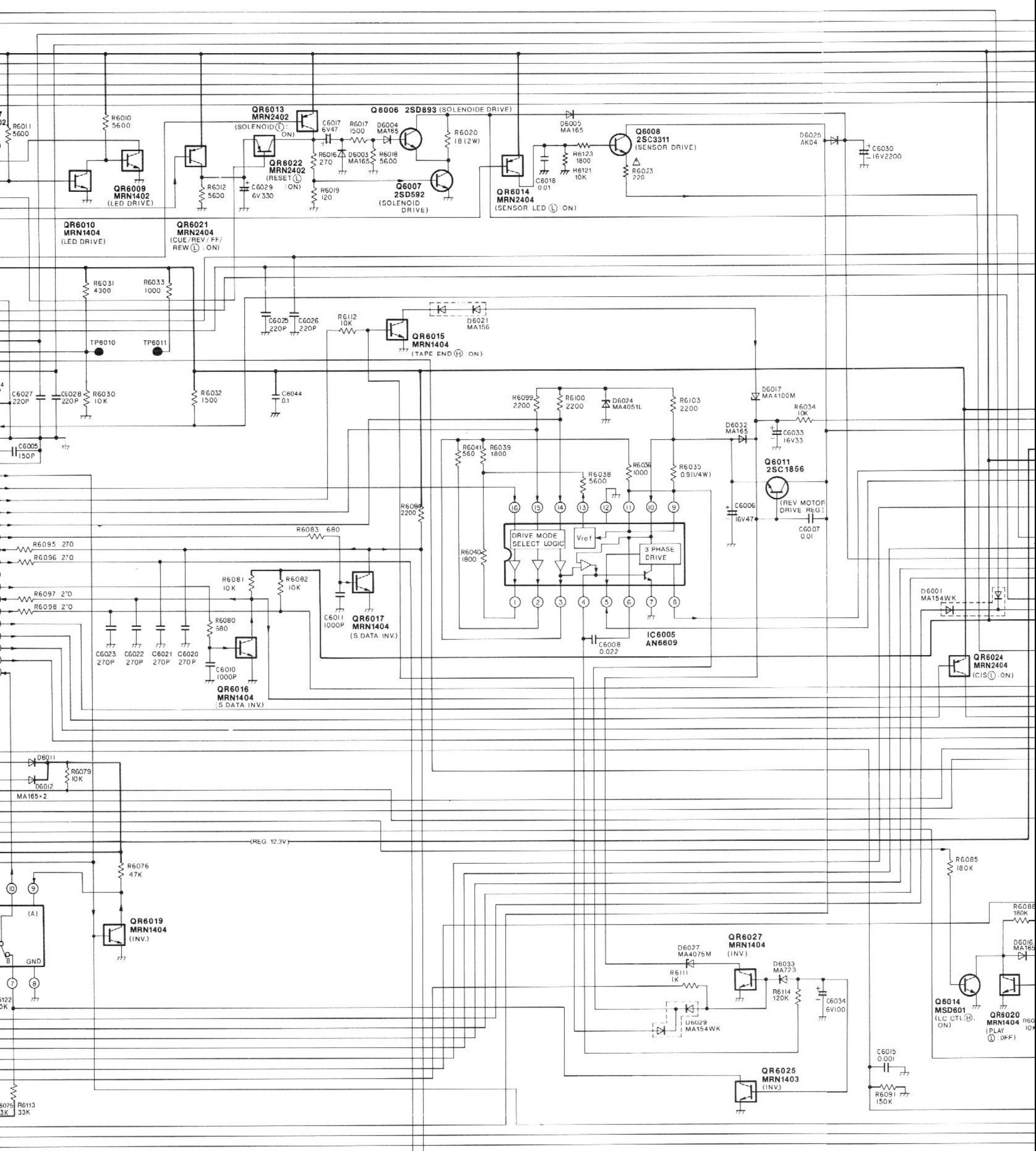
R6075 33K

R6113 33K

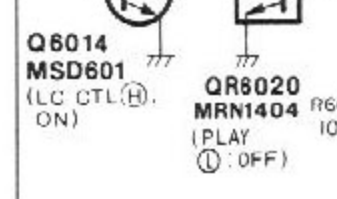
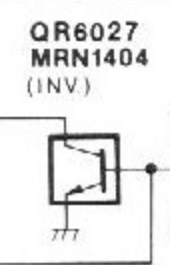
C6037 33P

C6038 33P

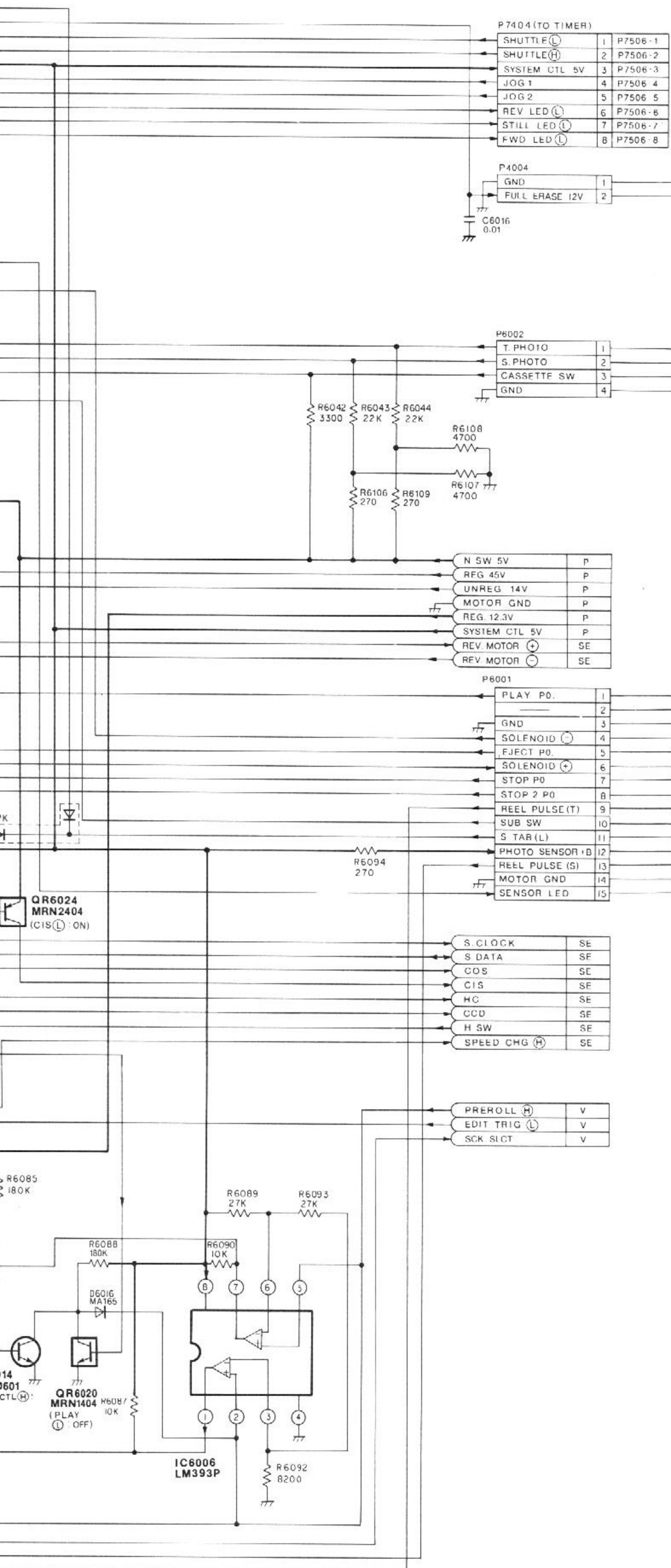
X6001 VSX0306



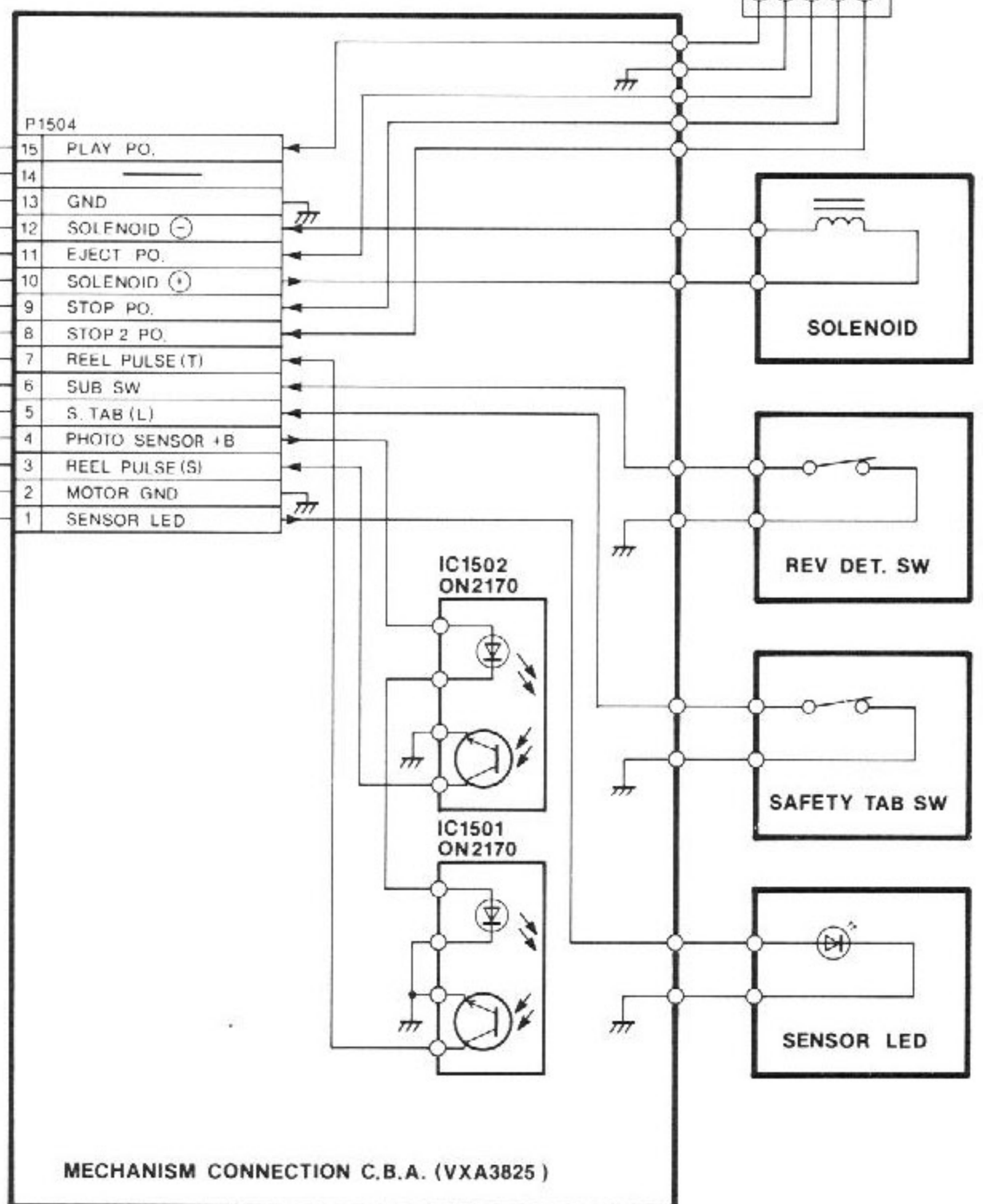
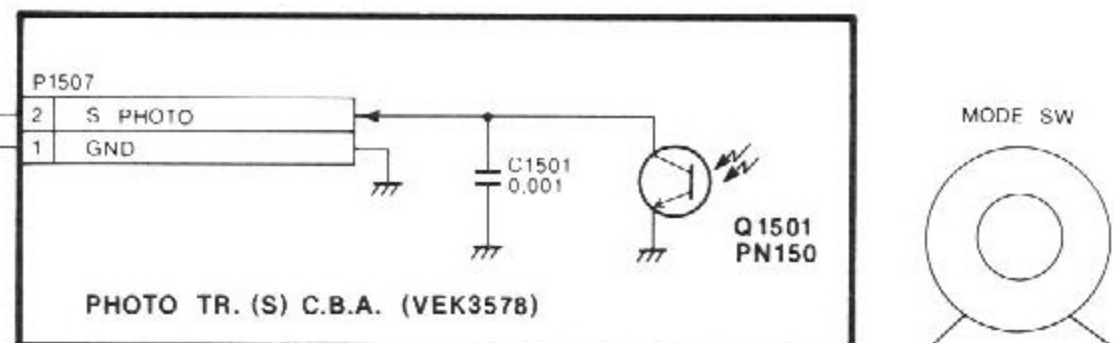
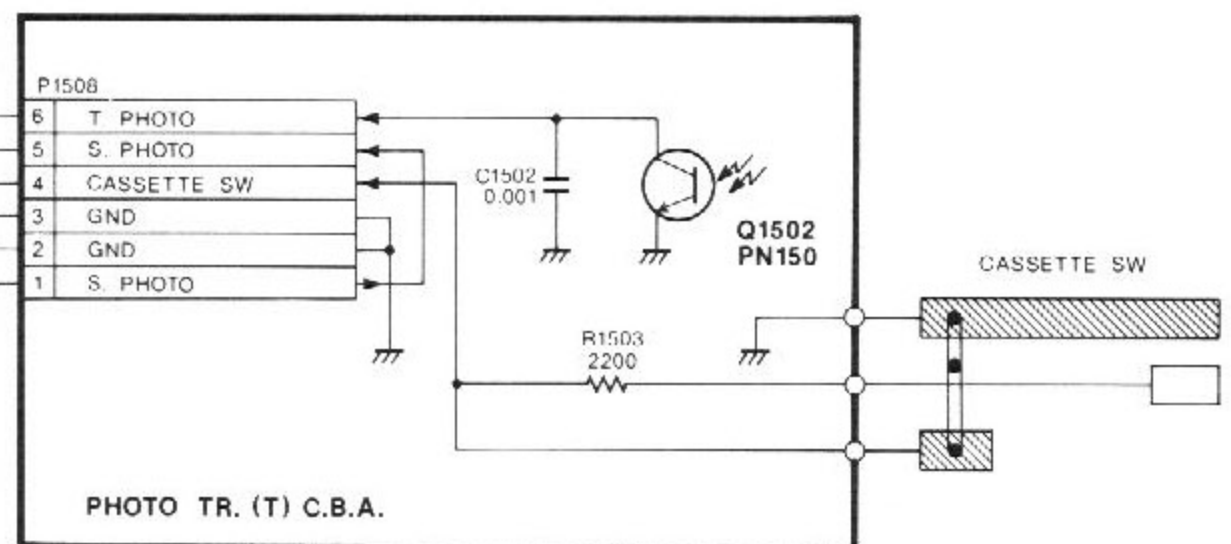
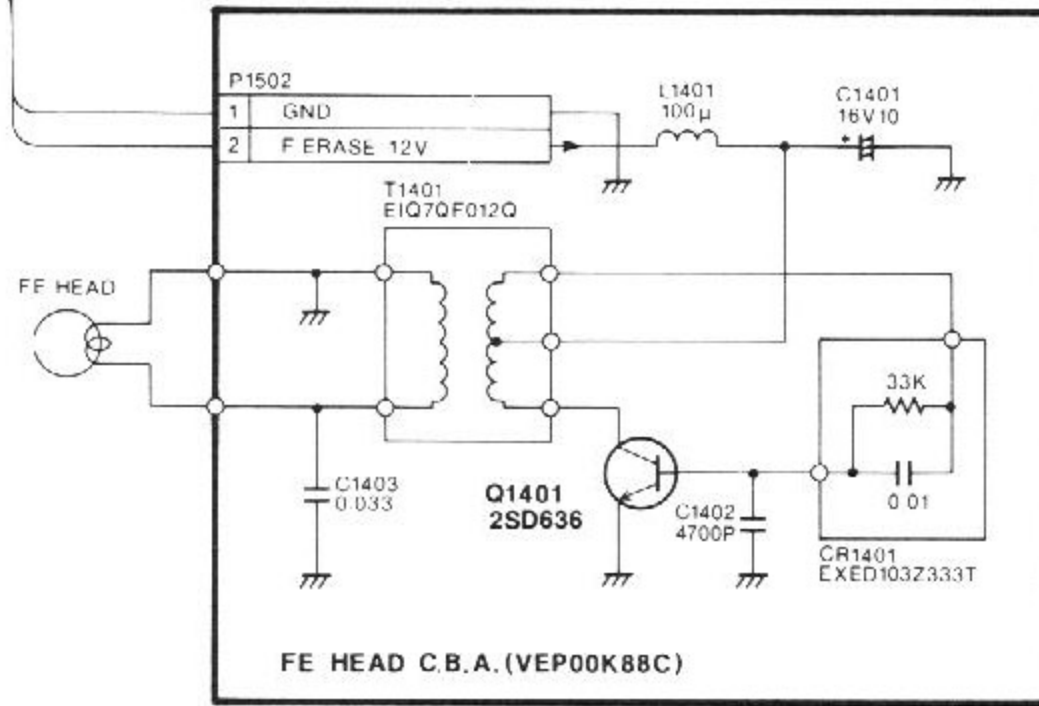
(REG 12.3V)



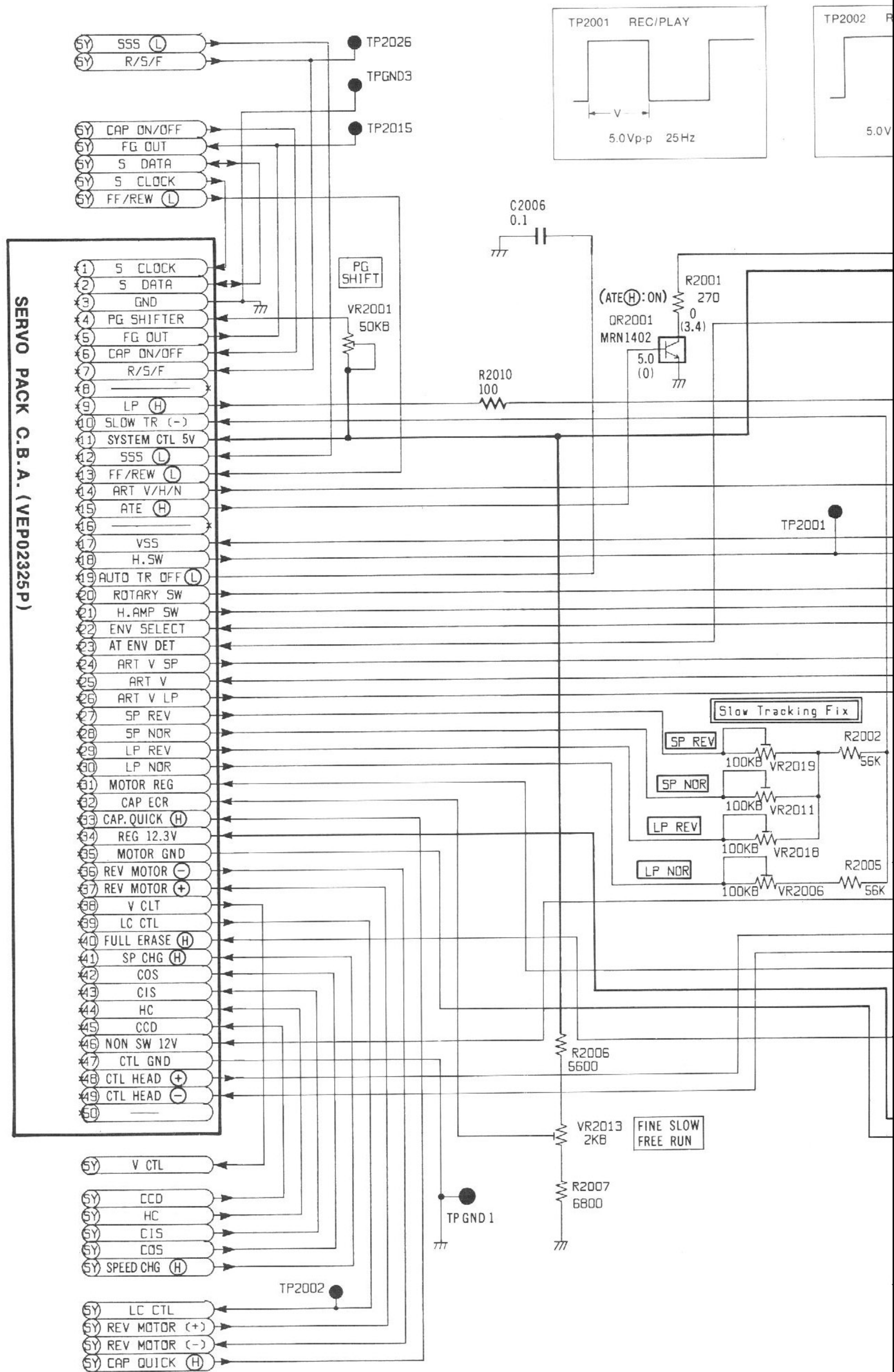
Schaltbild der Systemsteuerung System Control Schematic Diagram

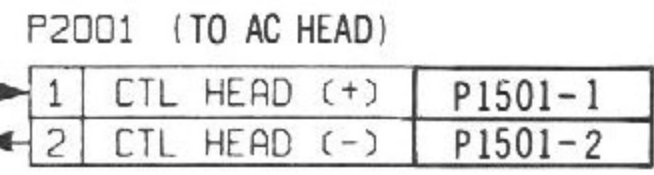
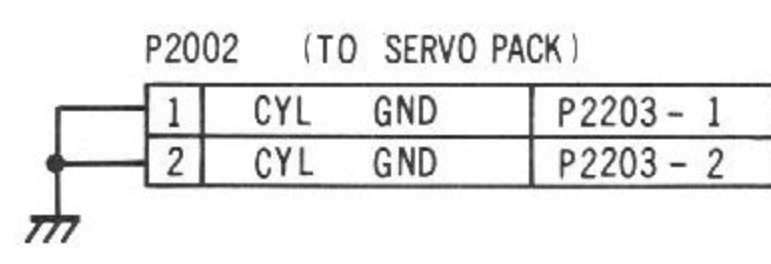
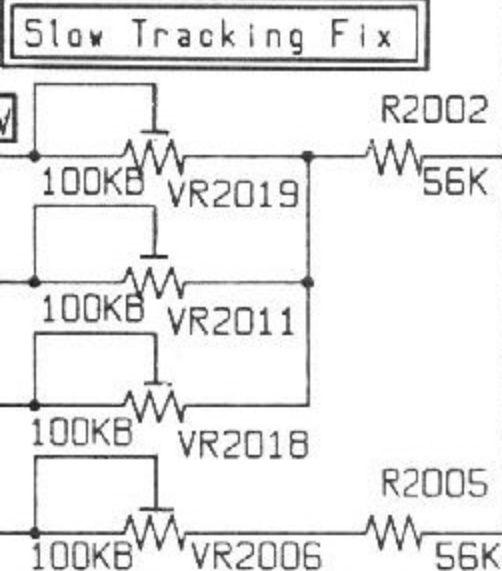
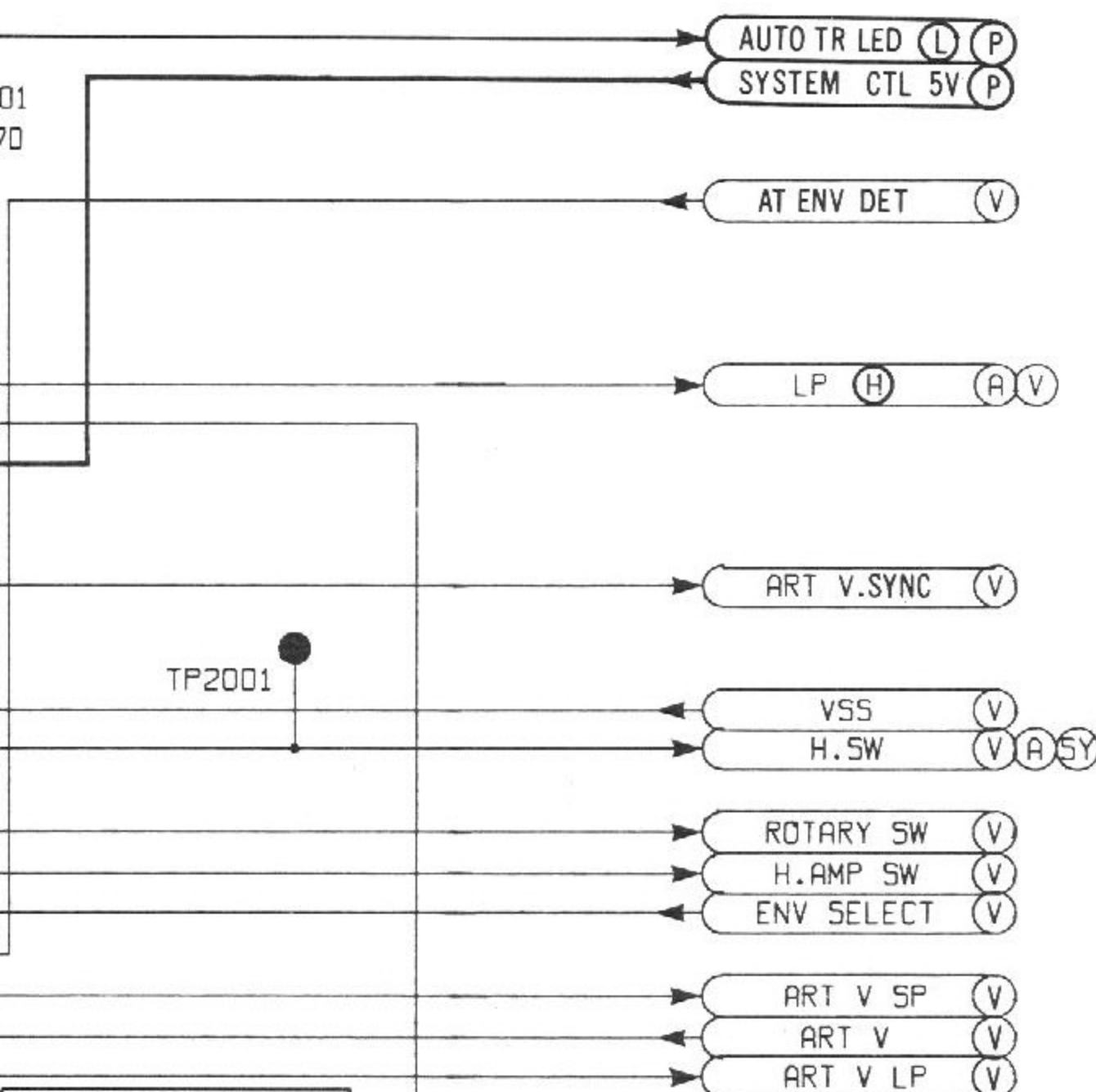
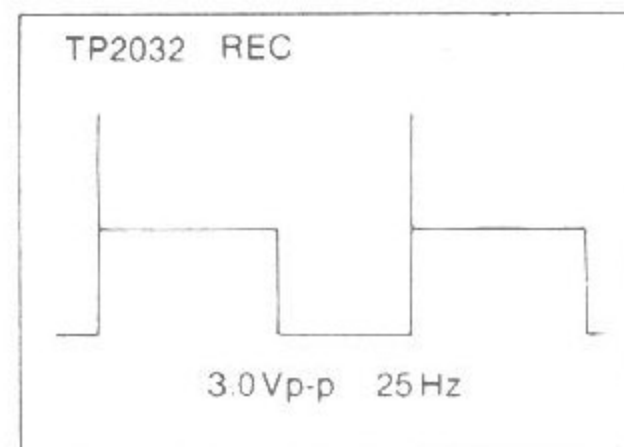
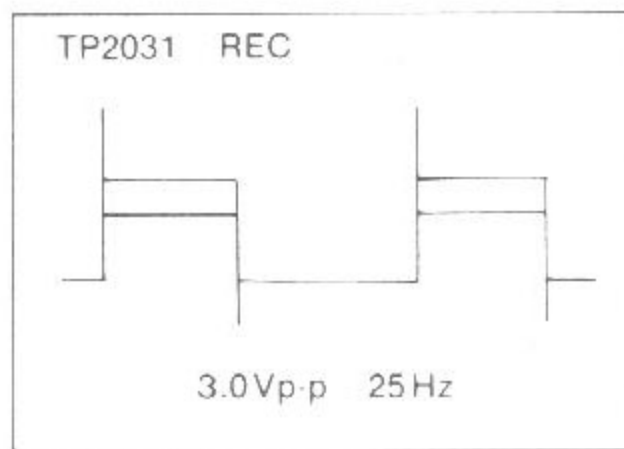
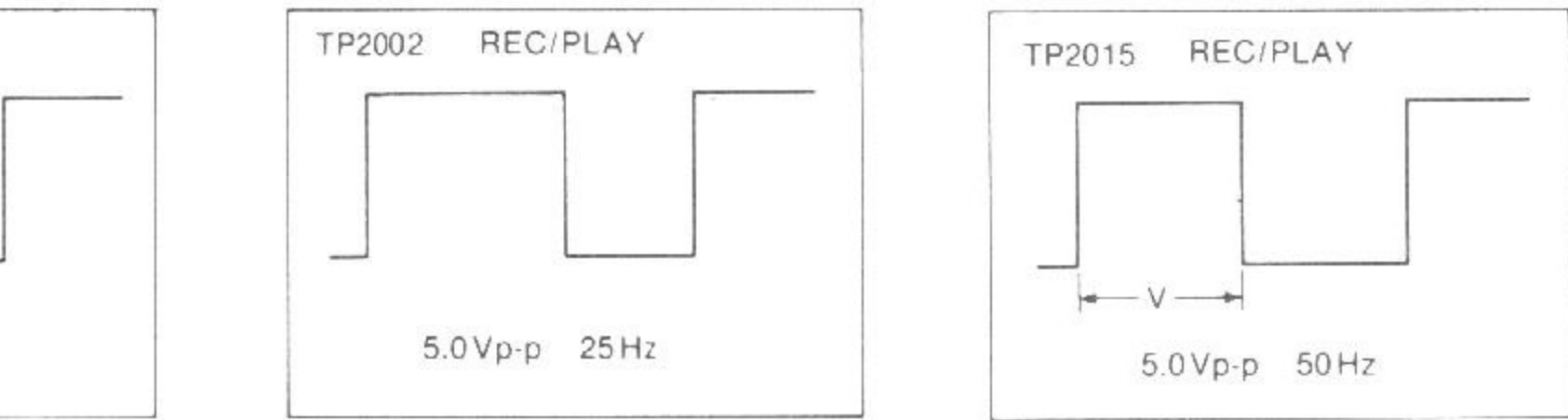


NOTE: DO NOT USE ANY PART NUMBER SHOWN ON THIS SCHEMATIC DIAGRAM FOR ORDERING. WHEN YOU ORDER A PART, PLEASE REFER TO PARTS LIST



Schaltbild des Servoteiles auf der Hauptplatte Servo Section Schematic Diagram on Main C.B.A.



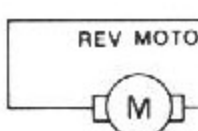
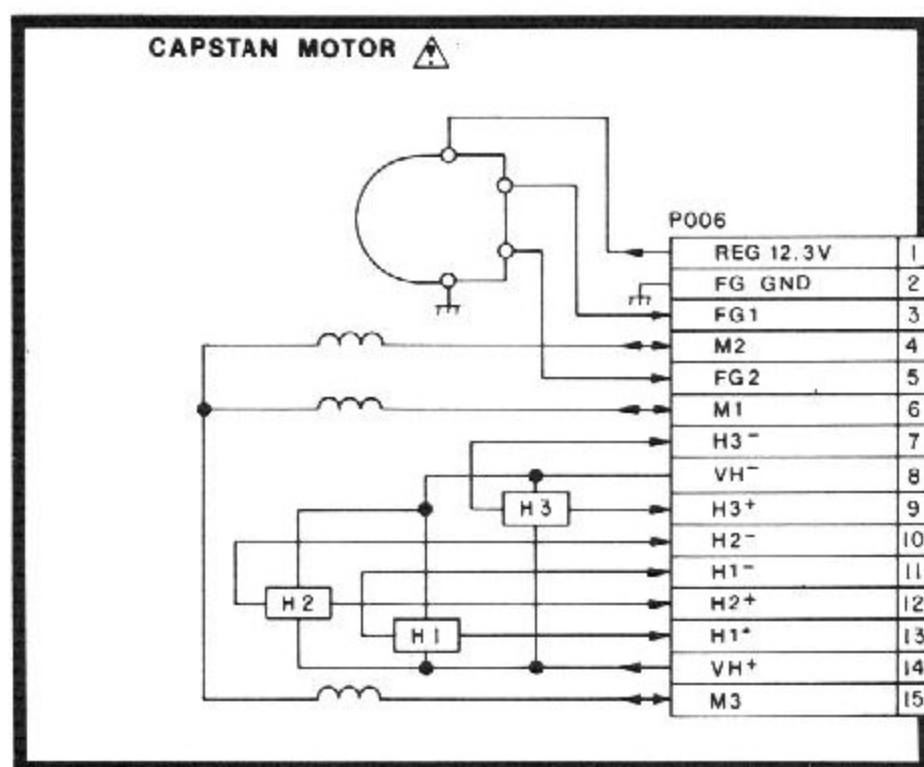
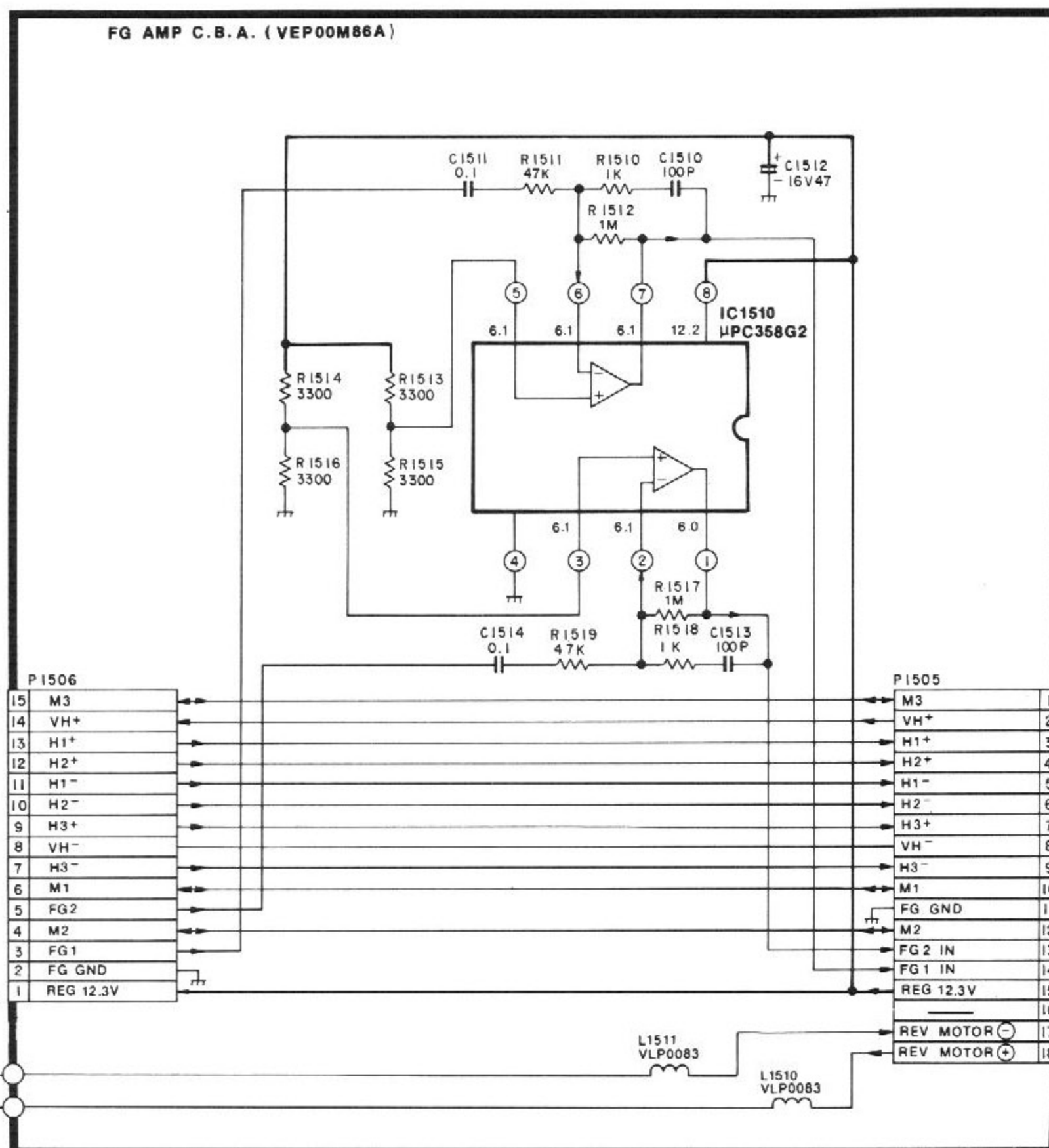
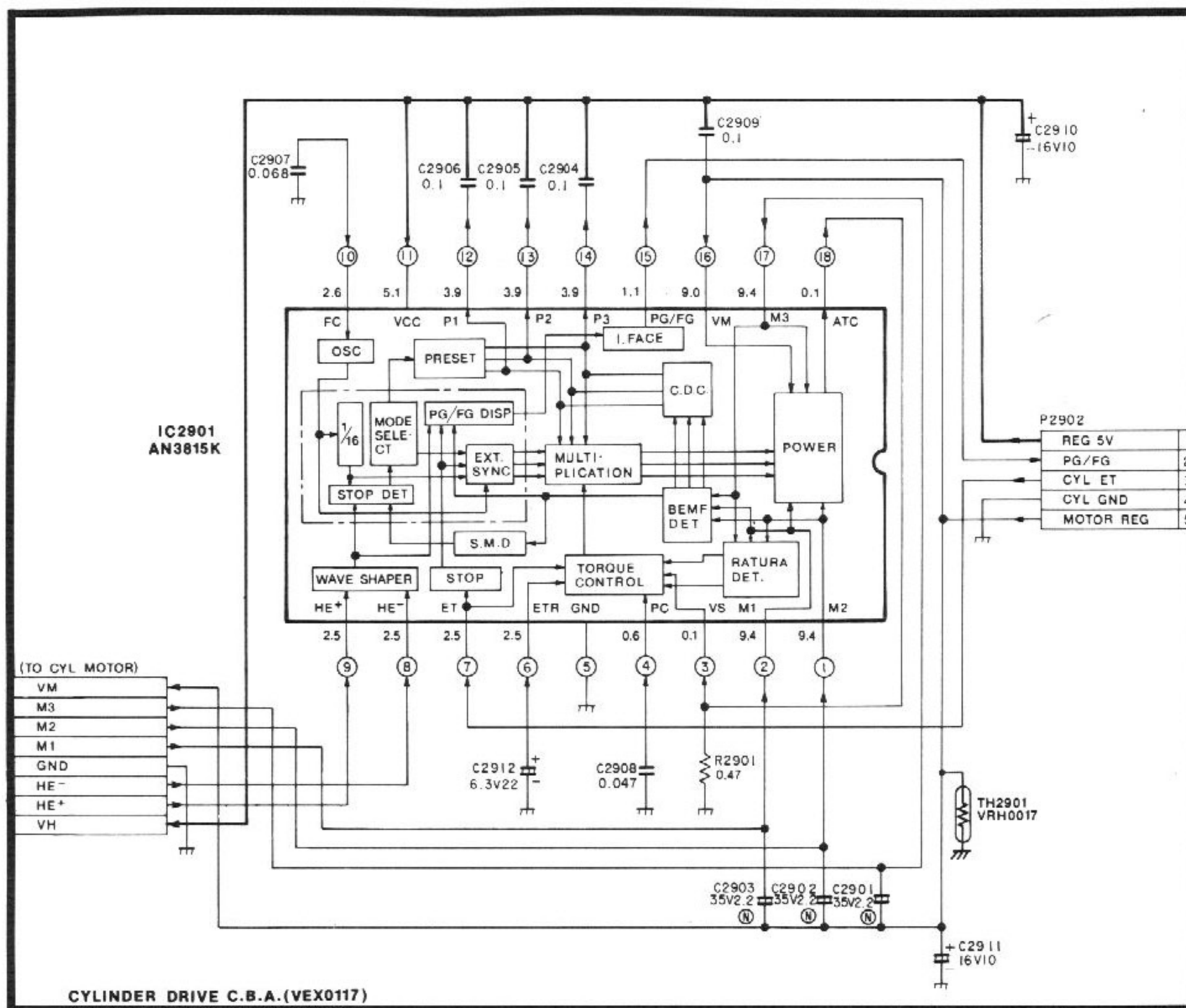
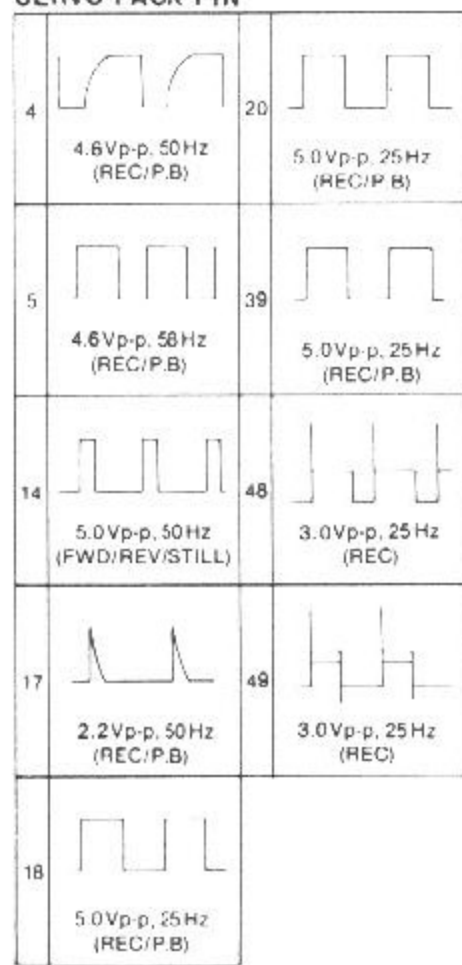


- AUTO TR LED (L) (P)
- SYSTEM CTL 5V (P)
- AT ENV DET (V)
- LP (H) (A) (V)
- ART V.SYNC (V)
- VSS (V)
- H.SW (V) (A) (SY)
- ROTARY SW (V)
- H.AMP SW (V)
- ENV SELECT (V)
- ART V SP (V)
- ART V (V)
- ART V LP (V)
- NON SW 12V (P)
- FULL ERASE (H) (SY)
- MOTOR REG (P)
- REG 12.3V (P)
- MOTOR GND (P)

V.....TO LUMINANCE & CHROMINANCE
 A.....TO AUDIO
 SY.....TO SYSTEM CONTROL & SERVO
 P.....TO POWER SUPPLY

Schaltbild des Servoteiles Servo Pack Schematic Diagram

WAVEFORMS OF SERVO PACK PIN



Gleichspannungen Tol ± 15% mit Digitalvoltmeter gegen Masse gemessen „Wiedergabe“, () = Aufnahme (SP).

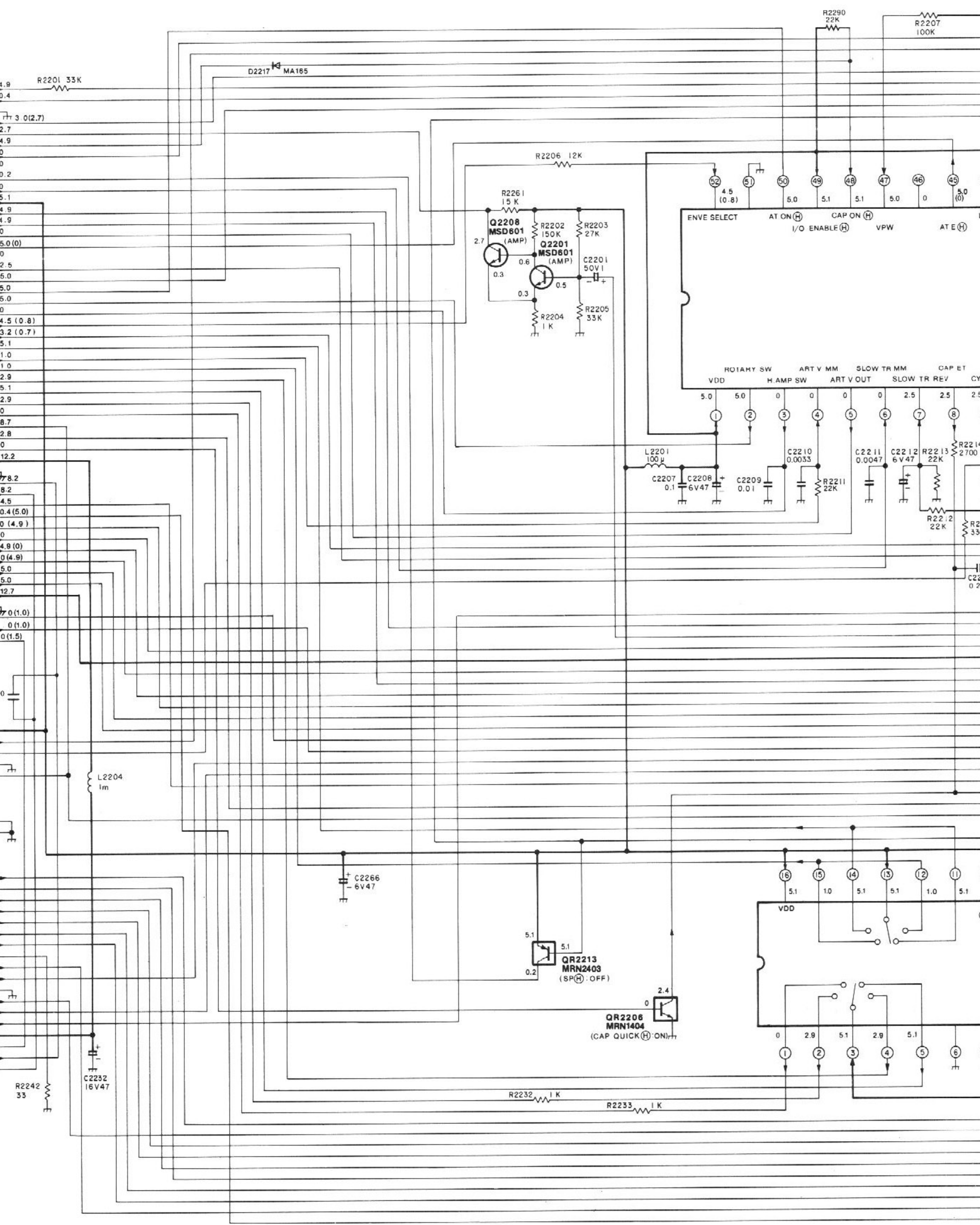
PACK PIN (TO SERVO)	
1	S. CLOCK
2	S. DATA
3	GND
4	PG SHIFTER
5	FG OUT
6	CAP ON/OFF
7	R/S/F
8	
9	LP (H)
10	SLOW TR (H)
11	REG 5V
12	SSS (L)
13	FF/REW (L)
14	ART V/H/N
15	ATE (H)
16	
17	VSS
18	H SW
19	A TR OFF (L)
20	ROTARY SW
21	H AMP SW
22	ENVE SELECT
23	AT ENV DET
24	ART V SP
25	ART V
26	ART V LP
27	SP REV
28	SP NOR
29	LP REV
30	LP NOR
31	MOTOR REG
32	CAP ECR
33	CAP QUICK (H)
34	REG 12.3V
35	MOTOR GND
36	REV MOTOR (H)
37	REV MOTOR (L)
38	V CTL
39	LC CTL
40	FULL ERASE (H)
41	SP CHG (H)
42	COS
43	CIS
44	HC
45	CCD
46	N SW 12V
47	CTL GND
48	CTL HEAD (H)
49	CTL HEAD (L)
50	

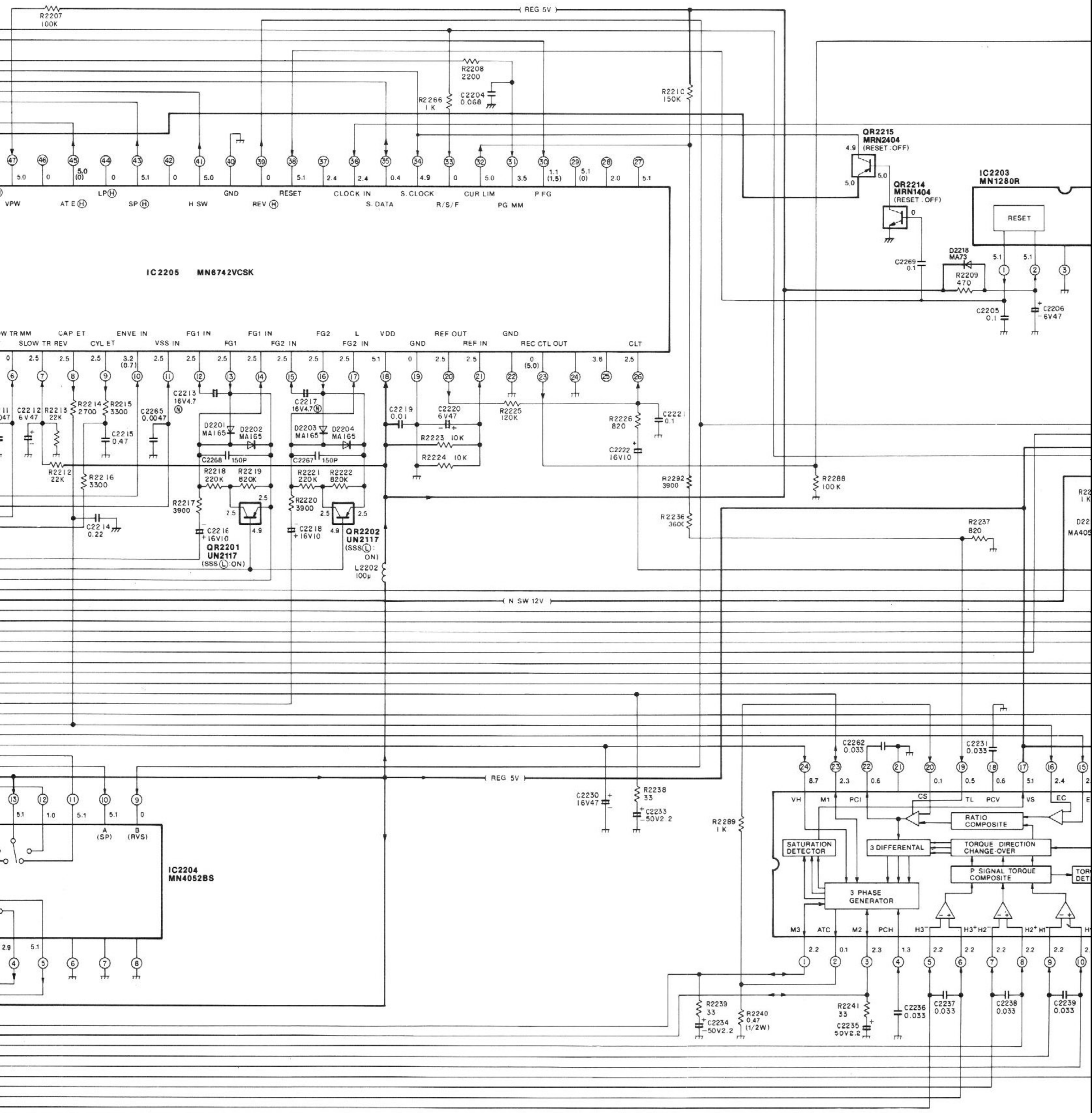
P2201	
1	REG 5V
2	PG/FG
3	CYL ET
4	CYL GND
5	MOTOR REG

P2203 (TO SERVO)	
P2002-1	GND
P2002-2	GND

P2202	
1	M3
2	VH+
3	H1+
4	H2+
5	H1-
6	H2-
7	H3+
8	VH-
9	H3-
10	M1
11	FG GND
12	M2
13	FG 2 IN
14	FG 1 IN
15	REG 12.3V
16	
17	REV MOTOR (H)
18	REV MOTOR (L)

1	
2	
3	
4	
5	
6	
7	
8	
9	
10	
11	
12	
13	
14	
15	2.3V
16	
17	MOTOR (H)
18	MOTOR (L)





IC2205 MN6742VCSK

IC2204 MN4052BS

IC2203 MN1280R

QR2215 MRN2404 (RESET OFF)

QR2214 MRN1404 (RESET OFF)

QR2201 UN2117 (SSS(L): ON)

QR2202 UN2117 (SSS(L): ON)

SATURATION DETECTOR

3 DIFFERENTIAL

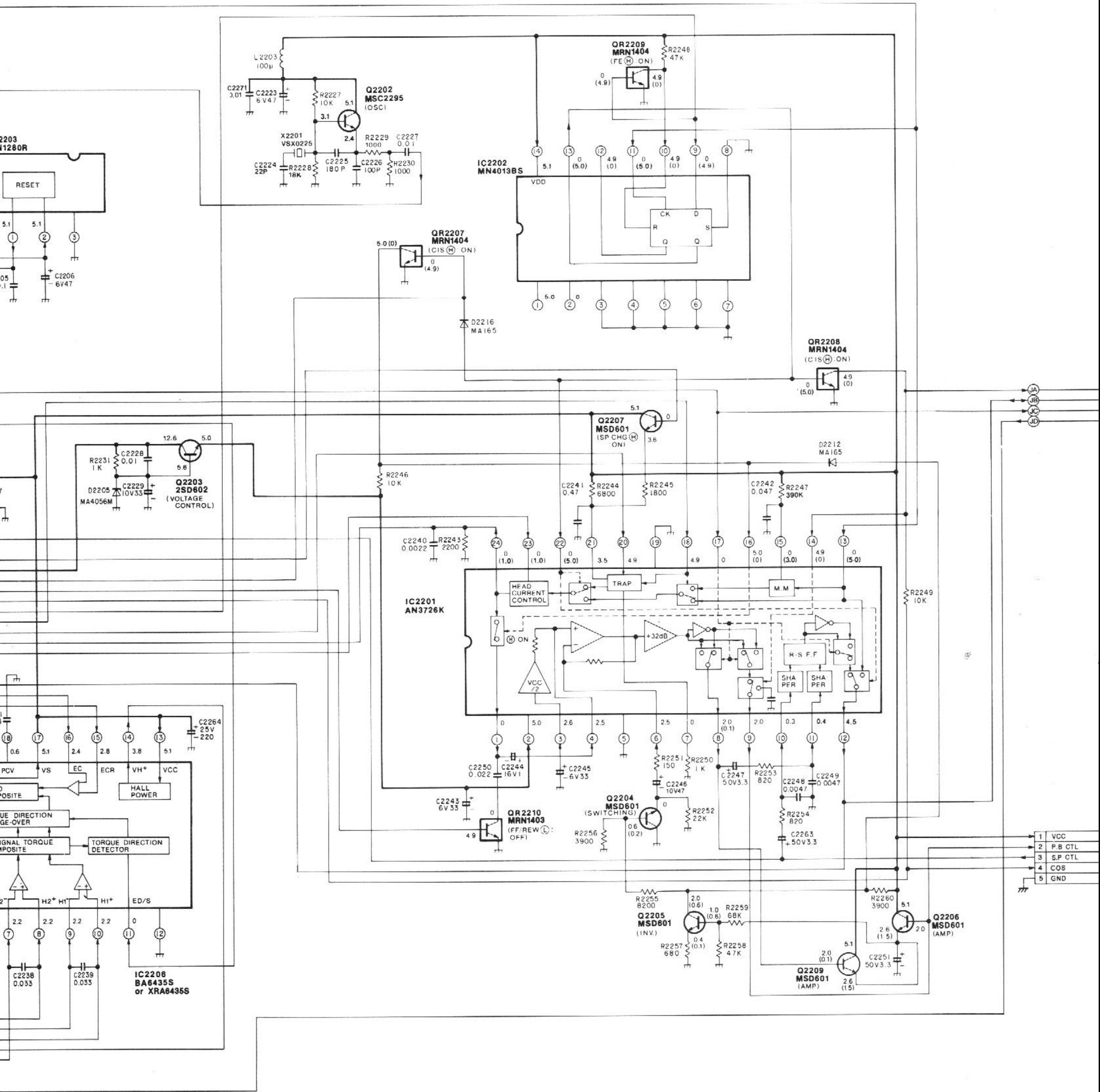
TORQUE DIRECTION CHANGE-OVER

P SIGNAL TORQUE COMPOSITE

3 PHASE GENERATOR

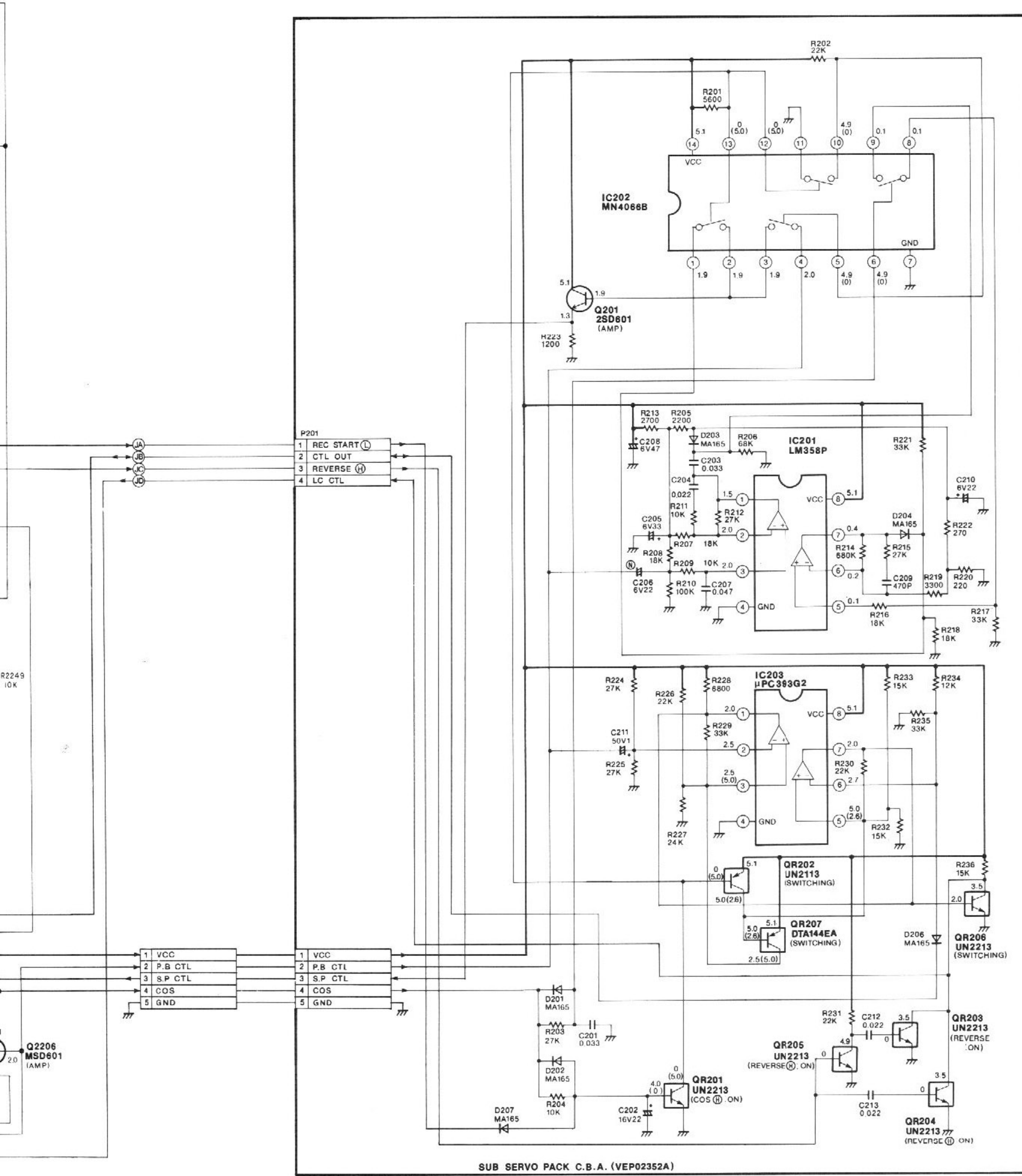
RATIO COMPOSITE

TOR DET

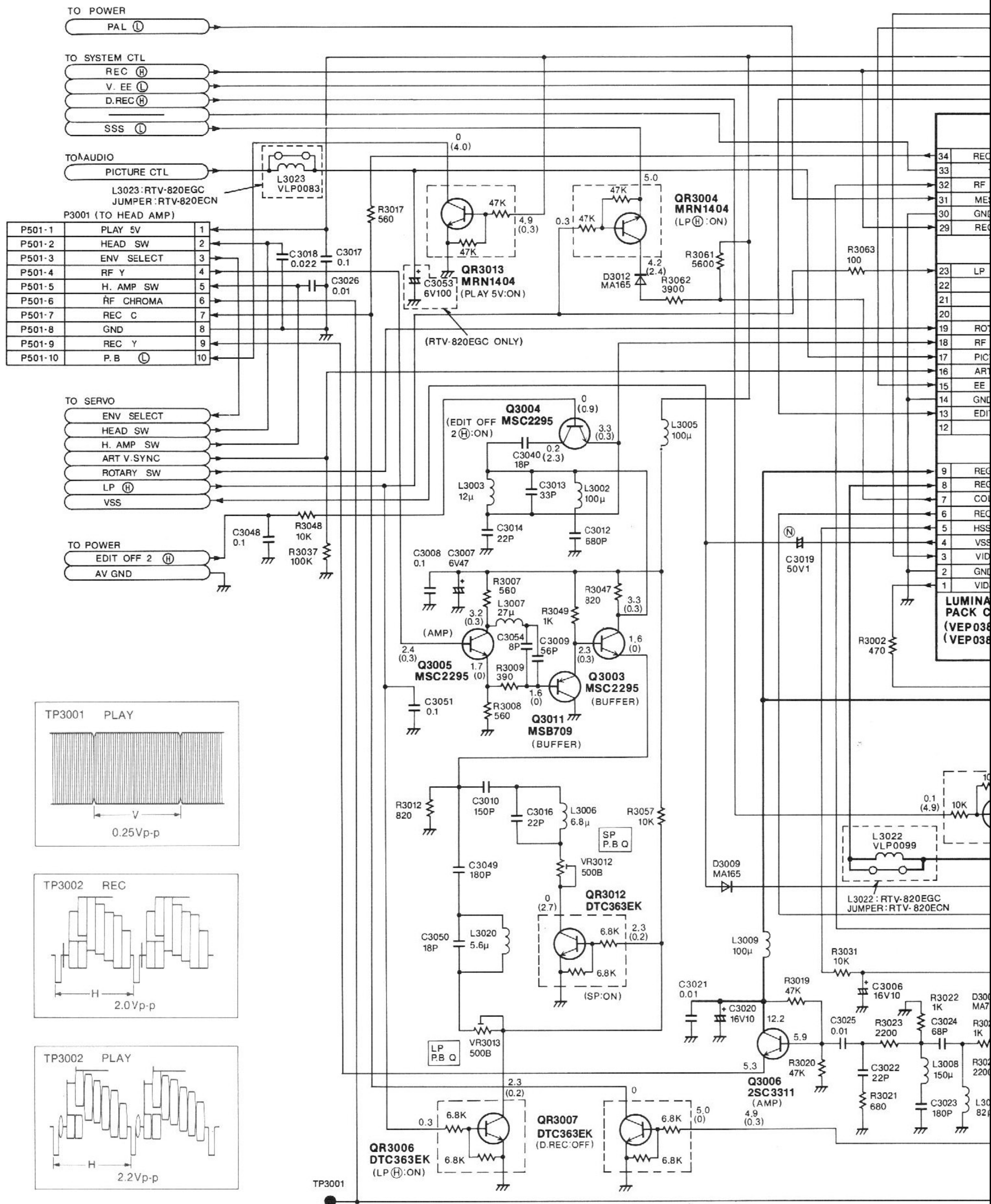


Schaltbild des Servoteiles

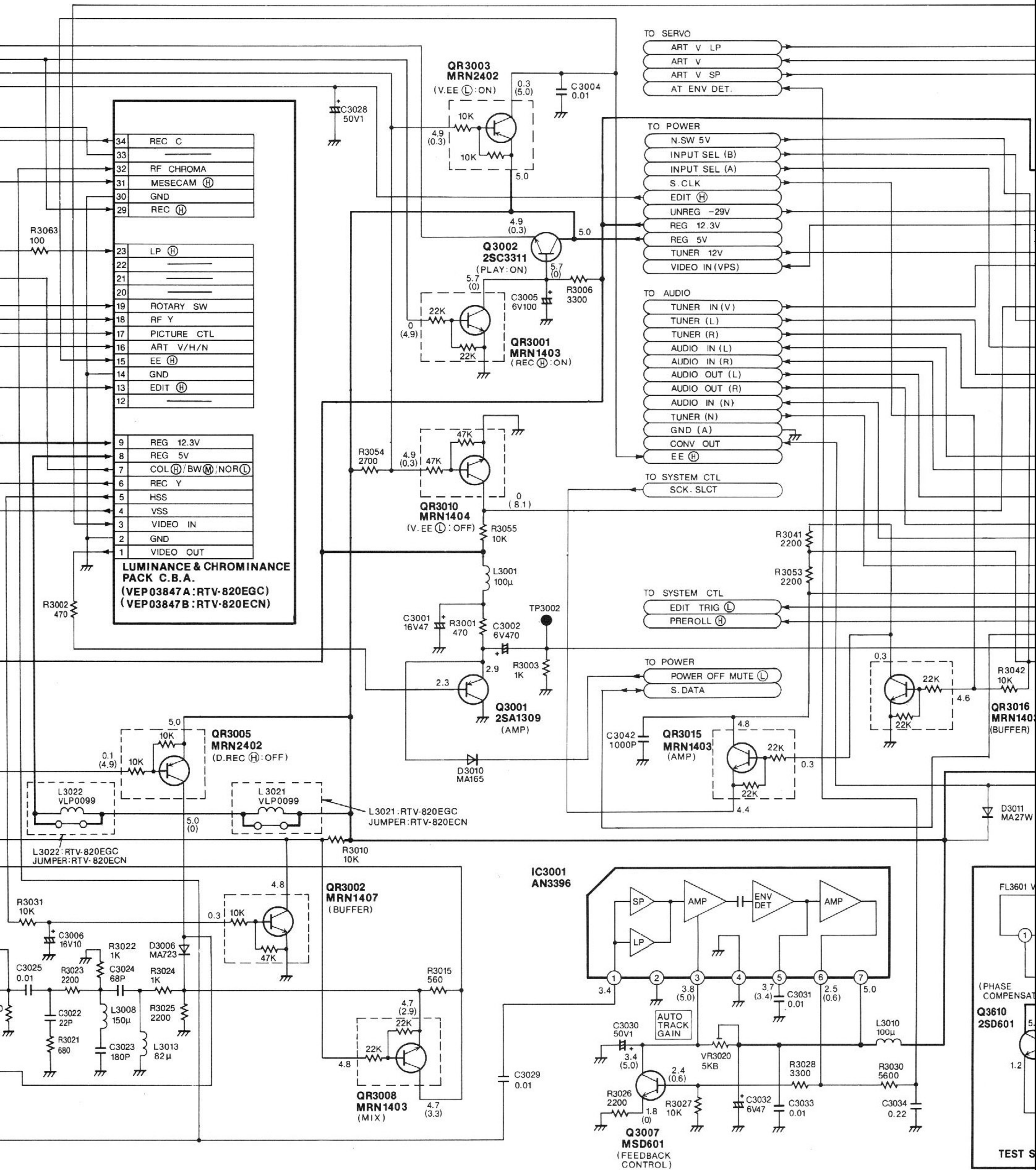
Servo Pack Schematic Diagram



Schaltbild des Luminanz- und Farbteiles auf der Hauptplatine Luminance and Chrominance Section Schematic Diagram on Main C.B.A.

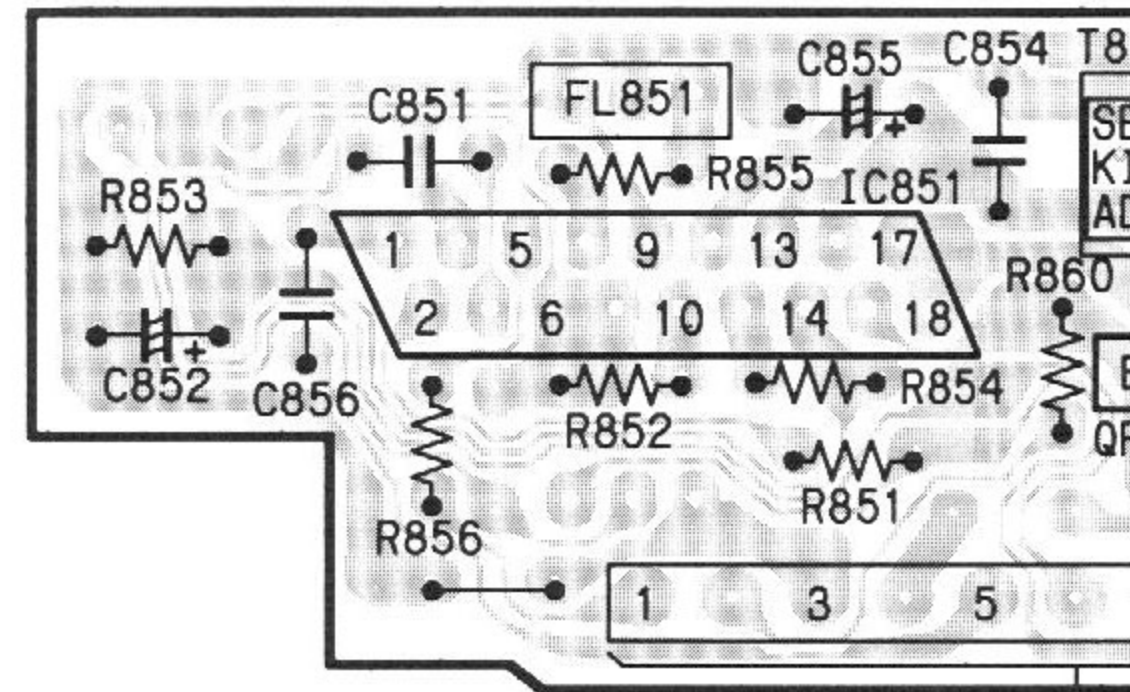


Gleichspannungen Tol ± 15% mit Digitalvoltmeter gegen Masse gemessen „Wiedergabe“, () = Aufnahme (SP).

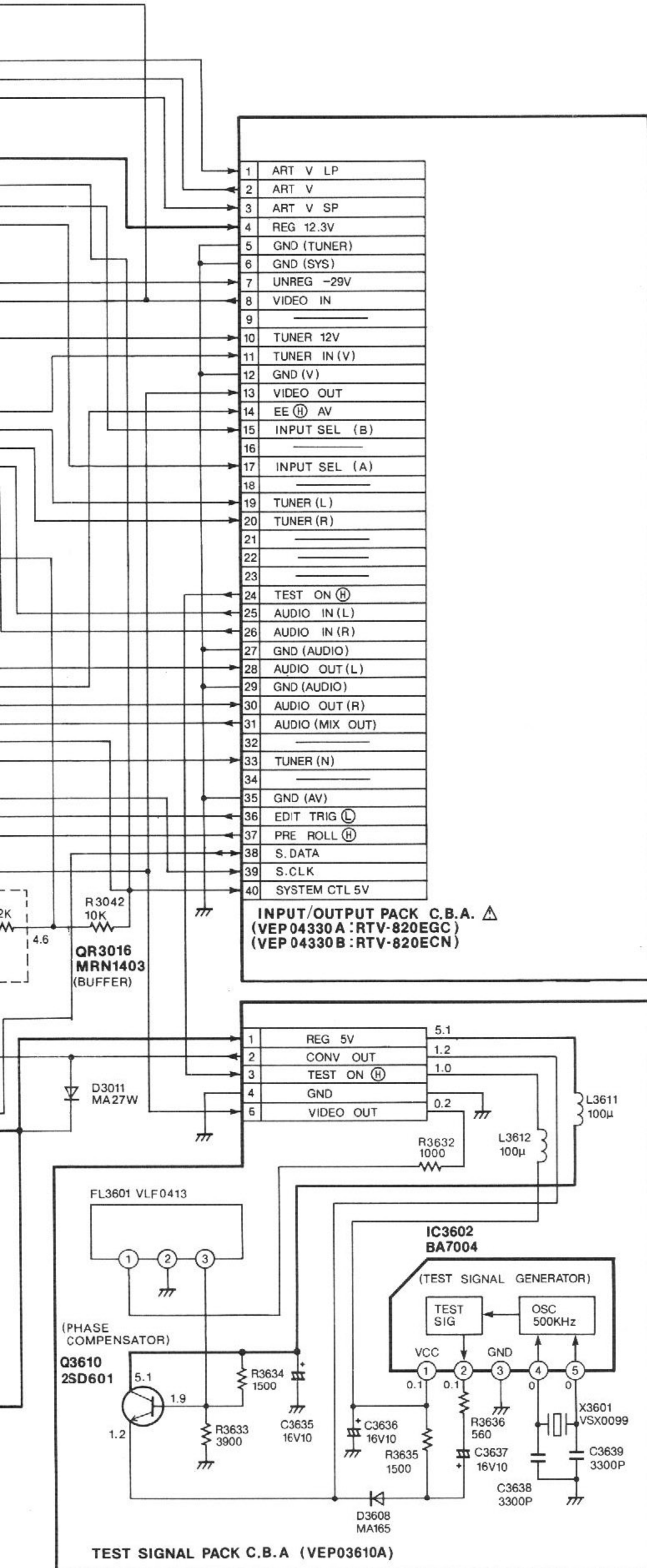
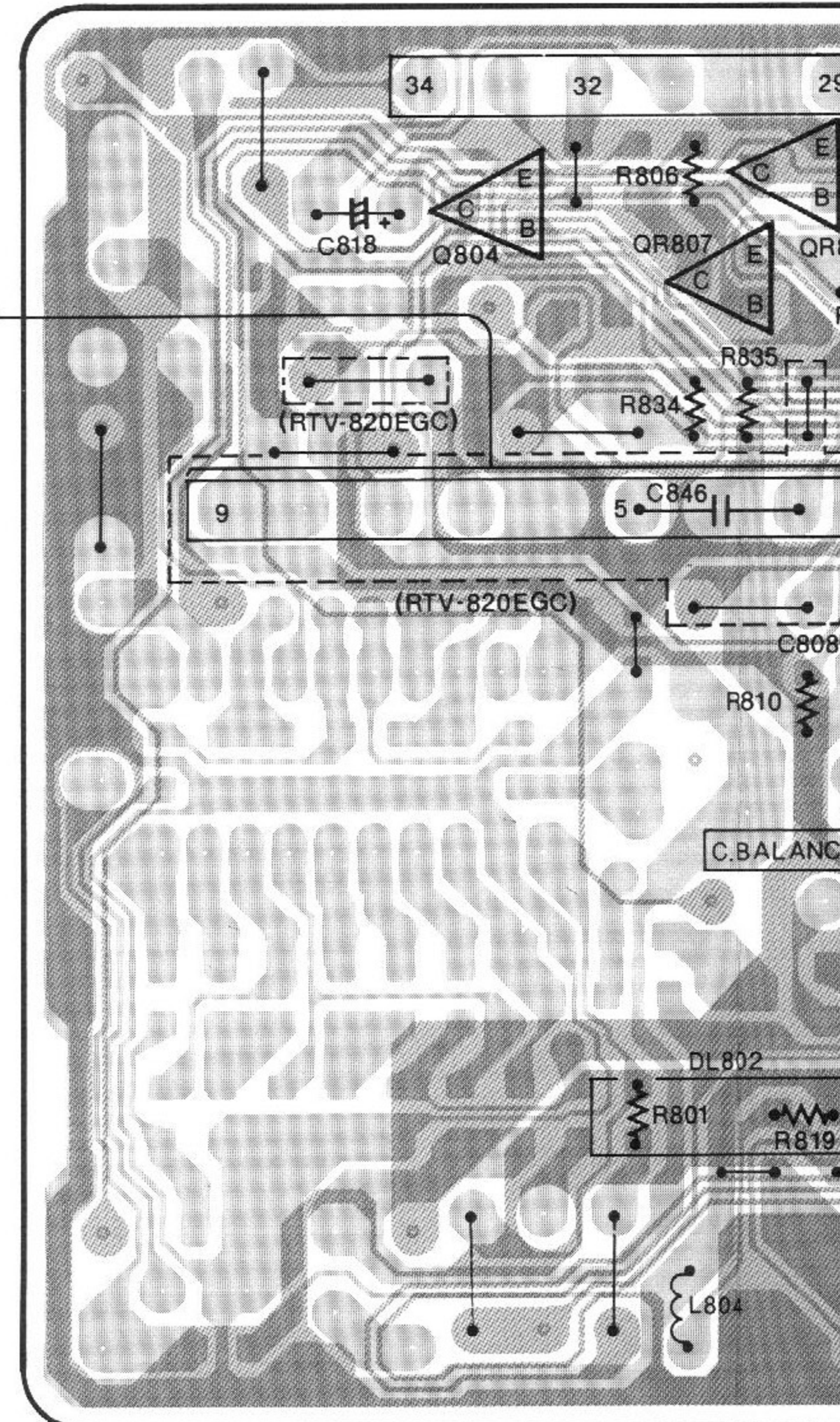


Platinen des Luminanz- und Farbteiles Luminance and Chrominance Pack C.B.A.'s

SECAM-Platine SECAM Pack C.B.A.

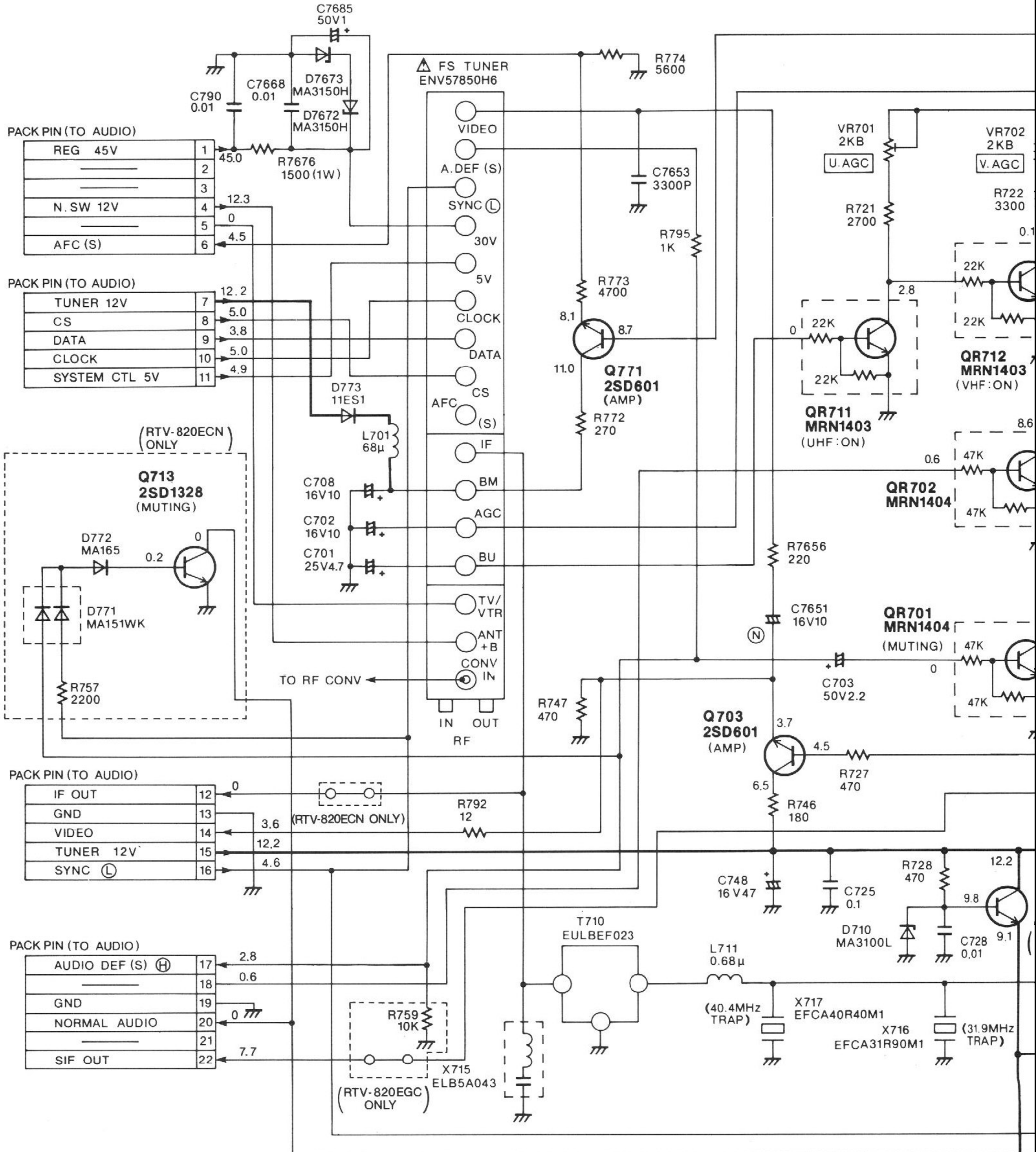


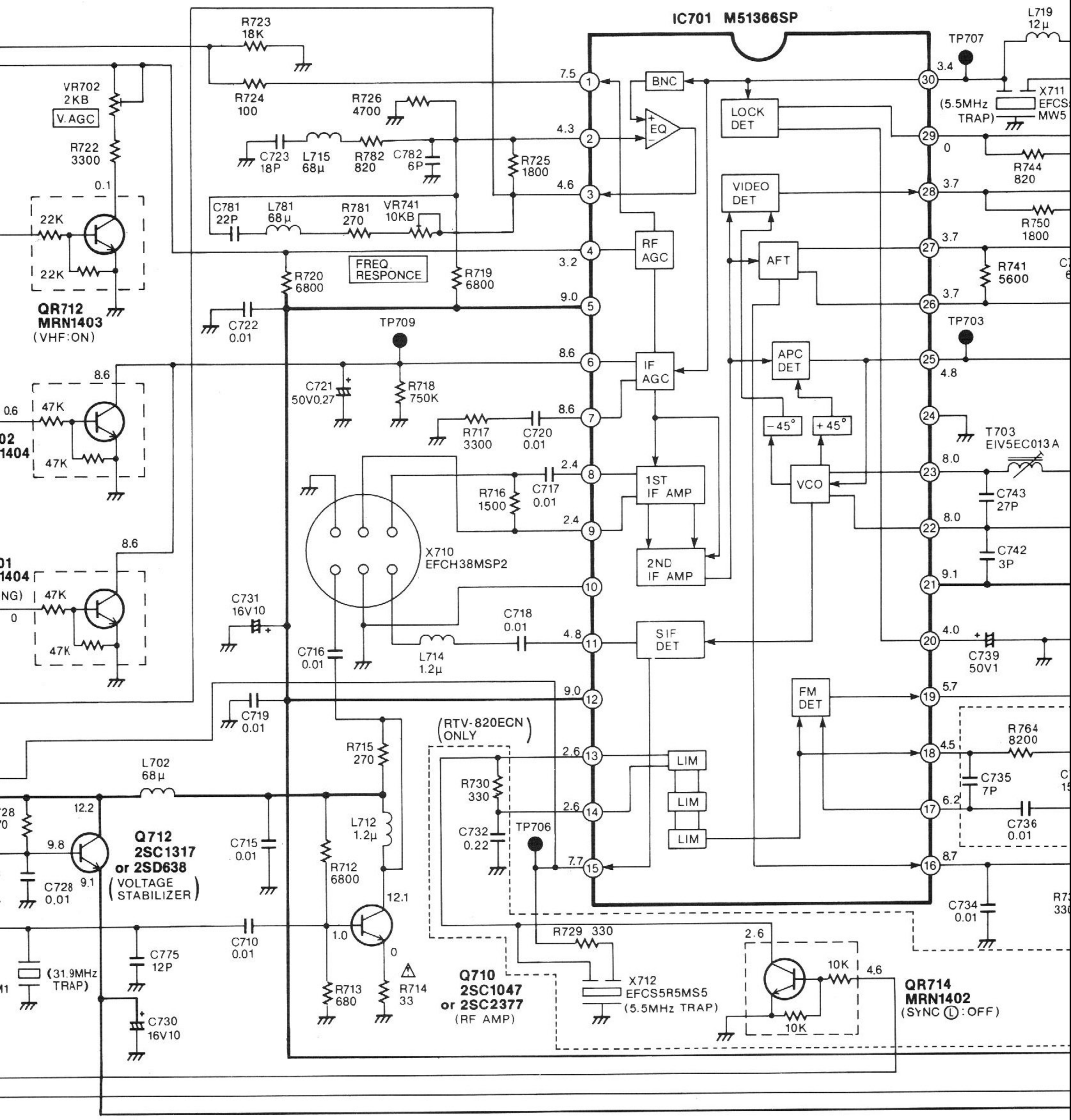
Luminanz- und Farbteil-Platine Luminance and Chrominance Pack C.B.A.

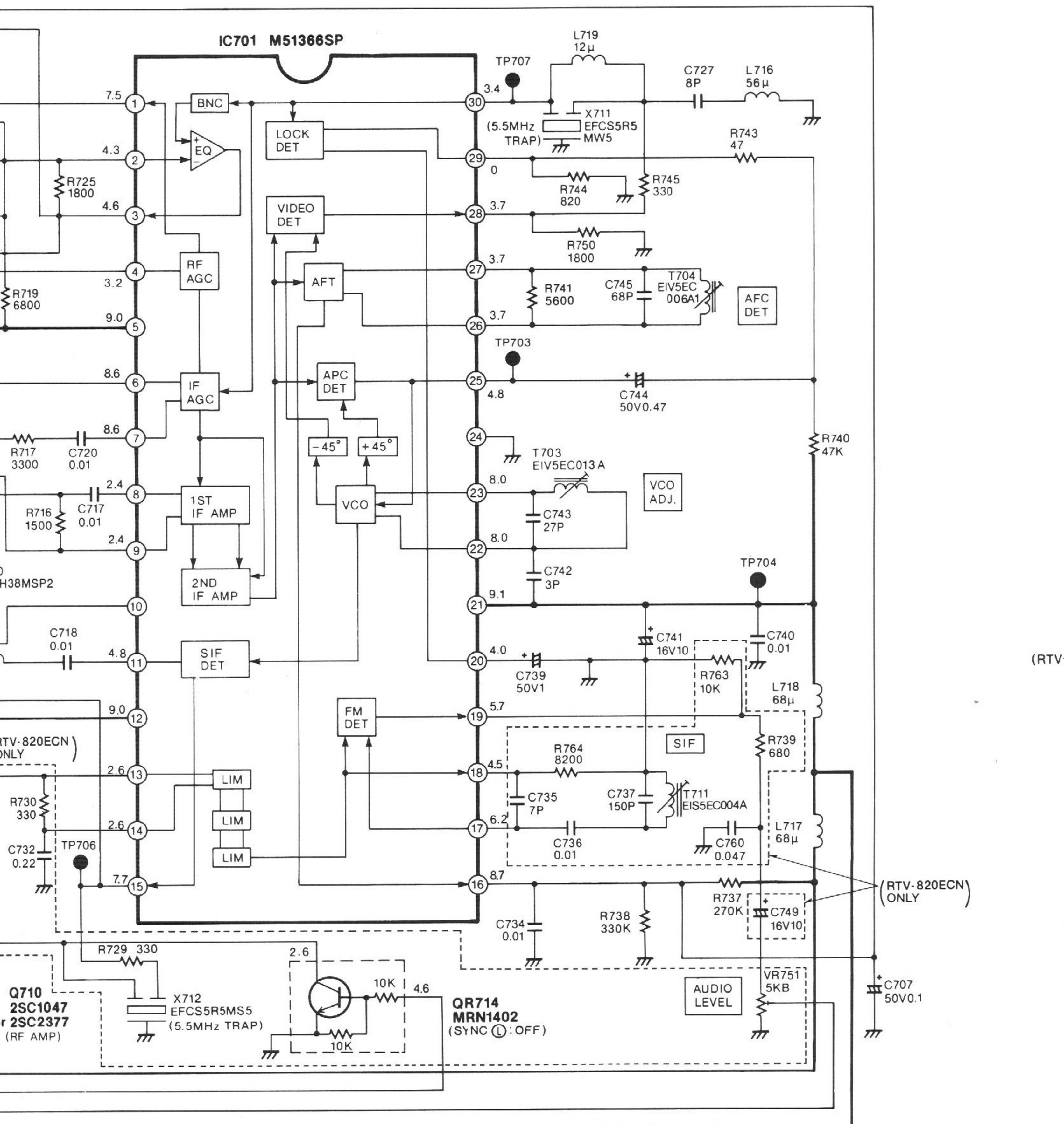


Schaltbild des TV-Demodulators

TV Demodulator Pack Schematic Diagram







(RTV

(RTV-820ECN) ONLY

(RTV-820ECN) ONLY

Q710 2SC1047 or 2SC2377 (RF AMP)

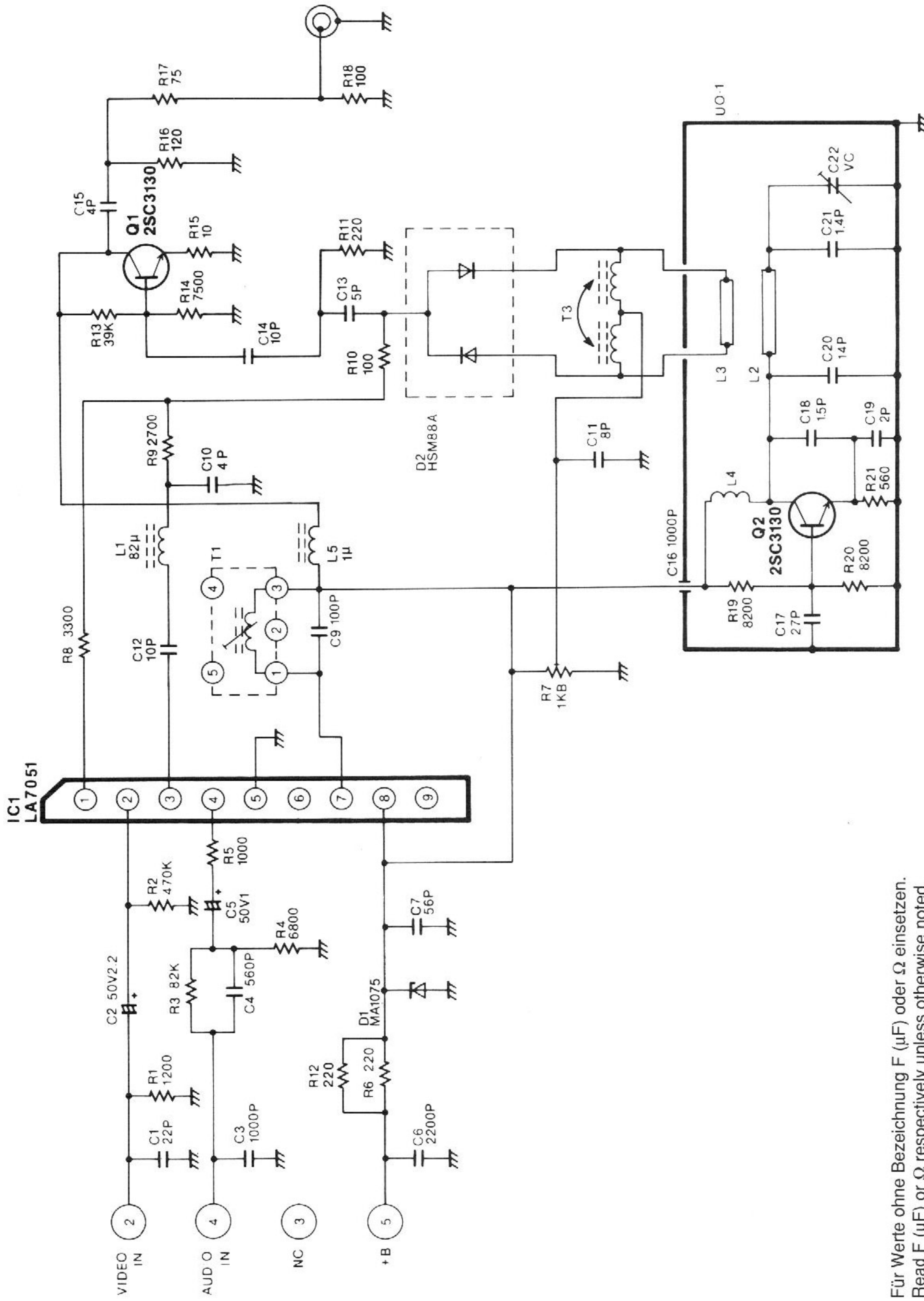
QR714 MRN1402 (SYNC (L): OFF)

AUDIO LEVEL

X712 EFC5R5MS5 (5.5MHz TRAP)

H38MSP2

Schaltbild des HF-Konverters RF Converter Schematic Diagram



Für Werte ohne Bezeichnung F (μ F) oder Ω einsetzen.
Read F (μ F) or Ω respectively unless otherwise noted.