

Service Manual

TV

CUC 1822

M 63-105 IDTV

M 63-105/9 IDTV

ST 63-160 IDTV

ST 72-160 IDTV

E 63-911 IDTV

SE 7288 IDTV

Atlanta 72 IDTV

ST 172 IDTV

CUC 1823

ST 63-781 IDTV

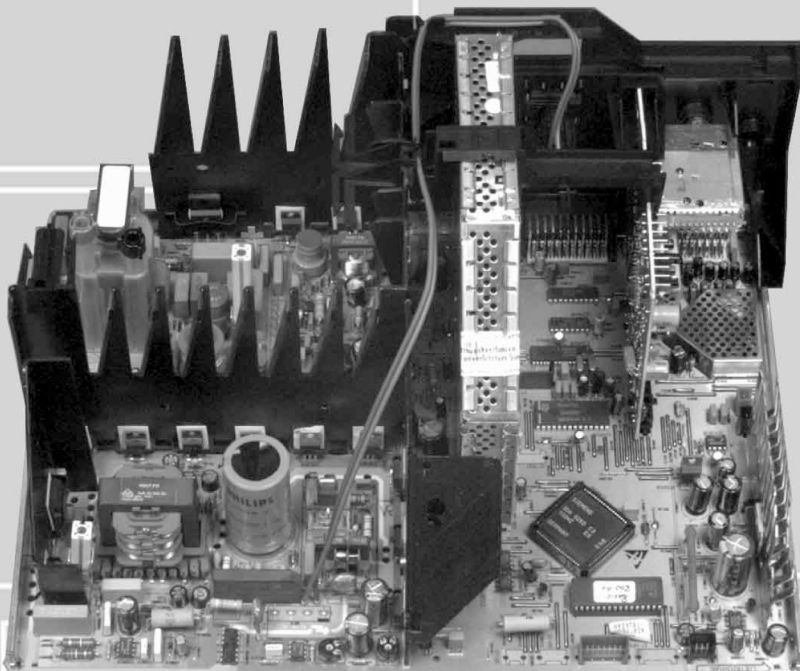
CUC 1852

M 72-105 IDTV

M 72-105/9 IDTV

M 72-105/9 IDTV/PIP

E 72-911 IDTV



Zusätzlich erforderliche
Unterlagen für den Komplettservice

Additionally required
Service Manuals for the Complete Service

Ergänzung
Supplement

2

Sach-Nr./Part No.
72010-019.32

**Service
Manual**

**CUC 1825
CUC 1826**

Sach-Nr./Part No.
72010-019.30

Ergänzung
Supplement

1

Sach-Nr./Part No.
72010-019.31

**Service
Manual**

**Sicherheit
Safety**

Sach-Nr./Part No.
72010-800.00

Btx * 32700 #

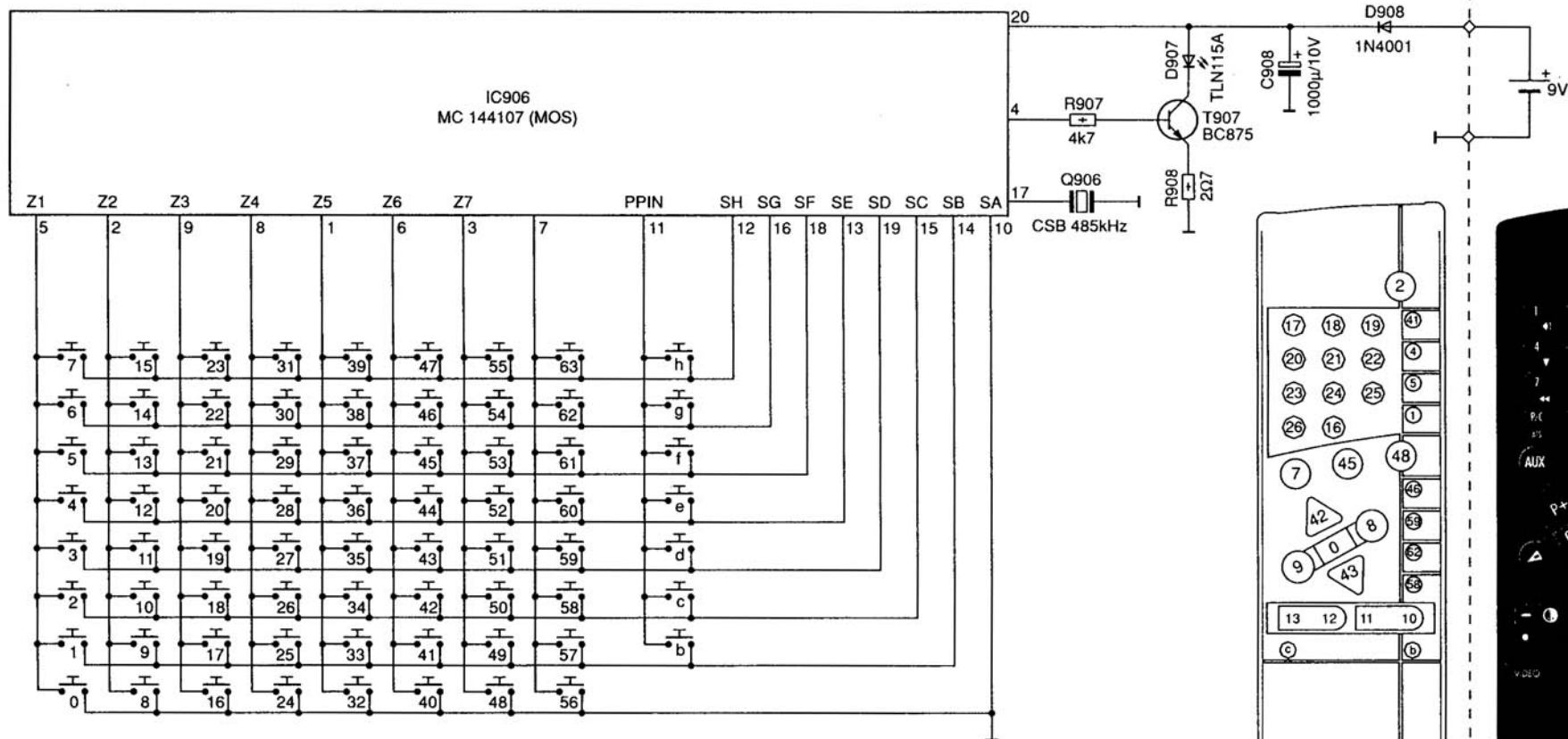
Sachnummer
Part Number 72010-019.32

Änderungen vorbehalten
Subject to alteration

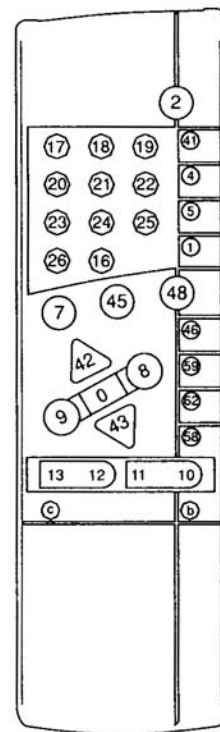
Printed in Germany
VK222 0497

FERNBEDIENUNG 29622 - 059.01
 REMOTE CONTROL
 TELE COMMANDE
 TELECOMANDO
 TELEMANDO

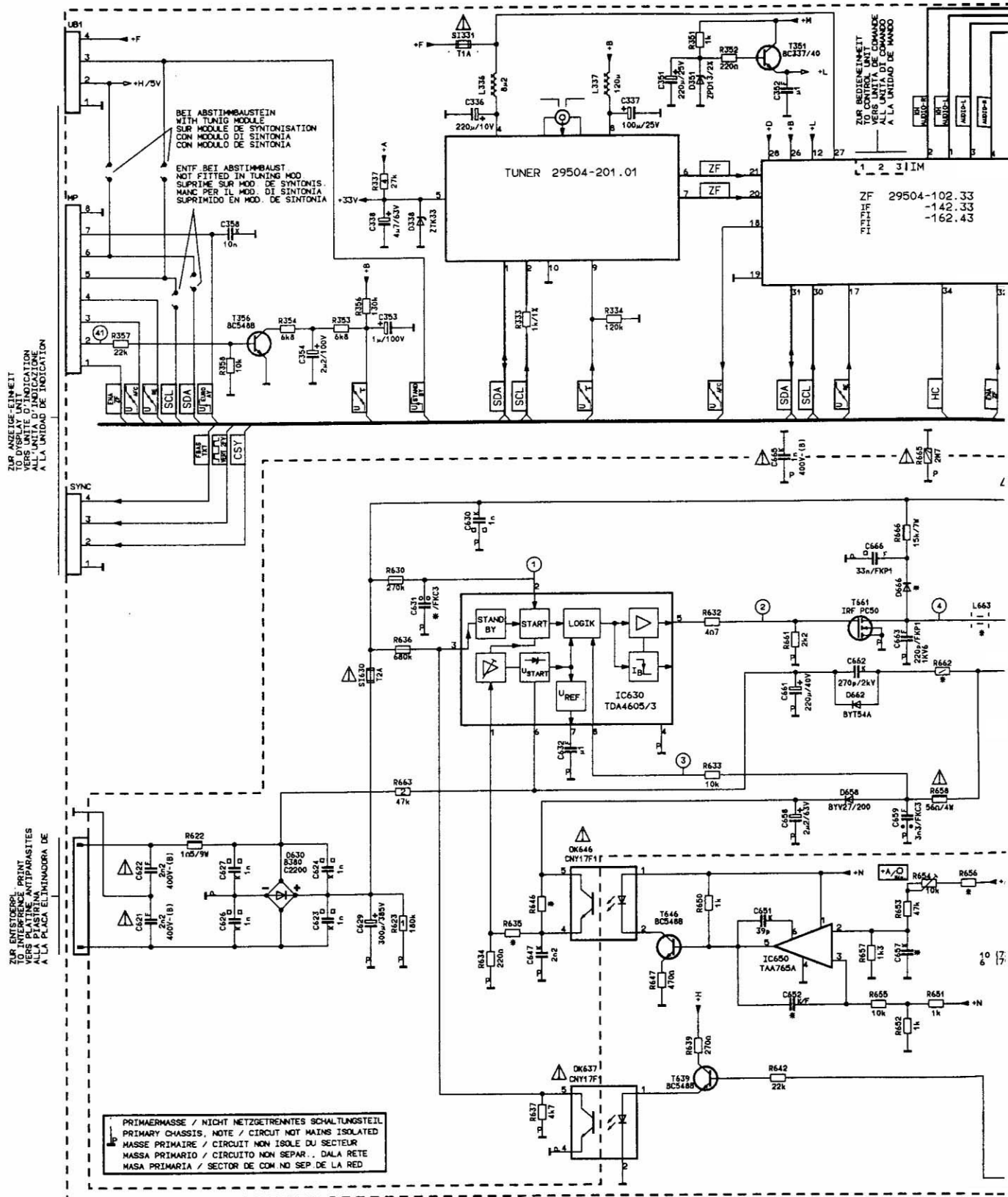
IC906
 MC 144107 (MOS)

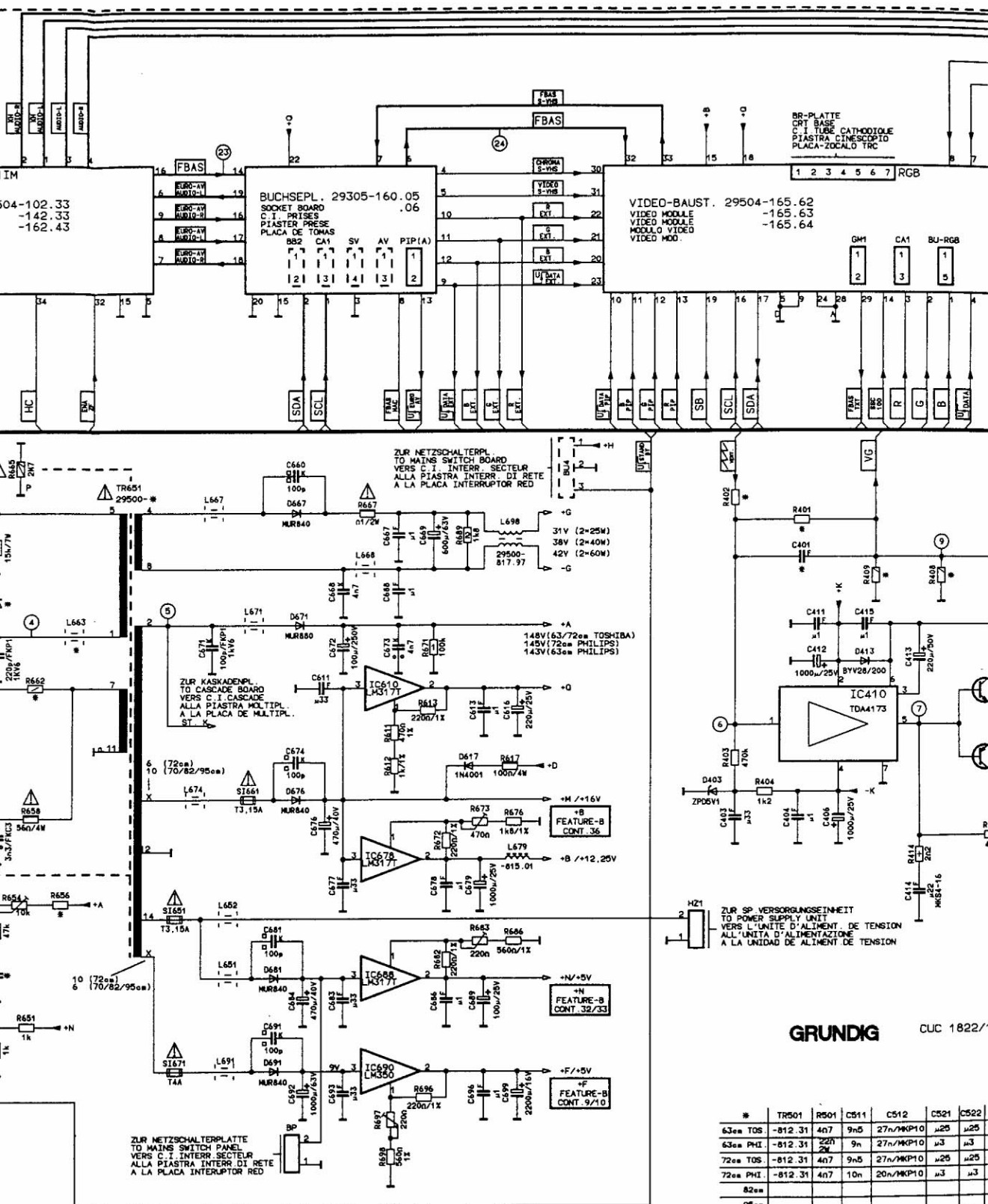


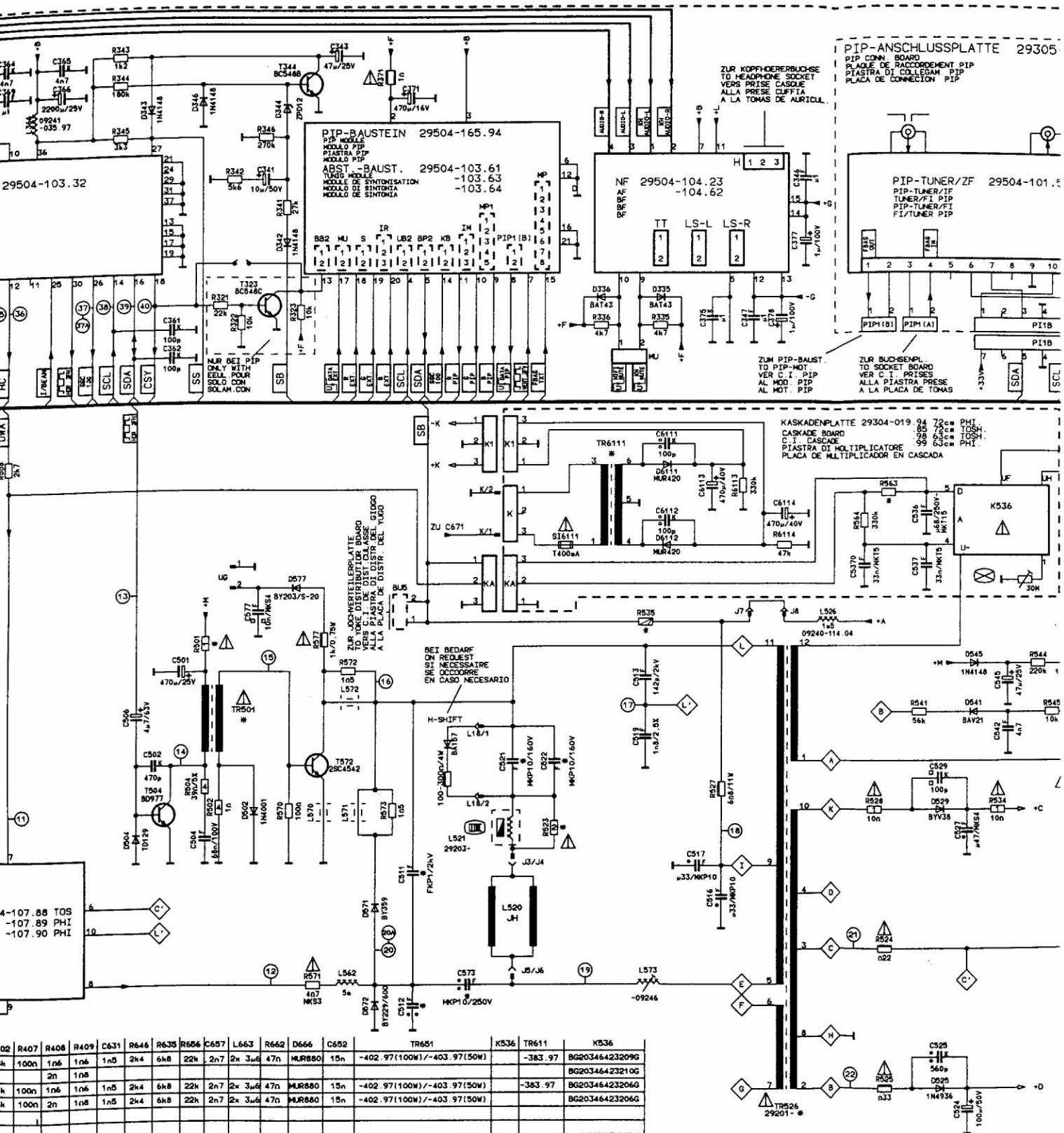
KEYBOARD 29304-779.01
 KEYBOARD
 CLAVIER
 KEYBOARD
 TECLADO

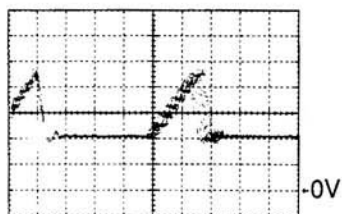


General Circuit Diagram

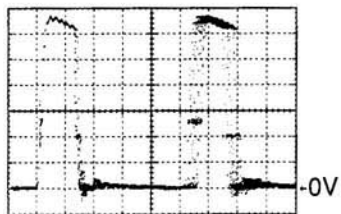




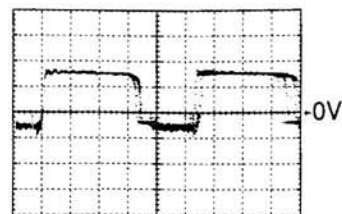




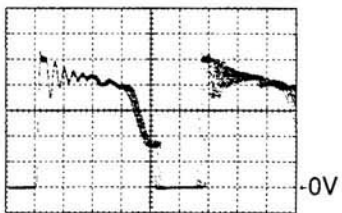
① 500mV/cm, 1μs/cm



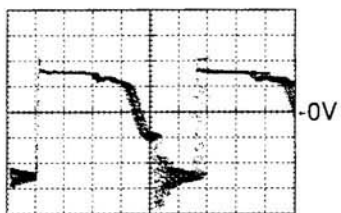
② 2V/cm, 1μs/cm



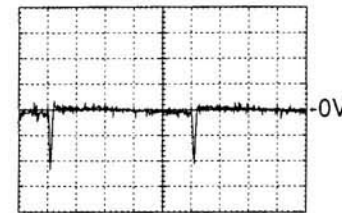
③ 500mV/cm, 1μs/cm



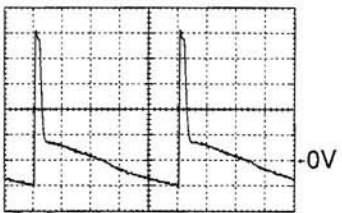
④ 100V/cm, 1μs/cm



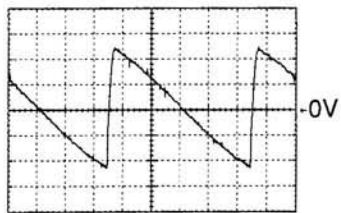
⑤ 100V/cm, 1μs/cm



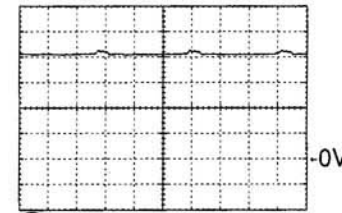
⑥ 100mV/cm, 2ms/cm



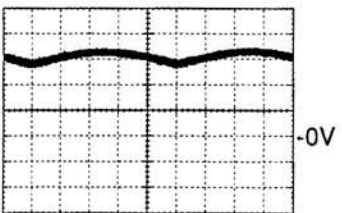
⑦ ⑧ 10V/cm, 2ms/cm



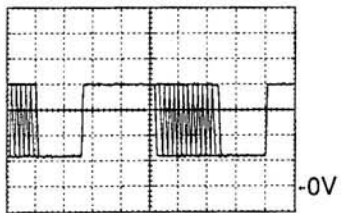
⑨ 500mV/cm, 2ms/cm



⑩ 1V/cm, 10μs/cm



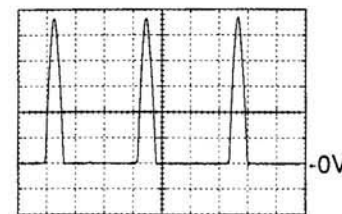
⑪ 1V/cm, 2ms/cm



⑫ 10V/cm, 5μs/cm

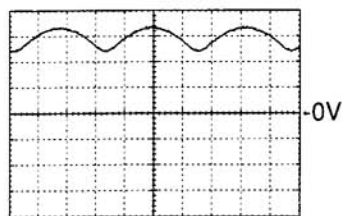


⑬ 1V/cm, 10μs/cm

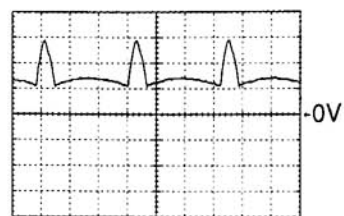




⑪ 20V/cm, 10 μ s/cm



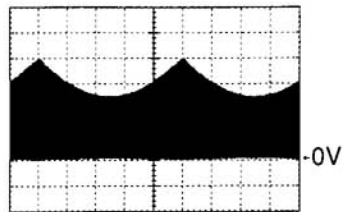
⑫ 50V/cm, 10 μ s/cm



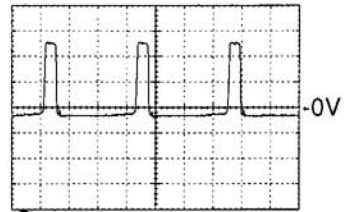
⑬ 10QV/cm, 10 μ s/cm



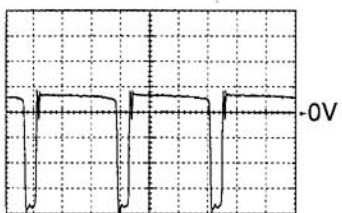
⑭ 50V/cm, 10 μ s/cm



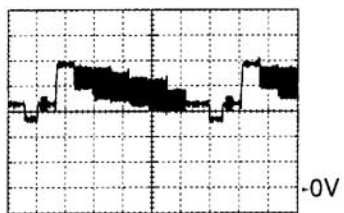
⑭A 50V/cm, 2ms/cm



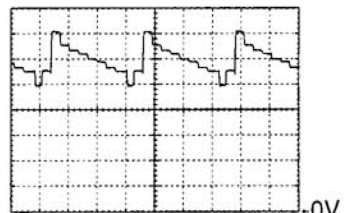
⑮ 50V/cm, 10 μ s/cm



⑯ 50V/cm, 10 μ s/cm



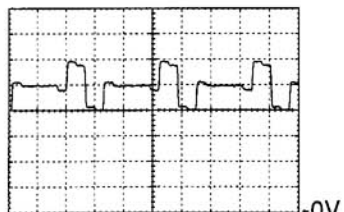
⑰⑱ 500mV/cm, 10 μ s/cm



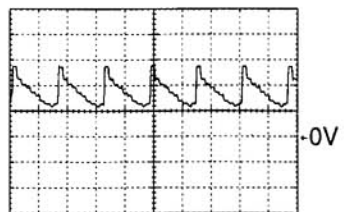
⑲ 1V/cm, 20 μ s/cm



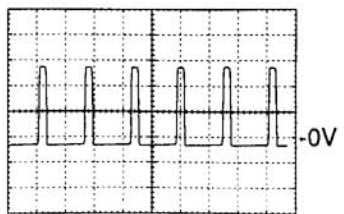
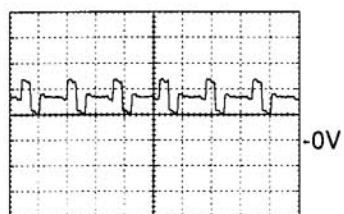
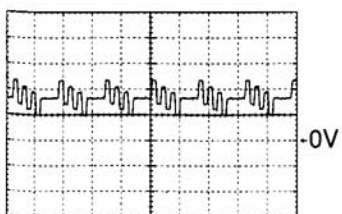
⑳ 1V/cm, 20 μ s/cm

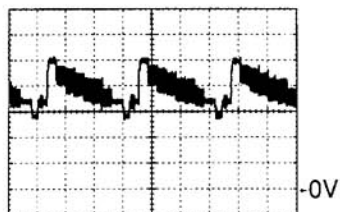


㉑ 1V/cm, 20 μ s/cm

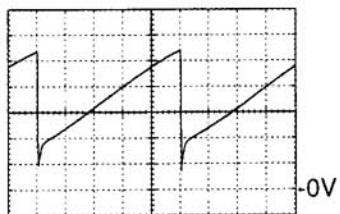


㉒ 1V/cm, 20 μ s/cm

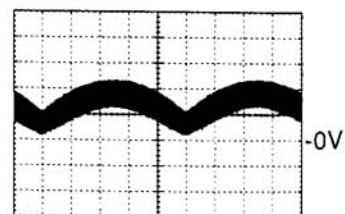




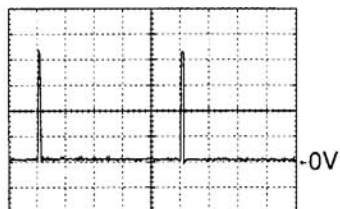
③② 500mV/cm, 20 μ s/cm



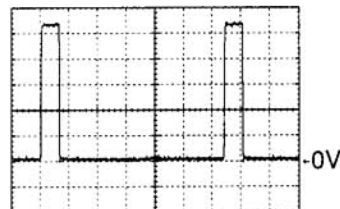
③③ 200mV/cm, 2ms/cm



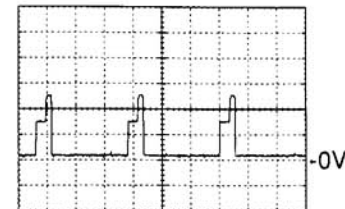
③④ 1V/cm, 2ms/cm



③⑤ 1V/cm, 2ms/cm



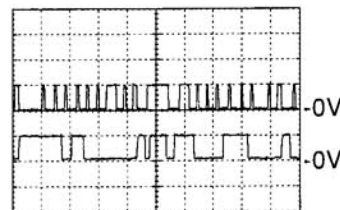
③⑥ 2V/cm, 10 μ s/cm



③⑦ 2V/cm, 10 μ s/cm



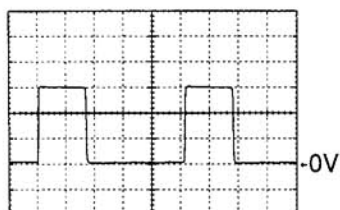
③⑦A 2V/cm, 2ms/cm



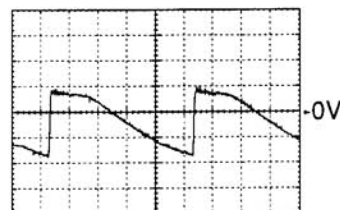
③⑧③⑨ 5V/cm, 100 μ s/cm



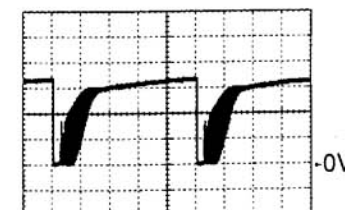
④⑩ 1V/cm, 10 μ s/cm



④① 200mV/cm, 50 μ s/cm



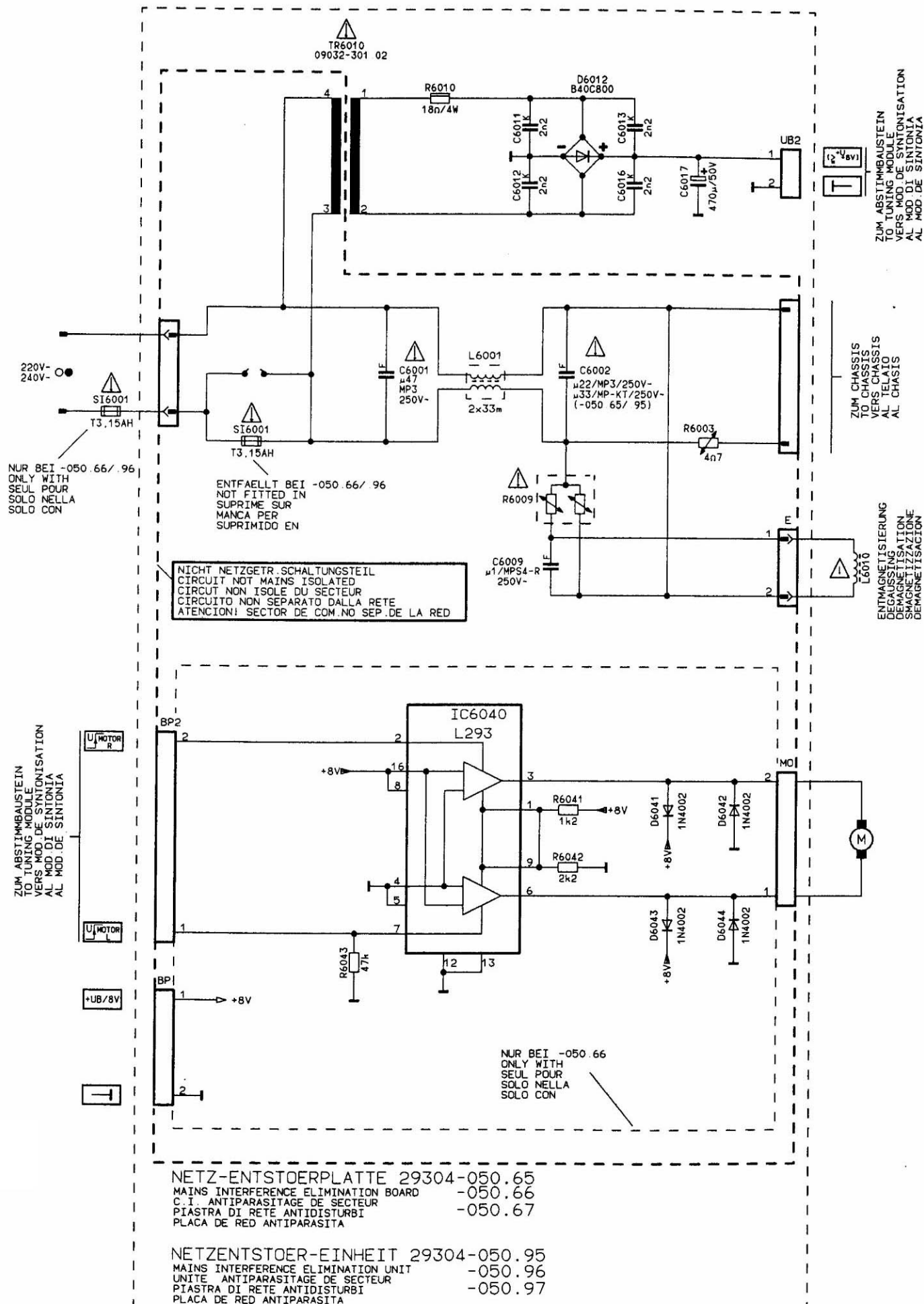
⑤⑩ 1V/cm, 2ms/cm



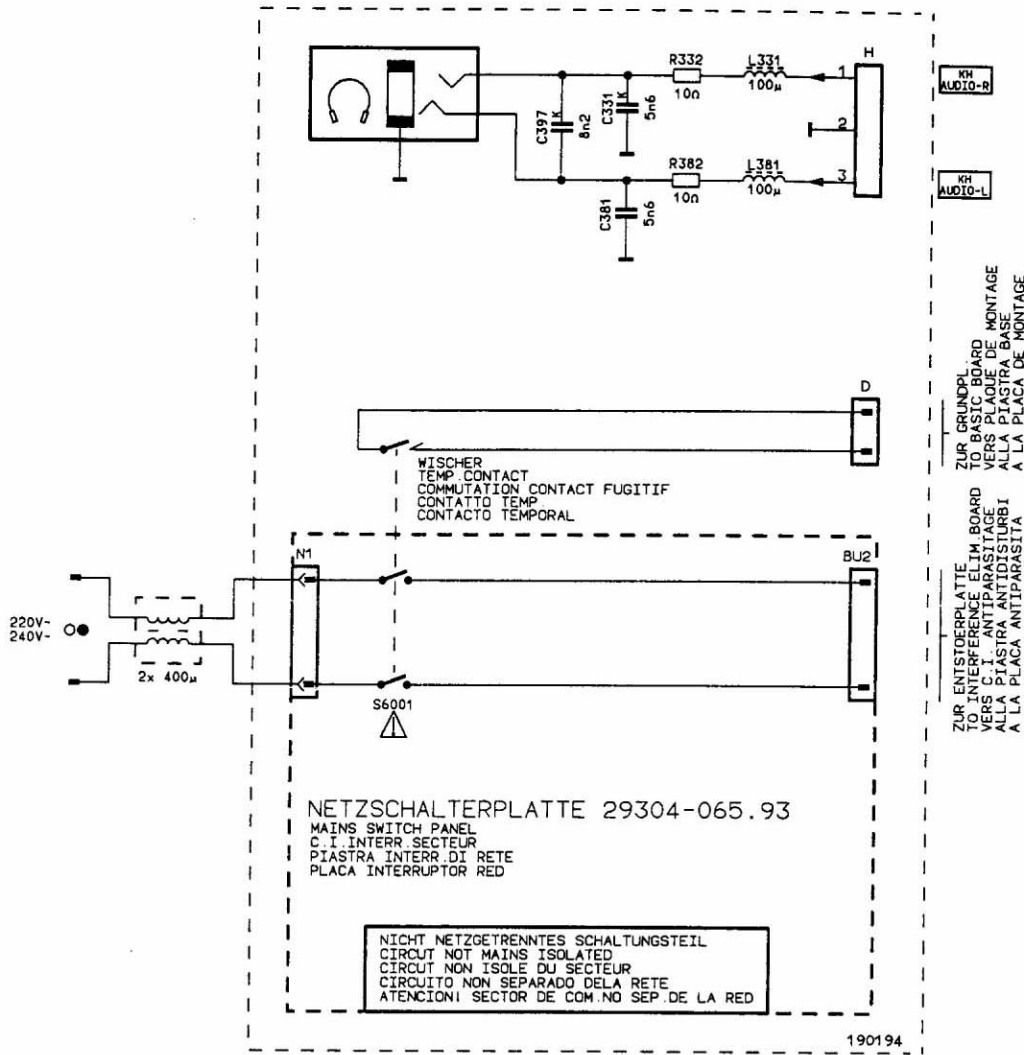
⑤① 20V/cm, 2ms/cm



Entstörplatte / Interference Elimination Board



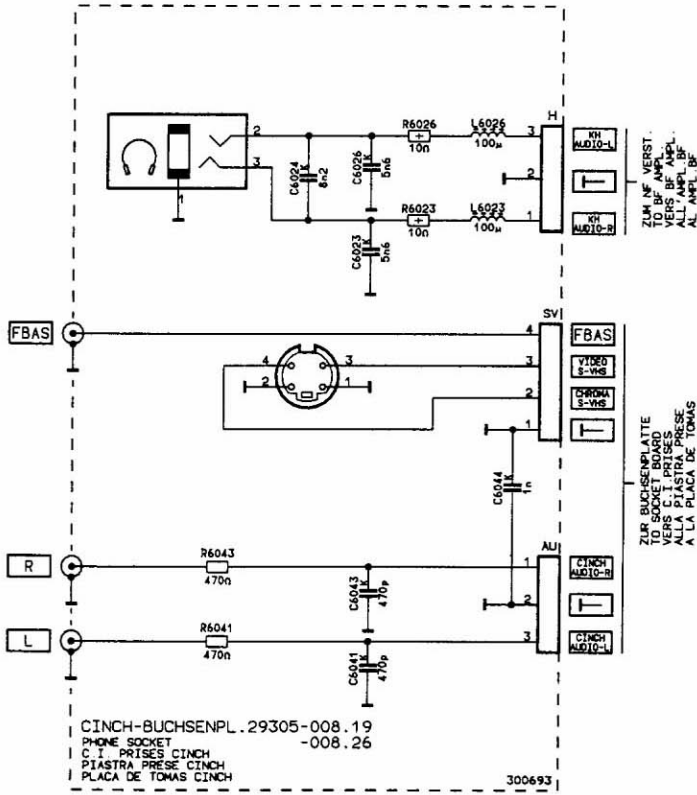
Netzschalterplatte / Main Switch Panel



ZUR GRUNDPL.
TO BASIC BOARD
VERS C.I. ANTIPARASITAGE
ALLA PIASTRA BASE
A LA PLACA DE MONTAGE

ZUR ENTSTÖRPLATTE
TO INTERFERENCE ELIM. BOARD
VERS C.I. ANTIPARASITAGE
ALLA PIASTRA ANTIDISTURBI
A LA PLACA ANTIPARASITA

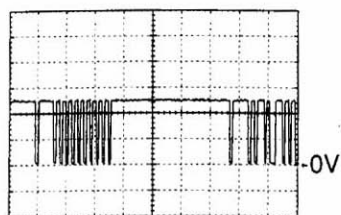
Cinch-Buchsenplatte
Phone Socket



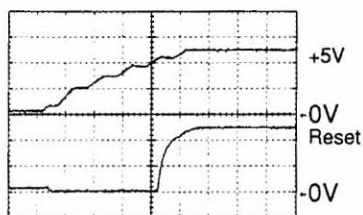
ZUR VERST.
TO BASIC BOARD
VERS C.I. ANTIPARASITAGE
ALLA PIASTRA BASE
A LA PLACA DE MONTAGE

ZUR ENTSTÖRPLATTE
TO INTERFERENCE ELIM. BOARD
VERS C.I. ANTIPARASITAGE
ALLA PIASTRA ANTIDISTURBI
A LA PLACA ANTIPARASITA

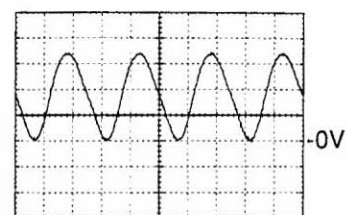
Abstimmbaustein / Tuning Module



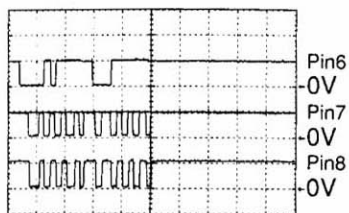
① 2V/cm, 5ms/cm
IR-Signal



② 2V/cm, 10ms/cm



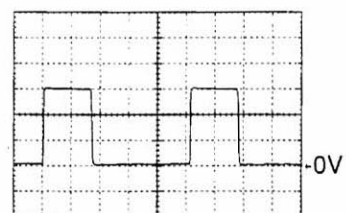
③ 1V/cm, 100ns/cm



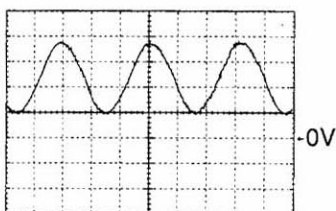
④ Pin6,7 5V/cm, 20μs/cm
Pin8 500mV/cm, 20μs/cm
IR-Signal



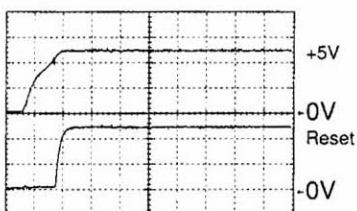
⑤ Pin1,2 5V/cm, 200μs/cm
Pin3 500mV/cm, 200μs/cm
nur bei Prog.-Wechsel
only on prog. change



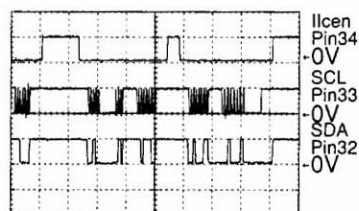
⑥ 200mV/cm, 50μs/cm



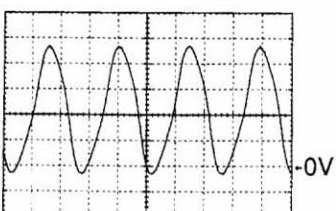
⑦ 1V/cm, 20ns/cm



⑧ 2V/cm, 20ms/cm



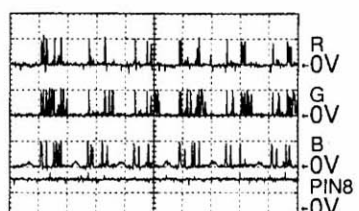
⑨ Pin32 500mV/cm, 50μs/cm
Pin33,34 5V/cm, 50μs/cm



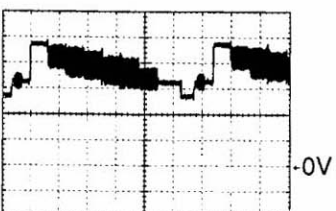
⑩ 1V/cm, 20ns/cm



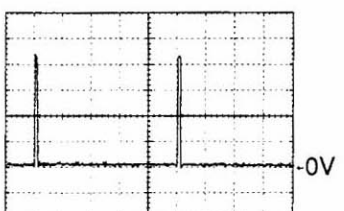
⑪ RGB 500mV/cm, 20μs/cm
Pin8 100mV/cm, 20μs/cm
mit Uhr / with clock



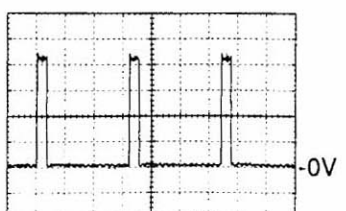
⑪A RGB 500mV/cm, 20μs/cm
Pin8 100mV/cm, 20μs/cm
VT



⑫ 500mV/cm, 10μs/cm



⑬ 1V/cm, 2ms/cm



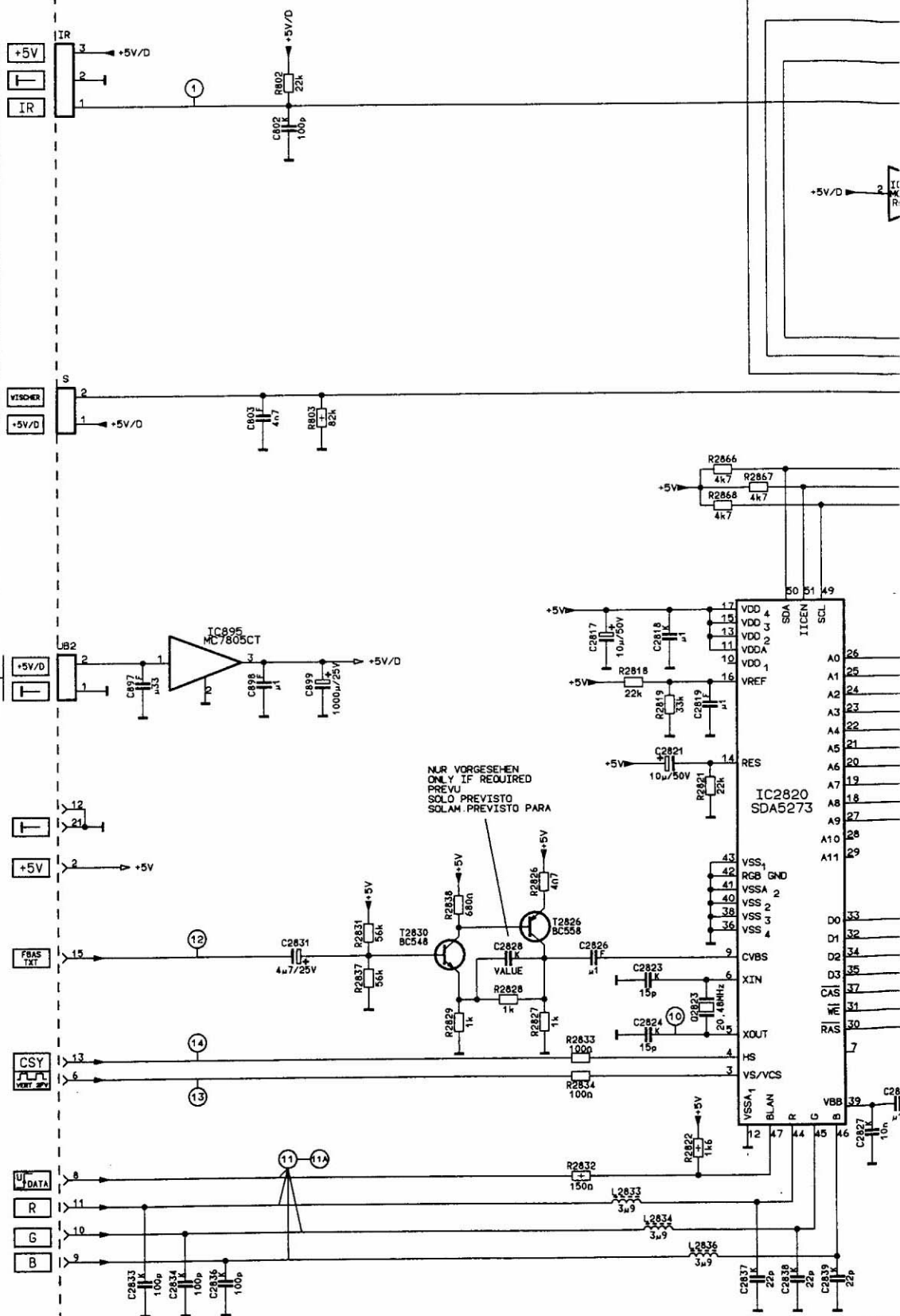
⑭ 1V/cm, 10μs/cm

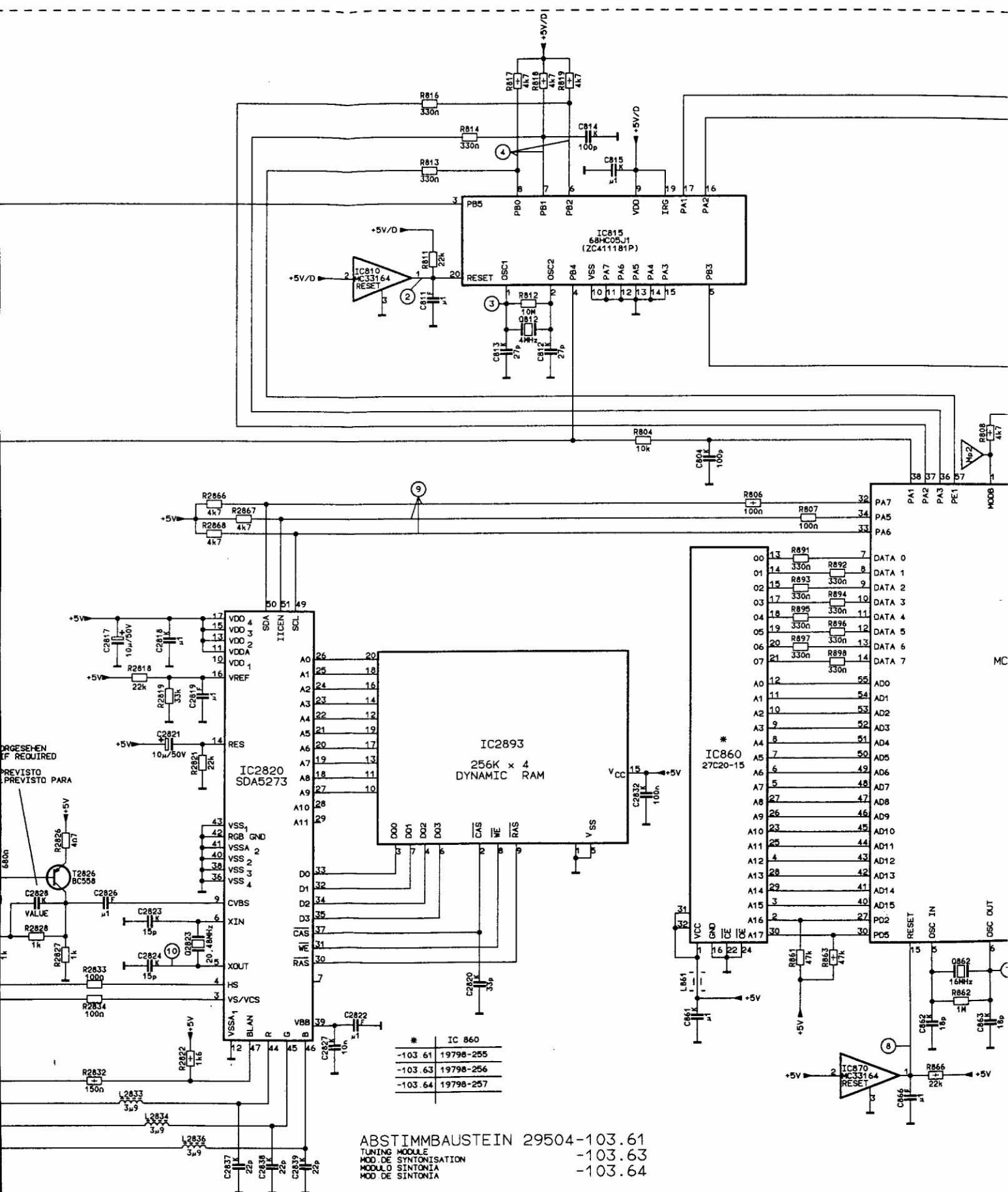
Tuning Module

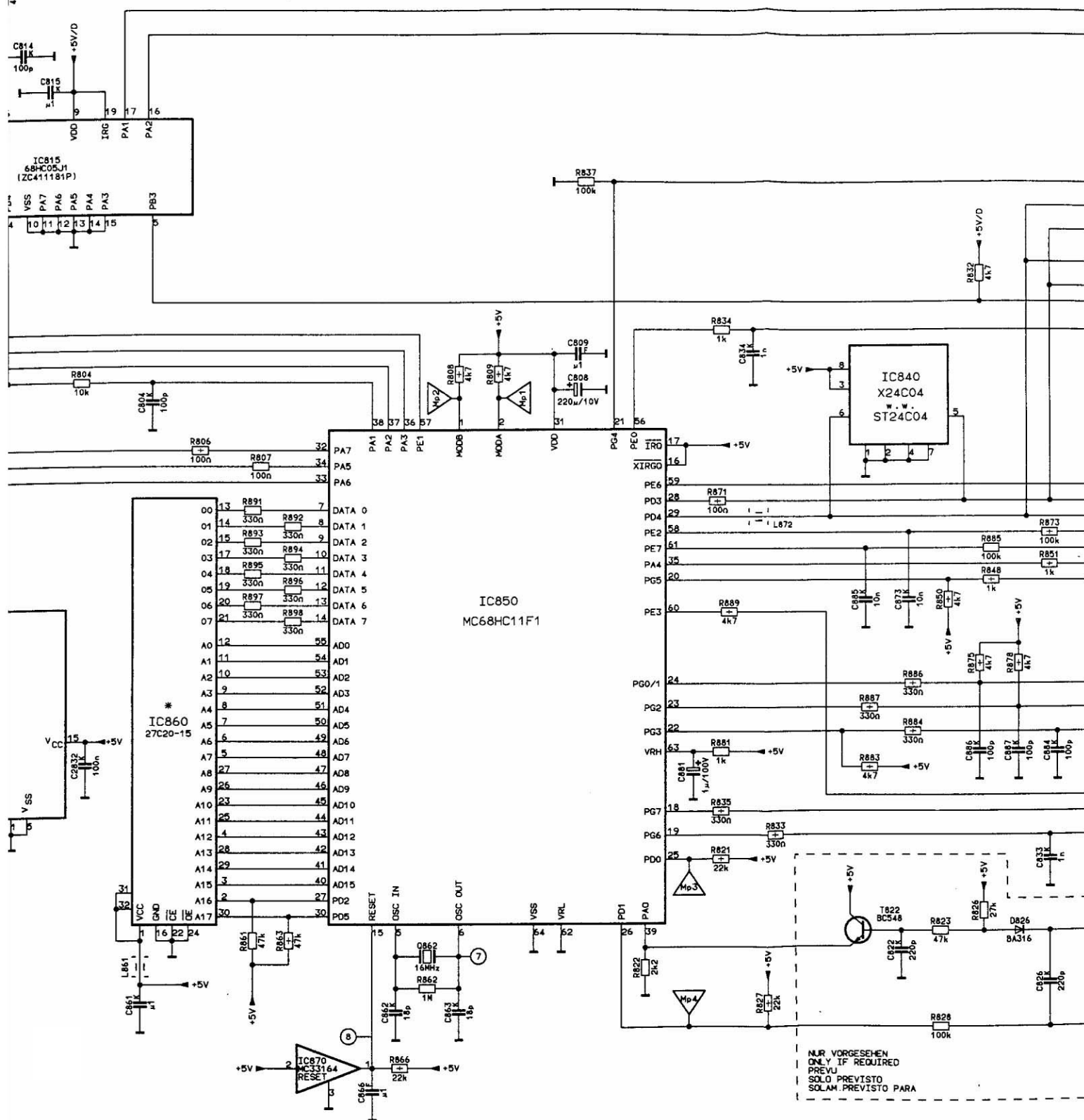
Servicearbeiten nach Bausteinwechsel: siehe Abgleich Seite 3-1/3/2 (1.1...1.10)
Servicing work after replacing the module: see alignment page 3-4/3/5 (1.1...1.10)

ZUR NETZSCHALTERPLATTE
TO MAINS SWITCH PANEL
VIA LA PIASTRA INTERRUPTORI
ALLA PIASTRA INTERRUPTORI
A LA PLACA INTERRUPTOR RED

ZUR NETZSCHALTERPLATTE/ENTSTÖßPL.
TO MAINS SWITCH PANEL/INTERFER ELIM. BOARD
C.I. INTERRUPTORI/ANTIPARASITAGE
ALLA PIASTRA INTERRUPTORI
A LA PLACA INTERRUPTOR RED/PLACA ANTIPARASIT

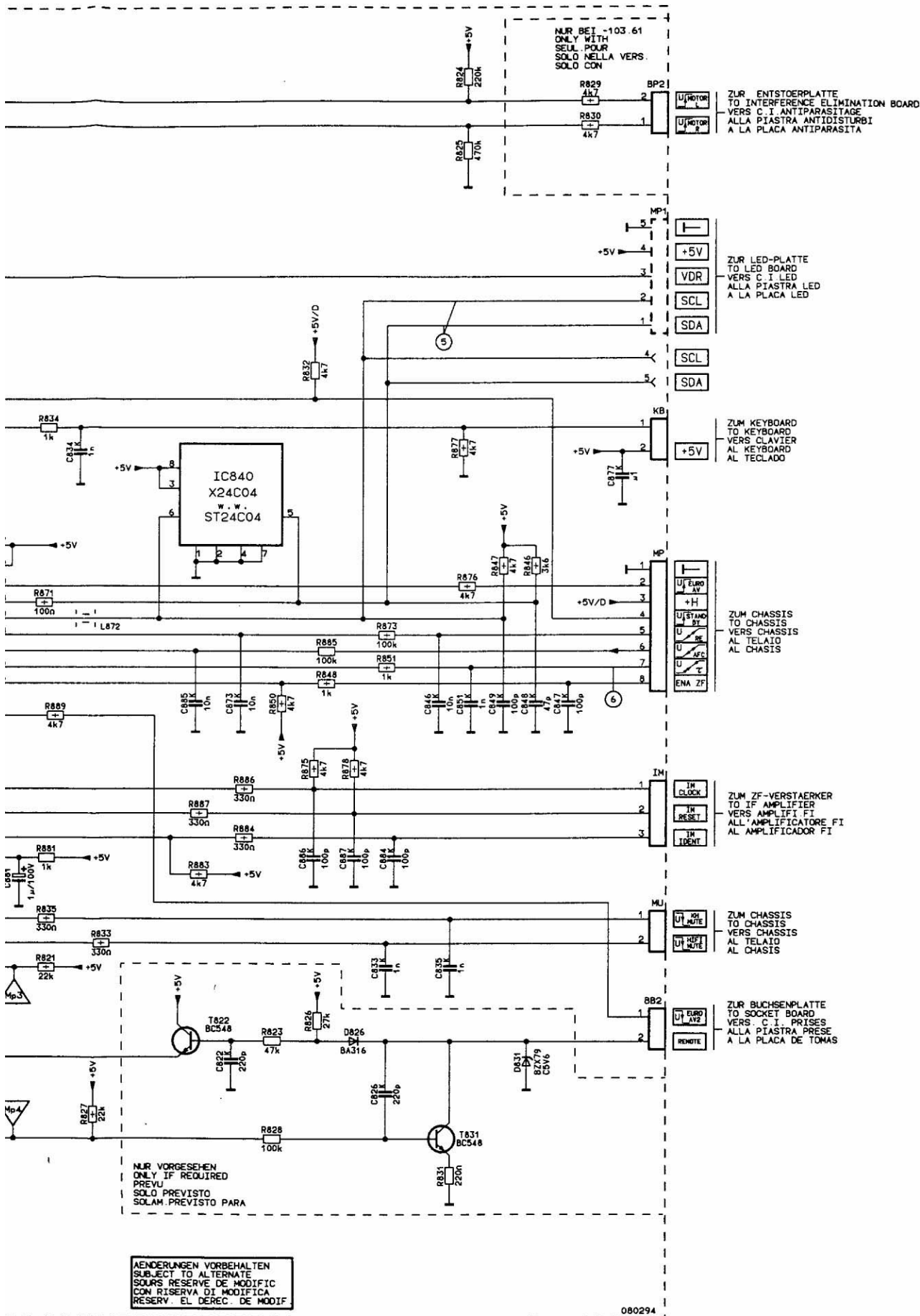


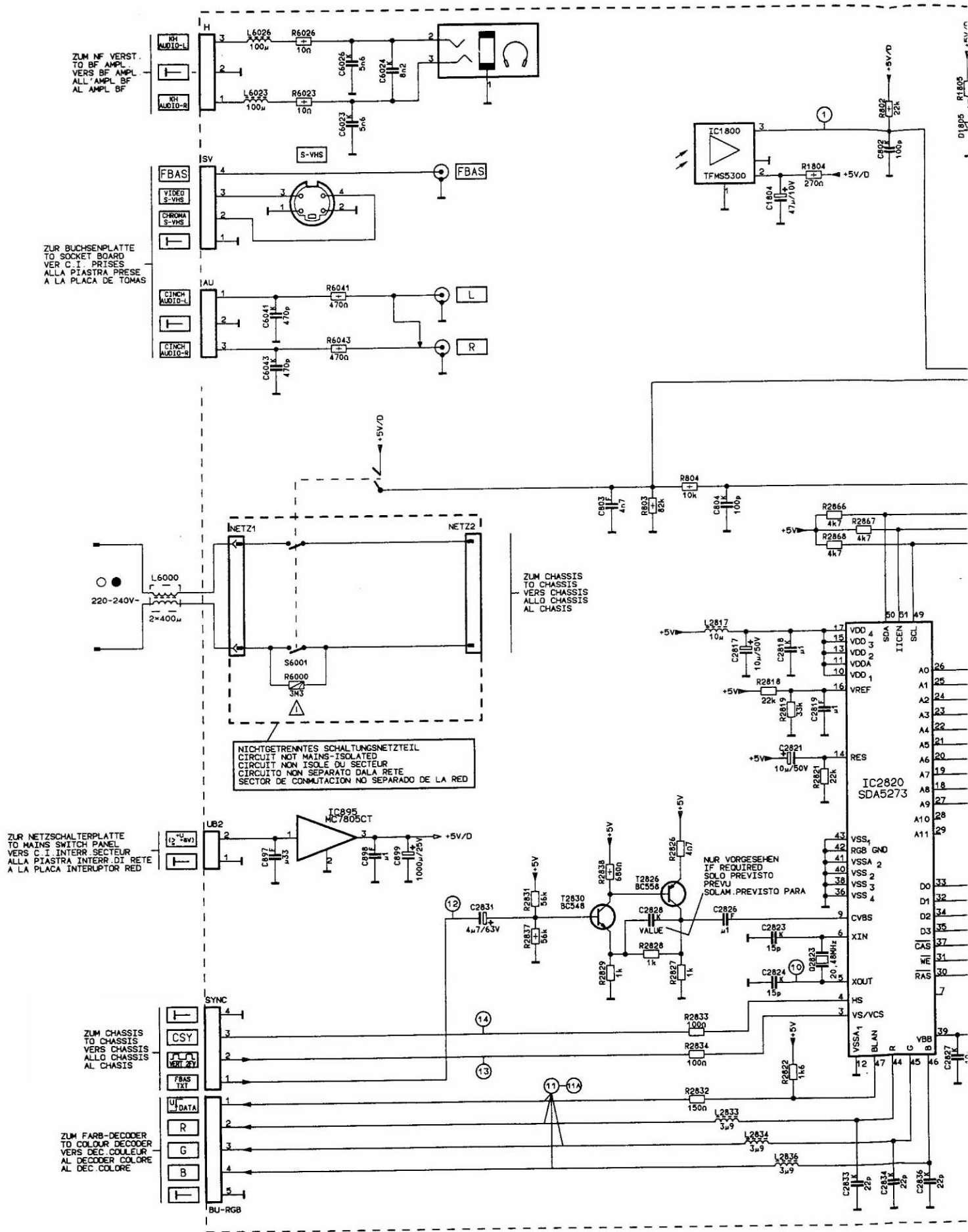


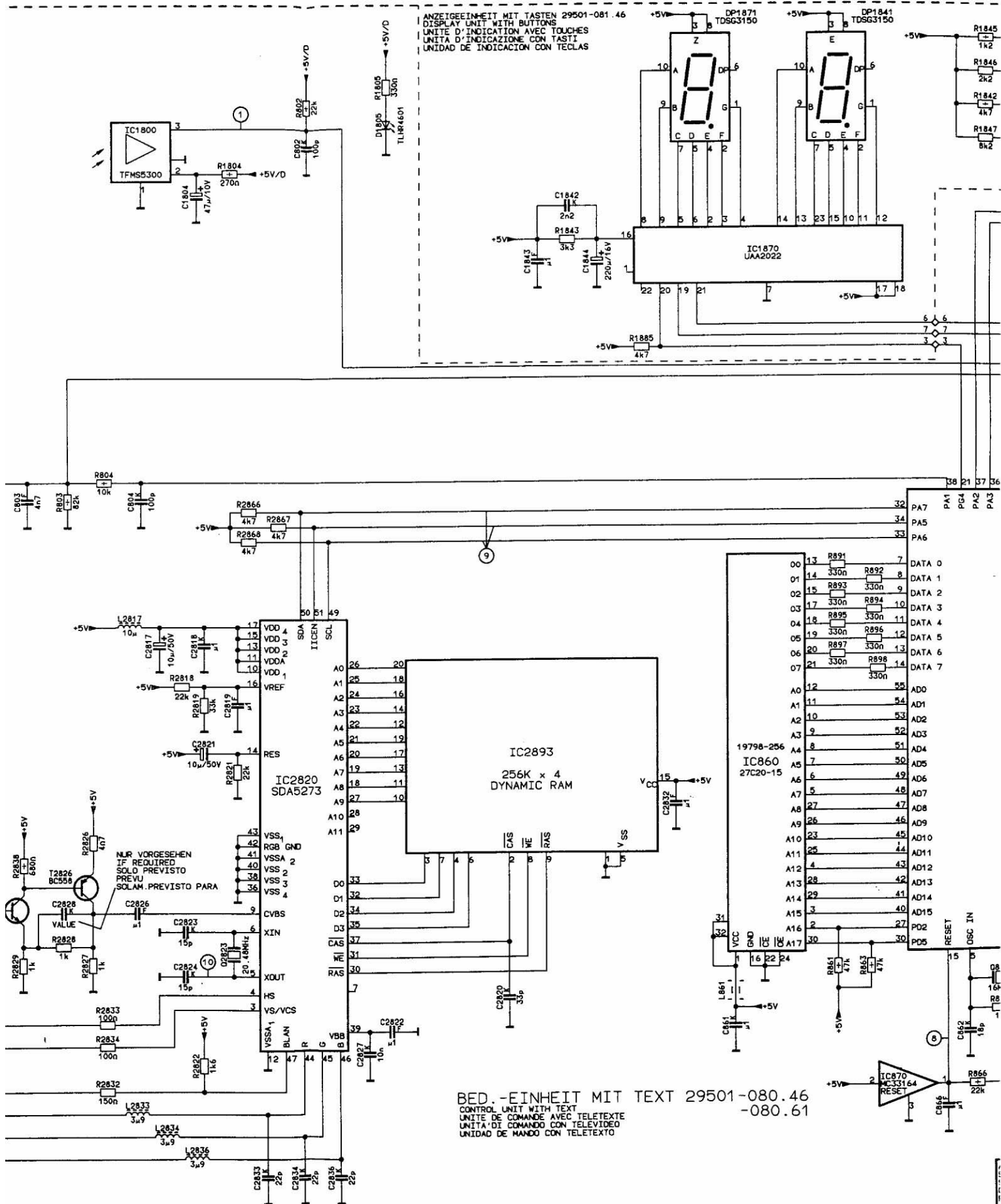


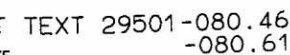
NUR VORGESEHEN
ONLY IF REQUIRED
PREVU
SEULS RESERVE DE MODIFIC
CON RISERVA DI MODIFICA
RESERV. EL DEREC. DE MODIF

ÄNDERUNGEN VORBEHALTEN
SUBJECT TO ALTERNATE
PREVU
SEULS RESERVE DE MODIFIC
CON RISERVA DI MODIFICA
RESERV. EL DEREC. DE MODIF









AENDERUNGEN VORBEHALTEN
SUBJECT TO ALTERNATE
SOURS RESERVE DE MODIFIC
CON RISERVA DI MODIFICA
RESERV.EL DERECH.DE MODIF



Control Unit

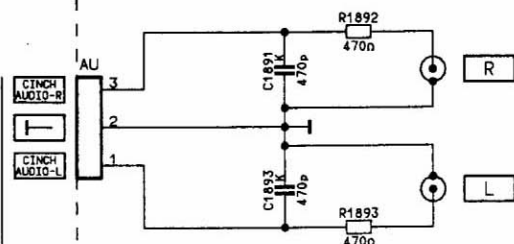
CONTROL UNIT

CONTROL UNIT

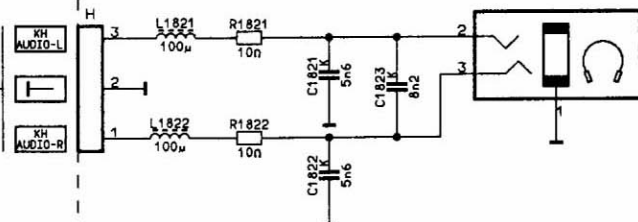
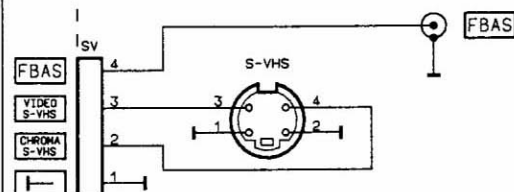
UNITE DE COMANDE
UNITA DI COMANDO

UNIDAD DE MANDO

-080.63



ZUR BUCHSENPLATTE
TO SOCKET BOARD
VERS. C.I. PRISES
ALLA PIASTRA PRESE
A LA PLACA DE TOMAS



ZUM NF BAUST.
TO AMPLIFIER AF
VERS AMPL.BF
ALL'AMPL.BF
AL AMPL.BF

NICHT NETZGETRENNTES SCHALTUNGSTEIL
CIRCUIT NOT MAINS ISOLATED
CIRCUIT NON ISOLE DU SECTEUR
CIRCUITO NON SEPARADO DALLA RETE
ATENCIÓN! SECTOR DE COM. NO SEP. DE LA RED

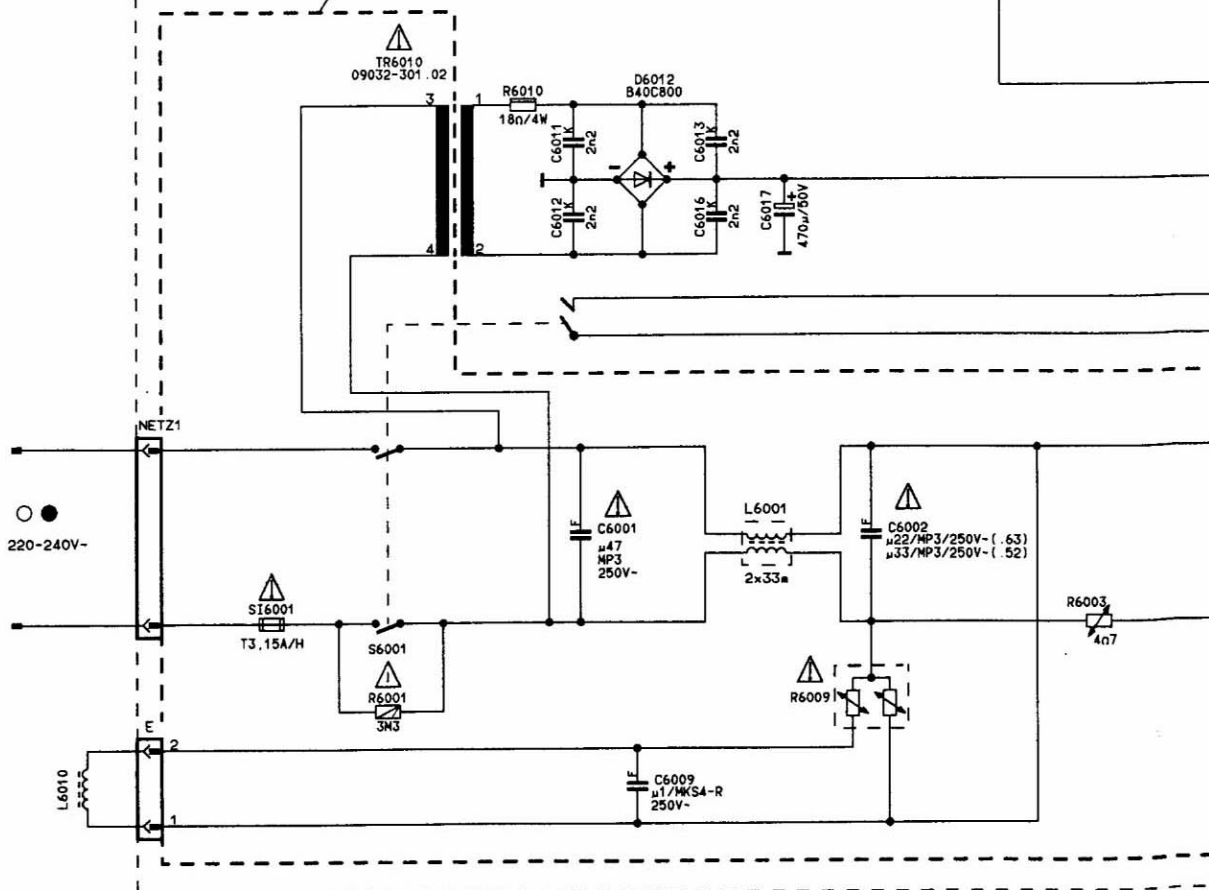
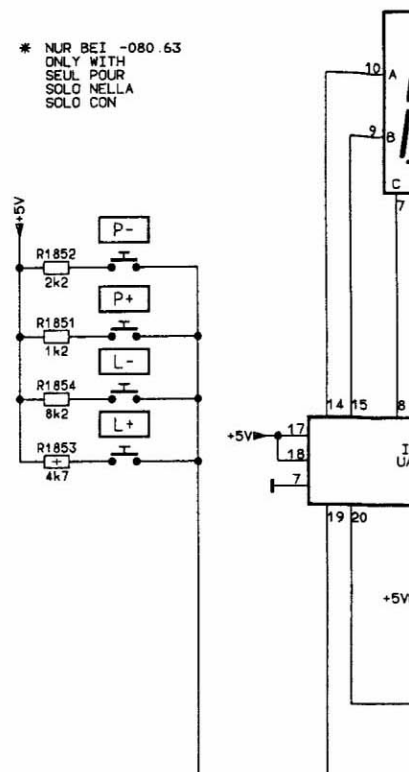
DYSPLAY UNIT WITH BUTONS

DYSPLAY UNIT WITH BUTONS

UNITÉ D'INDICATION AVEC TOUCHES
INDICATRICES D'UNITÉ CON TASTI

INDICATORE D'UNITA' CON TASTI
UNIDAD DE INDICATION CON TECLAS

* NUR BEI -080.63
ONLY WITH
SEUL POUR
SOLO NELLA
SOLO CON

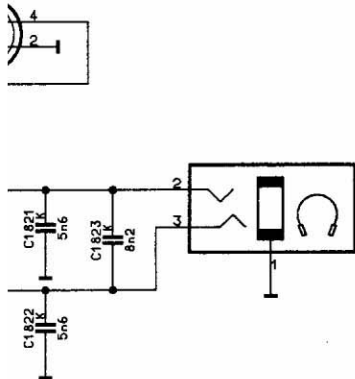
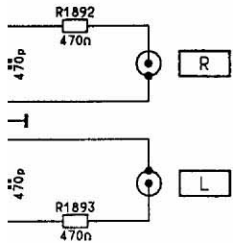


01-080.52
-080.63

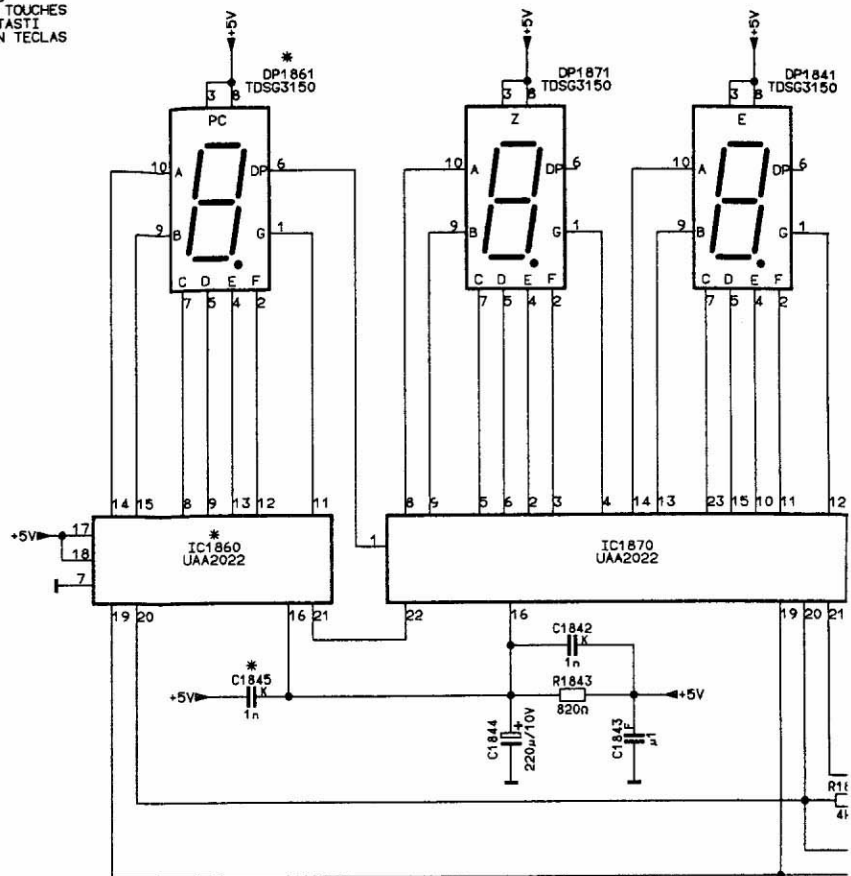
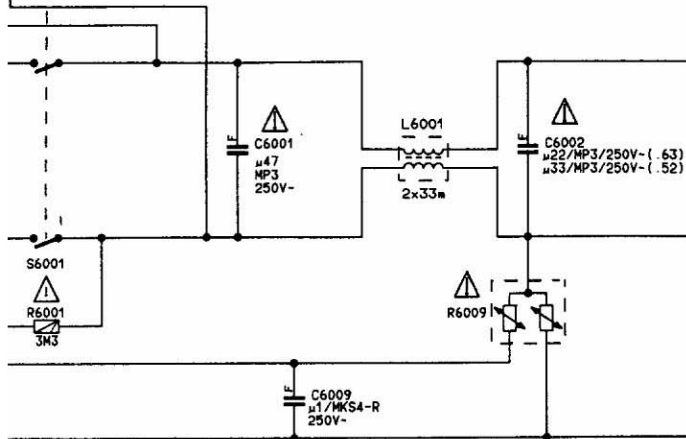
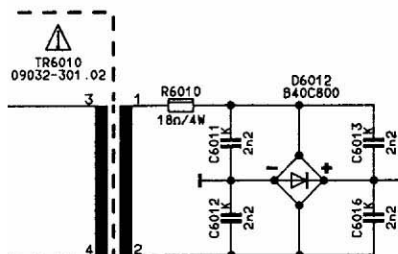
ANZEIGE-EINHEIT MIT TASTEN 29501-081.52

DISPLAY UNIT WITH BUTTONS
UNITE D'INDICATION AVEC TOUCHES
INDICATORE D'UNITA CON TASTI
UNIDAD DE INDICACION CON TECLAS

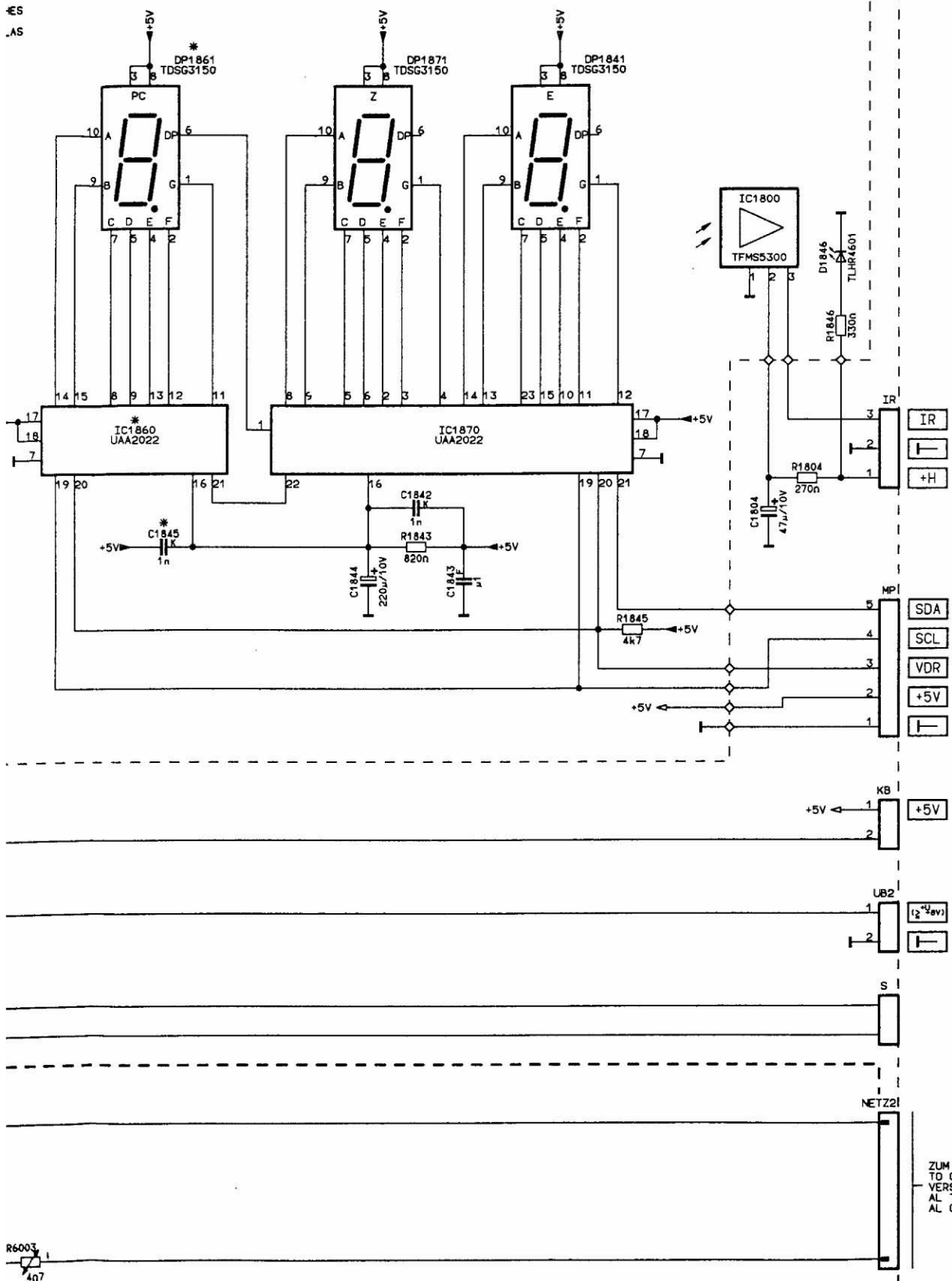
* NUR BEI -080.63
ONLY WITH
SEUL POUR
SOLO NELLA
SOLO CON



SCHALTUNGSTEIL
ATED
SECTEUR
DALLA RETE
COM.NO SEP.DE LA RED



ES
AS



ZUM ABSTIMMBAUST.
TO TUNING MOD.
VERS MOD. DE SYNT.
AL MOD. DI SINTONIA
AL MOD. DI SINTONIA

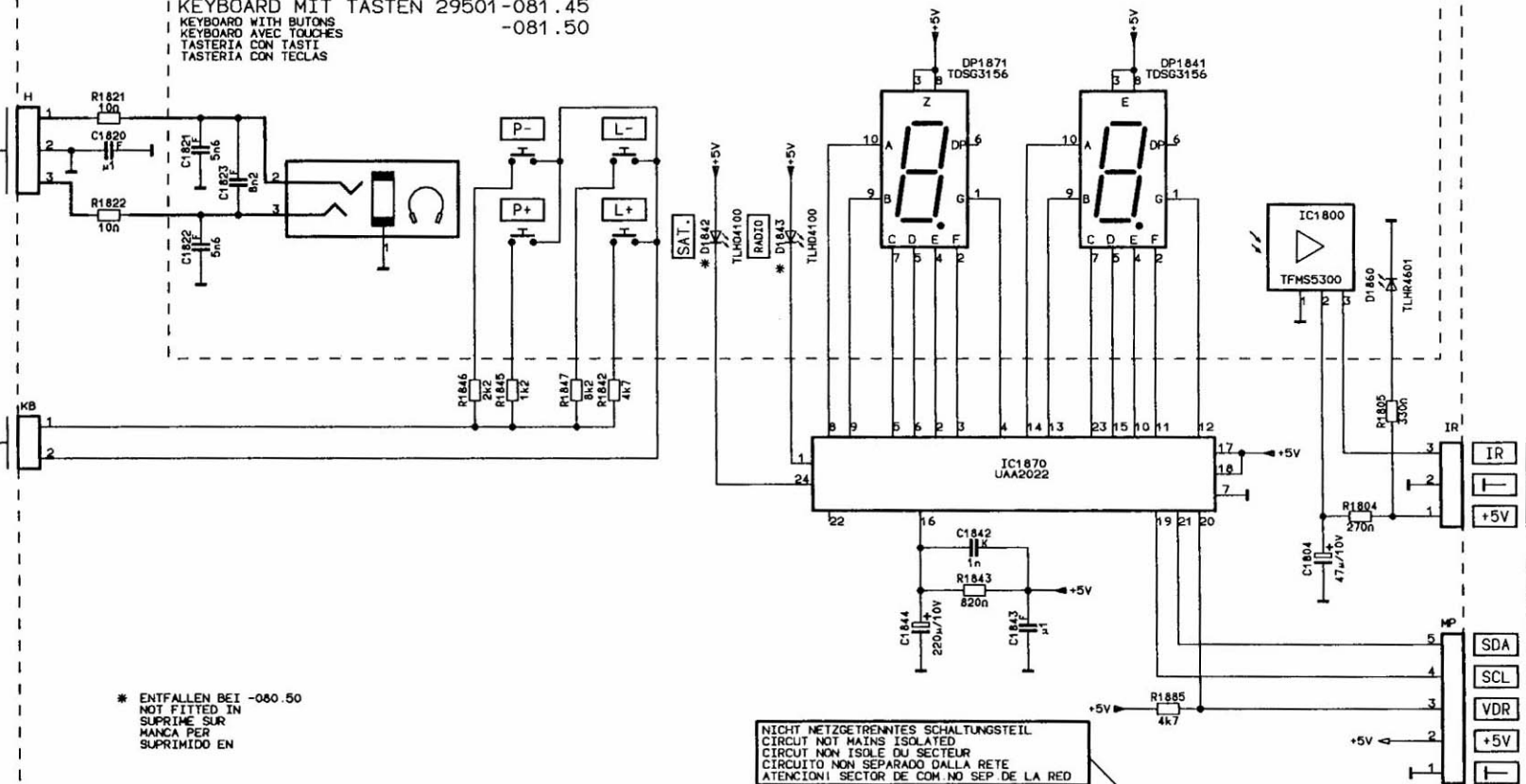
ZUM CHASSIS
TO CHASSIS
VERS CHASSIS
AL TELAIO
AL CHASSIS

BED.-EINHEIT 29501-080.45
CONTROL UNIT
UNITA DE COMANDE
UNITA DI COMANDO
UNIDAD DE MANDO

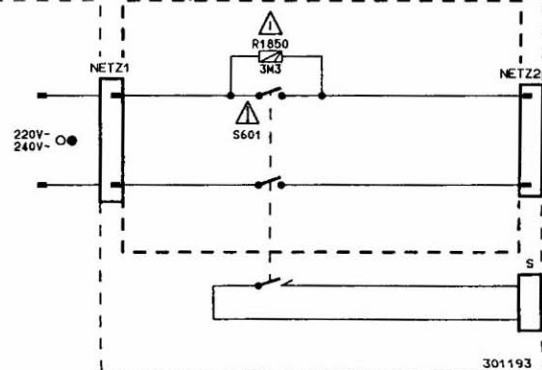
KEYBOARD MIT TASTEN 29501-081.45
KEYBOARD WITH BUTTONS
KEYBOARD AVEC TOUCHES
TASTERIA CON TASTI
TASTERIA CON TECLAS

ZUM NF-VERST.
TO AF AMPLIFIER
VERS AMPL. BF.
AL AMPL. BF.

ZUM ABSTIMMBLÖCK
TO TUNING MODULE
VERS MOD. DE SYNTONISATION
AL MOD. DI SINTONIA
AL MOD. DE SINTONIA



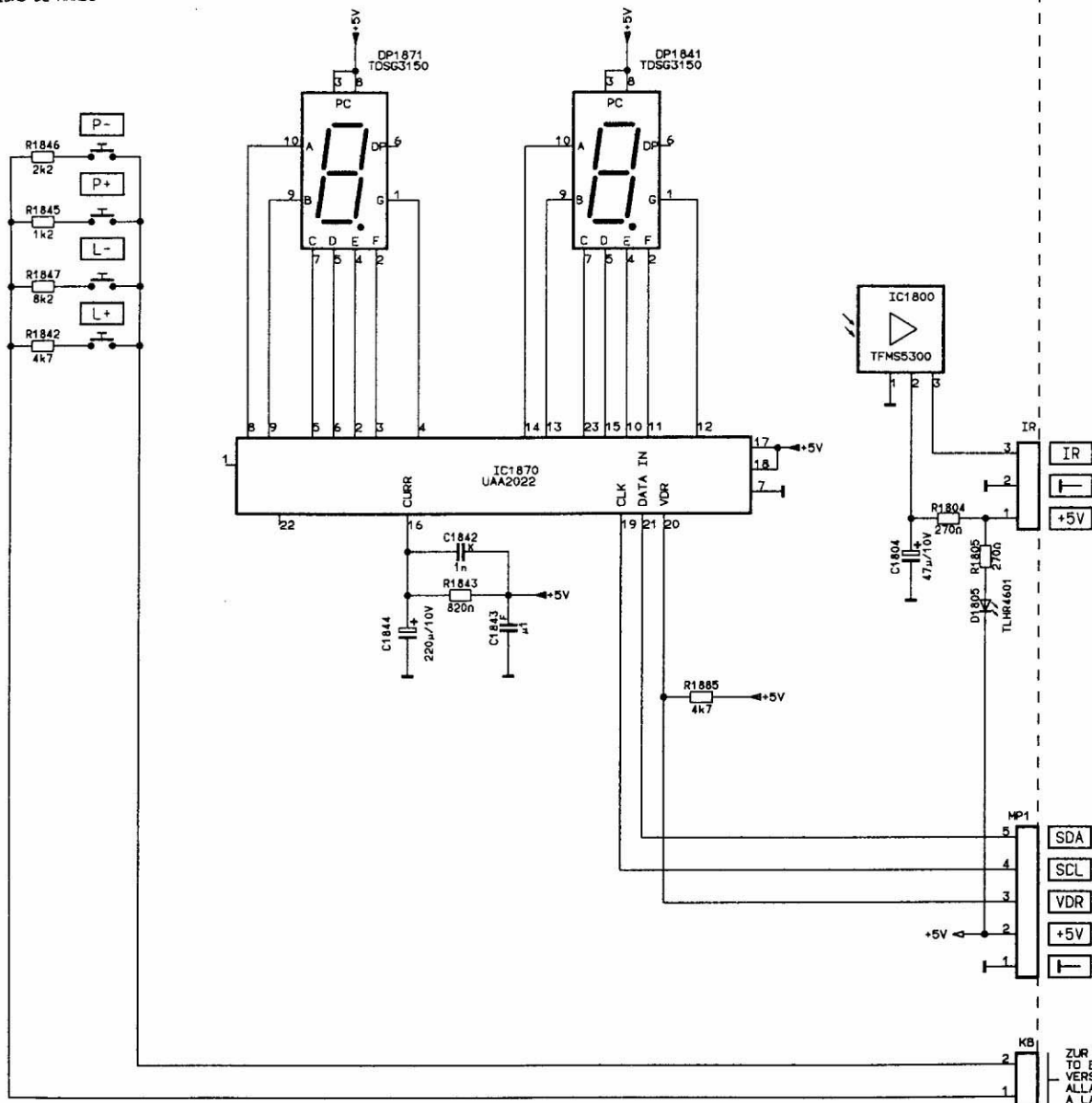
ZUM ABSTIMMBLÖCK
TO TUNING MODULE
VERS MOD. DE SYNTONISATION
AL MOD. DI SINTONIA
AL MOD. DE SINTONIA



ZUR NETZSCHALTERPLATTE
TO MAINS SWITCH PANEL
VERS C.I. INTERR. SECTEUR
ALLA PIASTRA INTERR. DI RETE
A LA PLACA INTERRUPTOR RED

BED.EINHEIT 29501-080.65

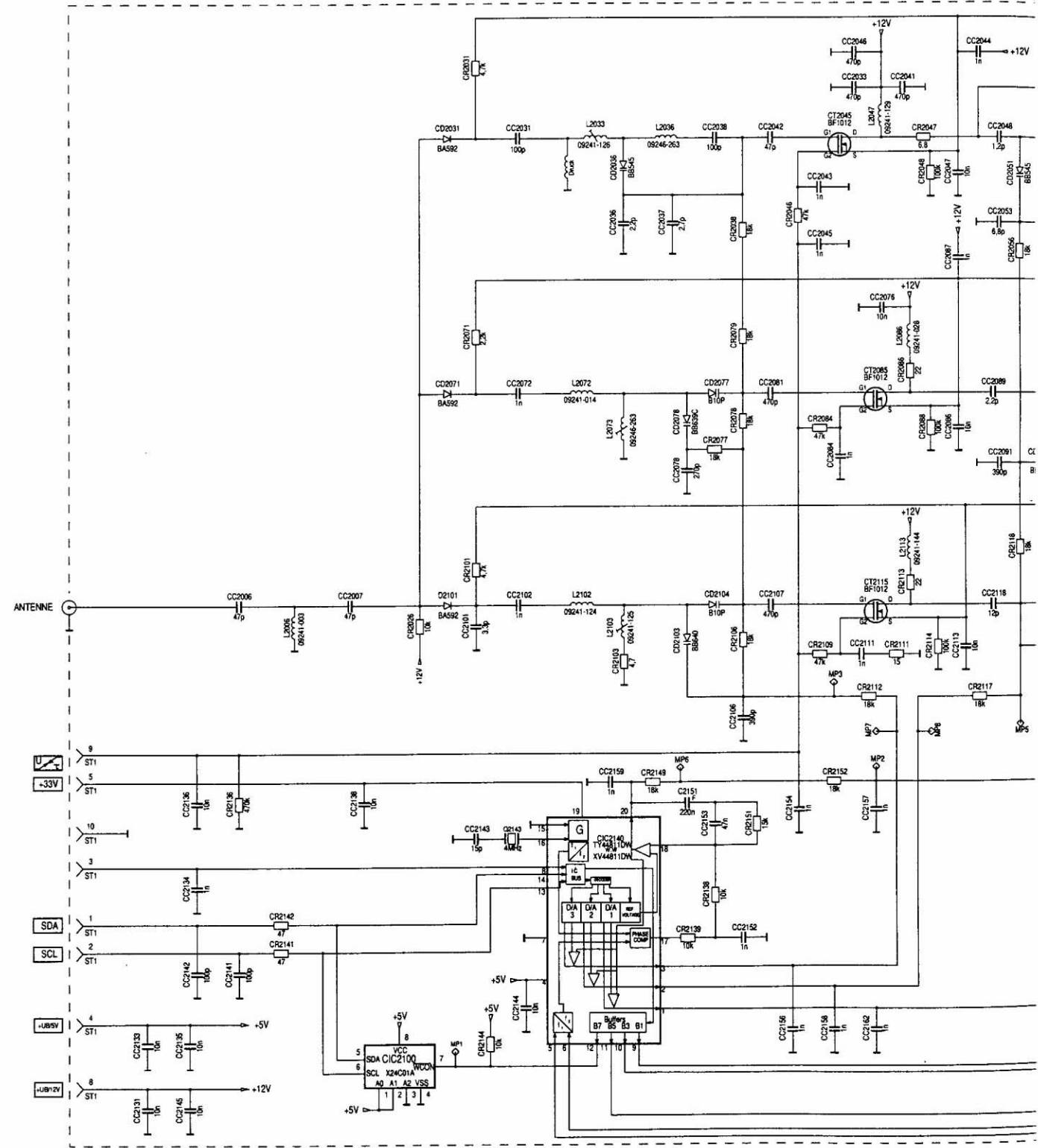
CONTROL UNIT
UNITA DE COMANDE
UNITA DI COMANDO
UNIDAD DE MANDO



ZUR GRUNDPLATTE
TO BASIC BOARD
VERS C.I. PRINCIPAL
ALLA PIASTA BASE
A LA PLACA BASE

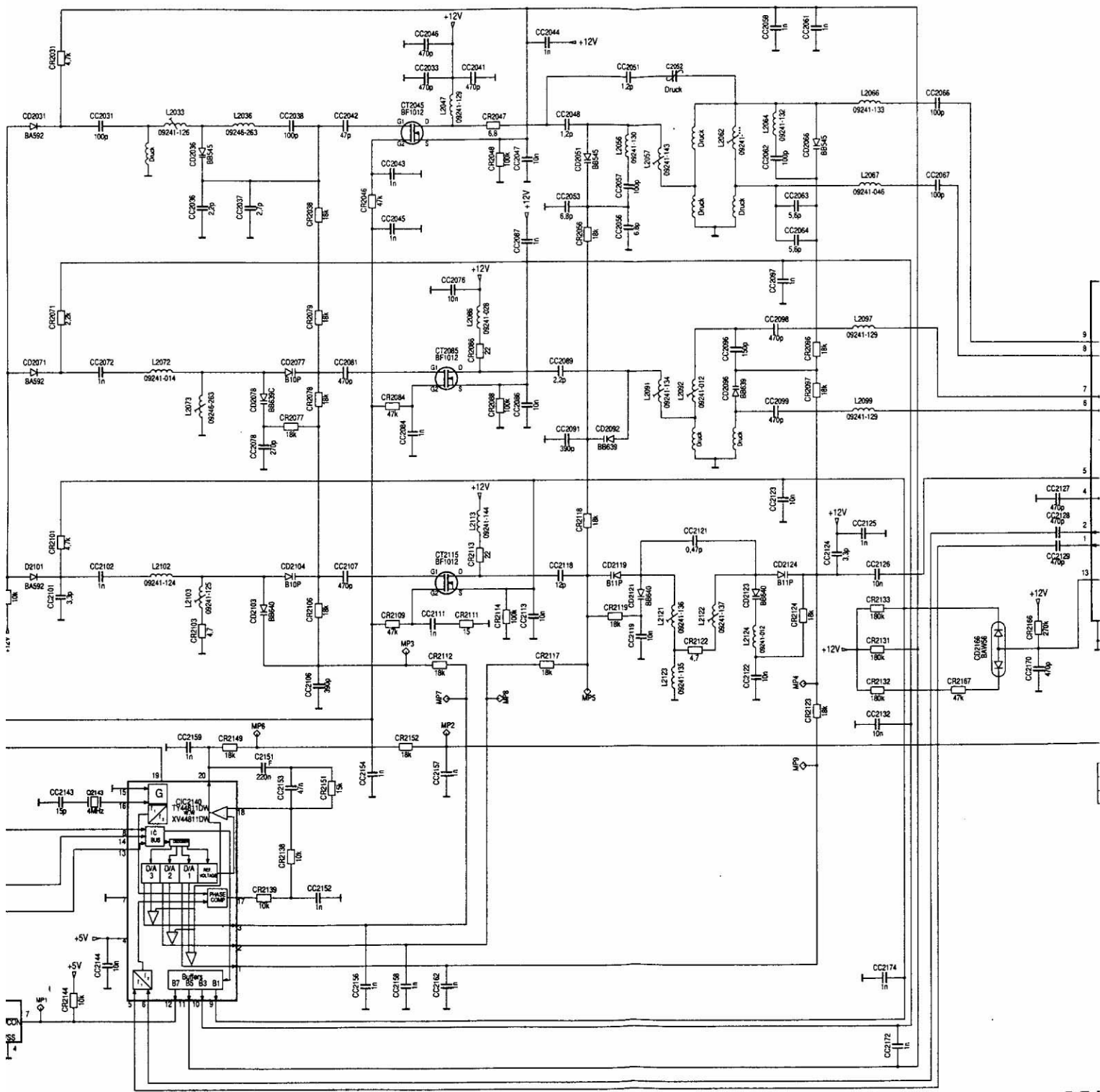
Servicearbeiten nach Bausteinwechsel:
Tuner-Regelspannungseinsatz kontrollieren und gegebenenfalls einstellen.

Servicing work after replacing the module:
Check the start-up of the tuner control voltage and readjust if necessary.

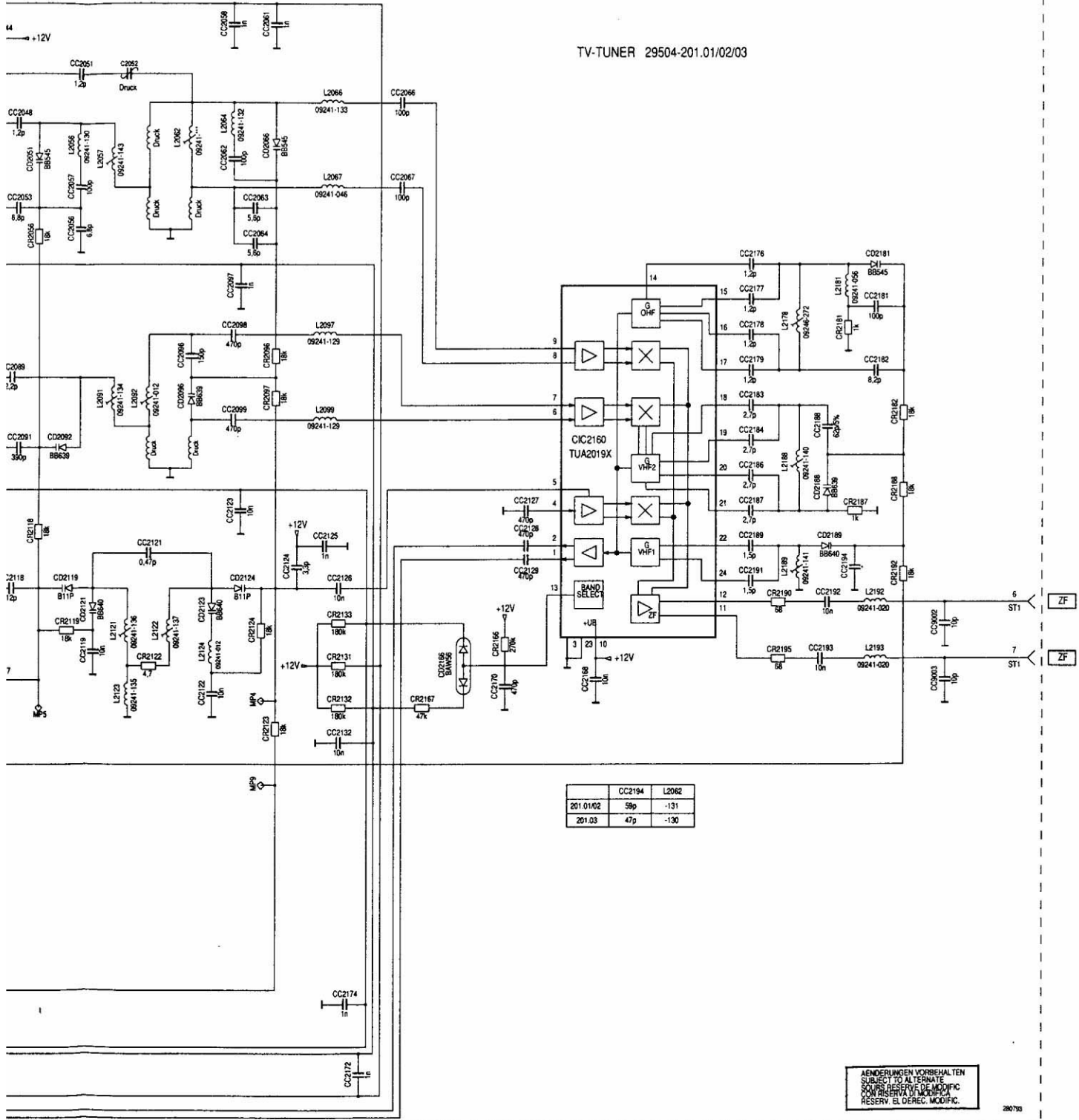


nach Bausteinwechsel:
nungseinsatz kontrollieren und gegebenenfalls

after replacing the module:
up of the tuner control voltage and readjust if



TV-TUNER 29504-201.01/02/03



ÄNDERUNGEN VORBEHALTEN
 SOUS-RESERVE DE MODIFIC
 CON RESERVA DE MODIFICA
 RESERV. IL DEREG. MODIFIC.

IF Amplifier

Servicing work after replacing the module:

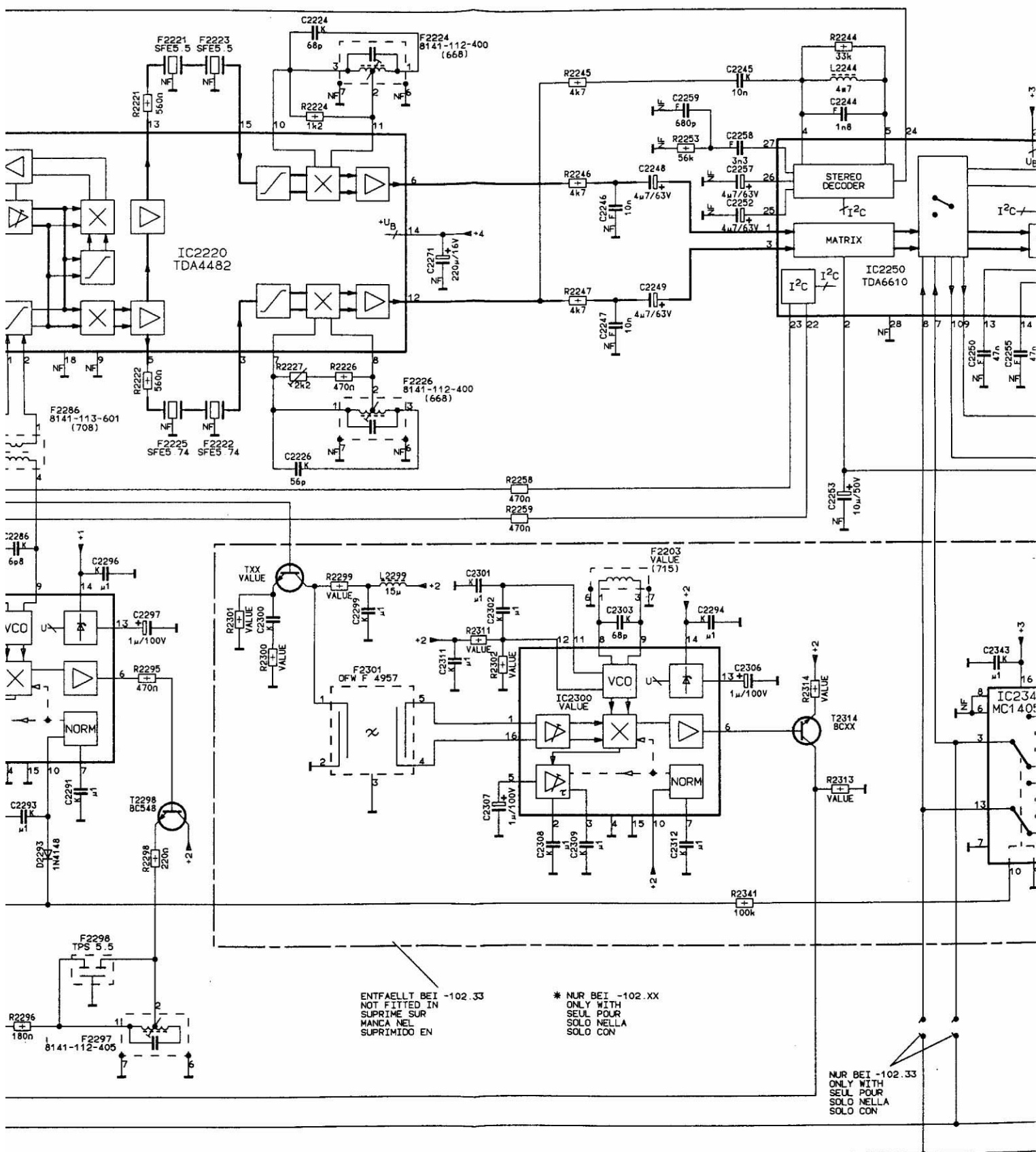
Check the start-up of the tuner control voltage and readjust if necessary.



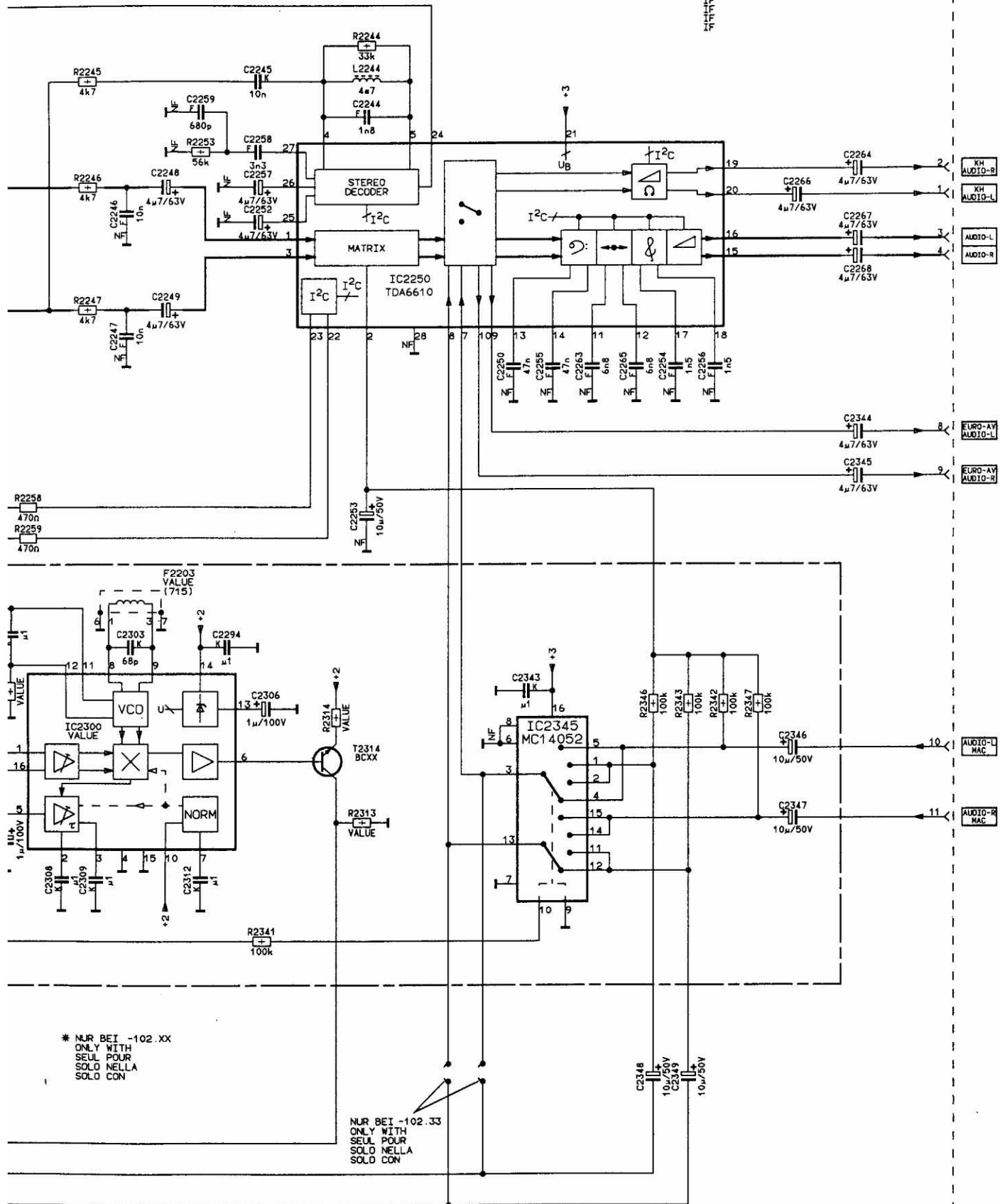
ENTFAELT BEI -102.33
NOT FITTED IN
SUPRIME SUR
MANCA NEL
SUPRIMIDO EN

* 2000

Servicing work after replacing the module:
Check the start-up of the tuner control voltage and readjust if necessary.



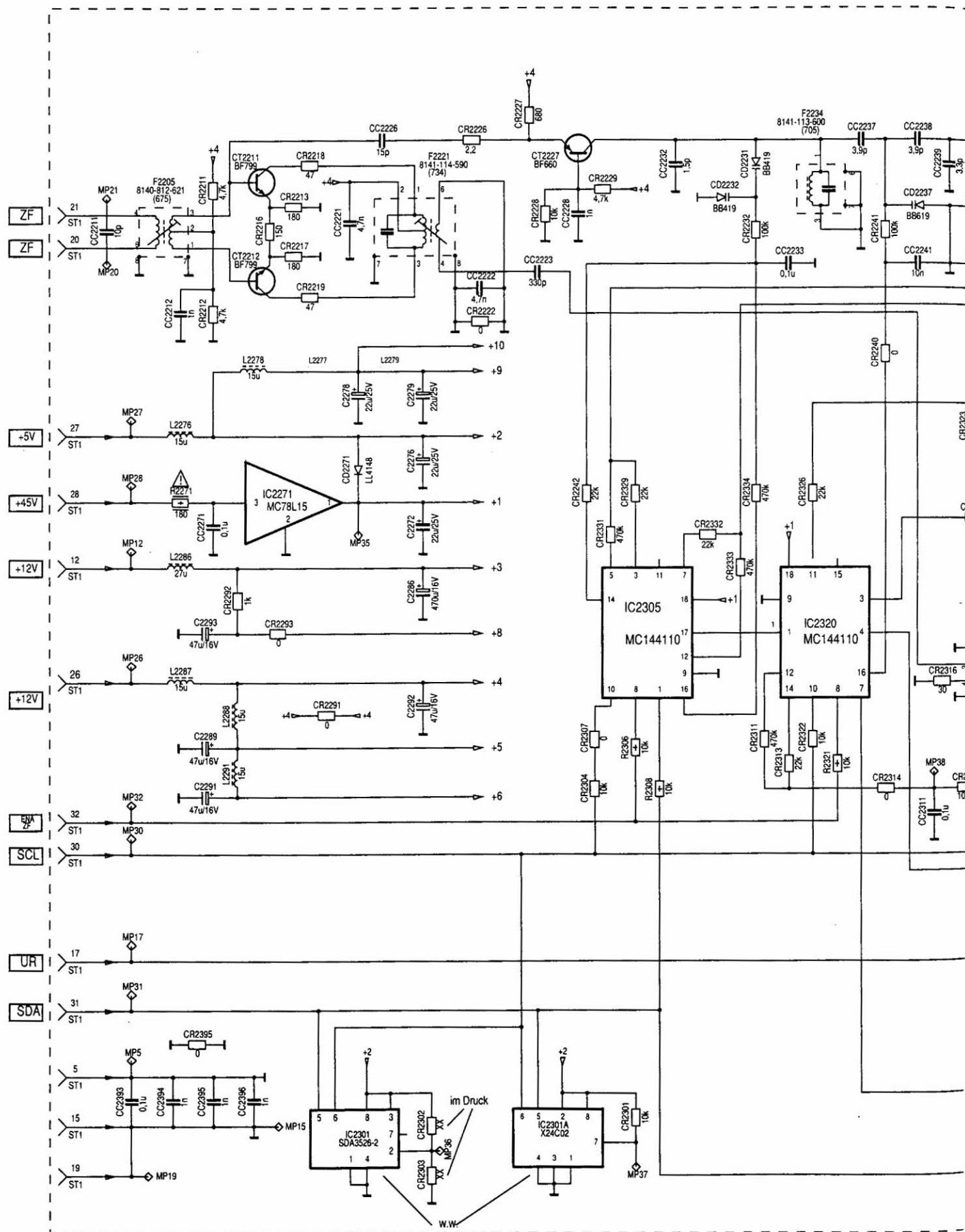
IF
IF
IF



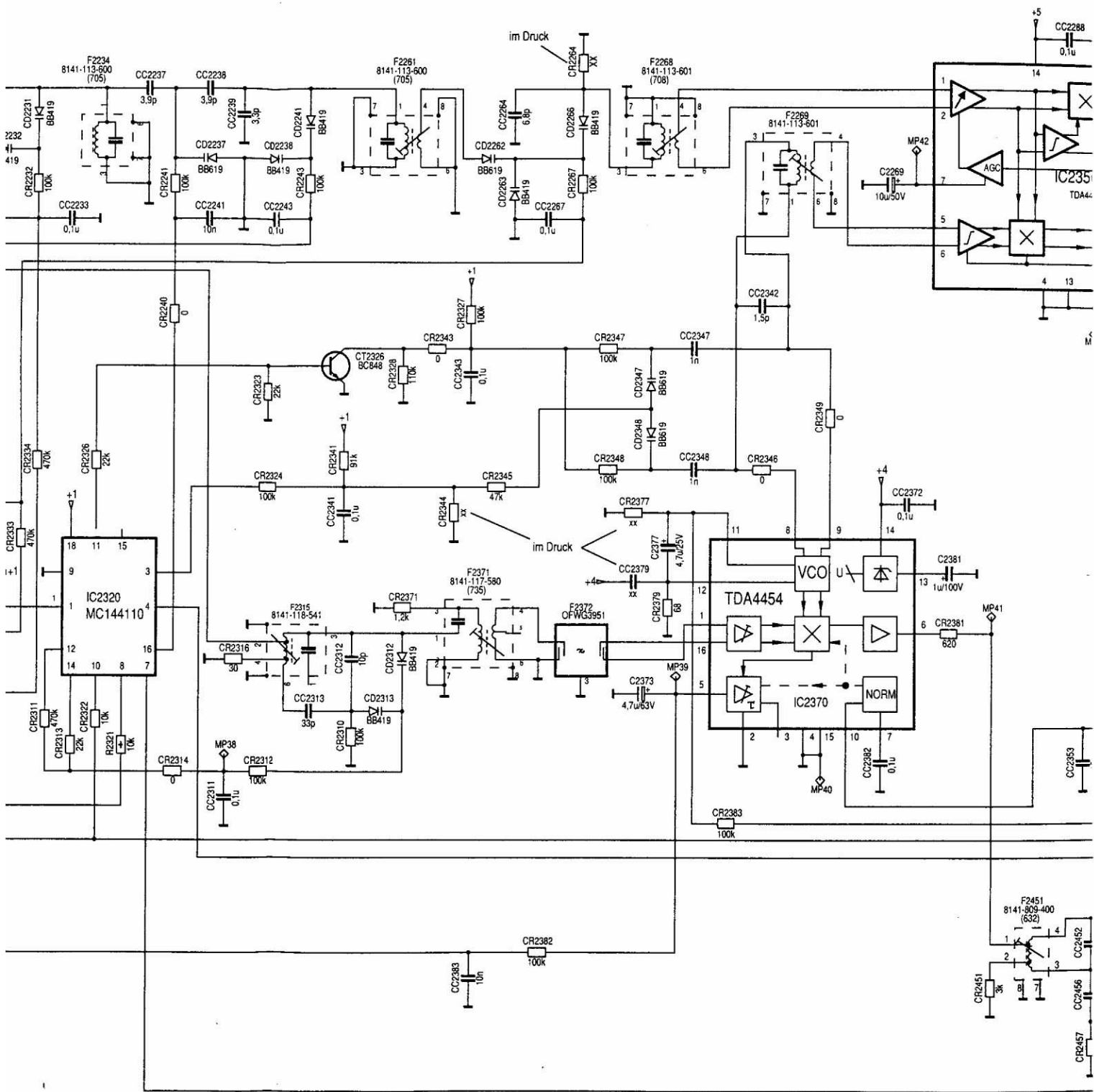
IF Amplifier

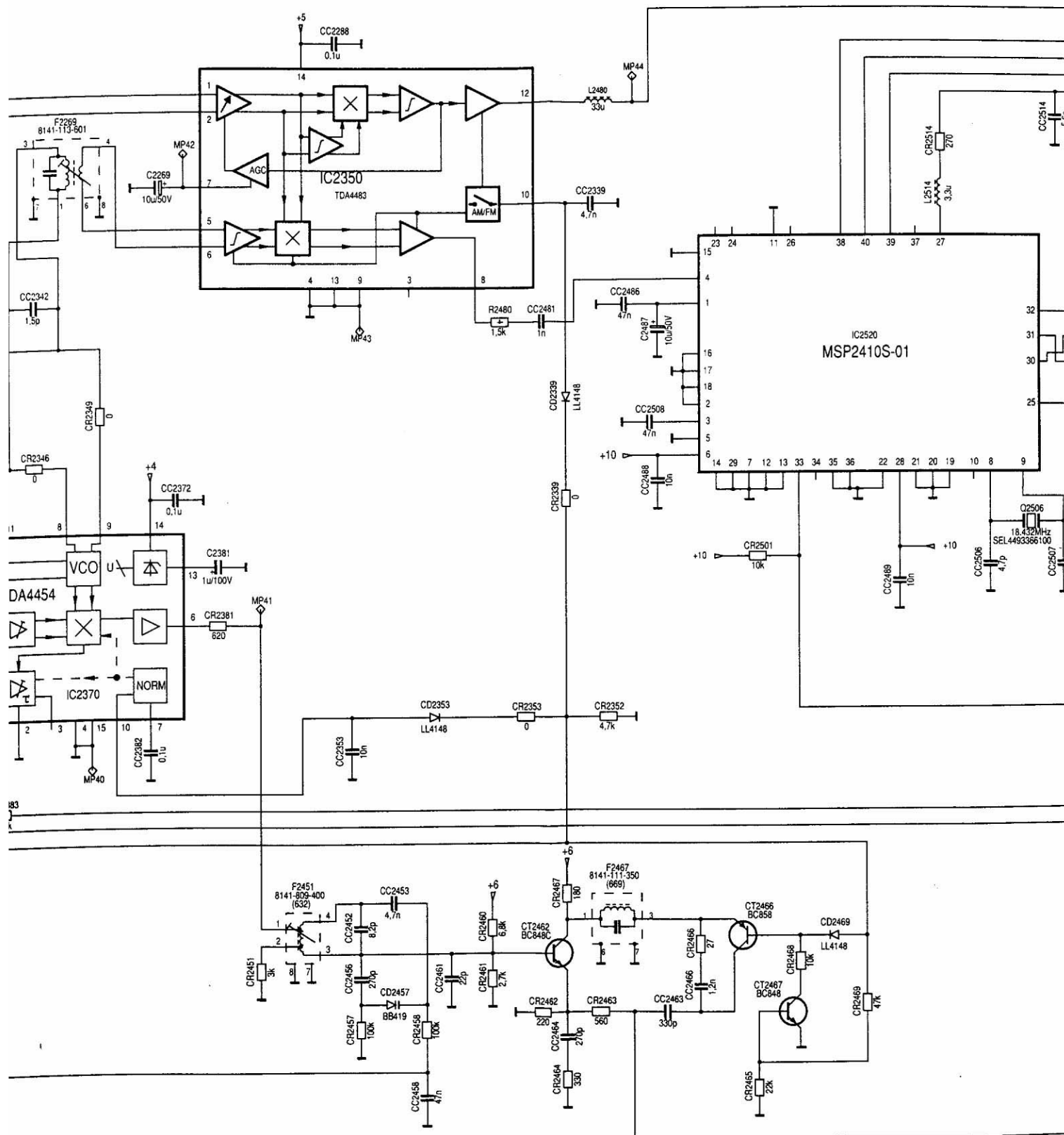
Servicing work after replacing the module:

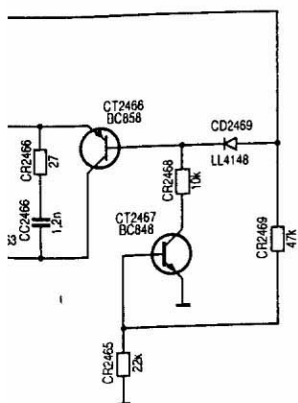
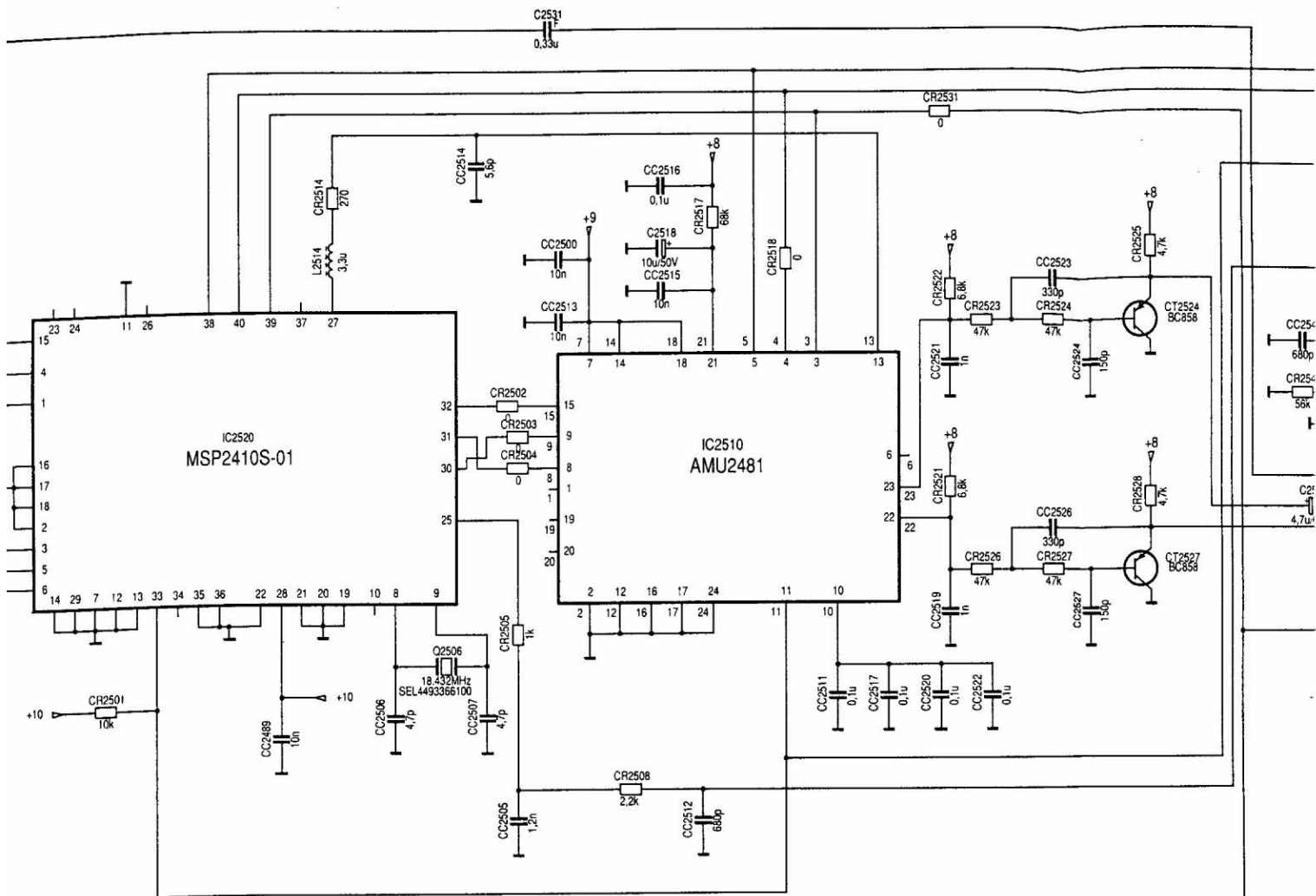
Check the start-up of the tuner control voltage and readjust if necessary.

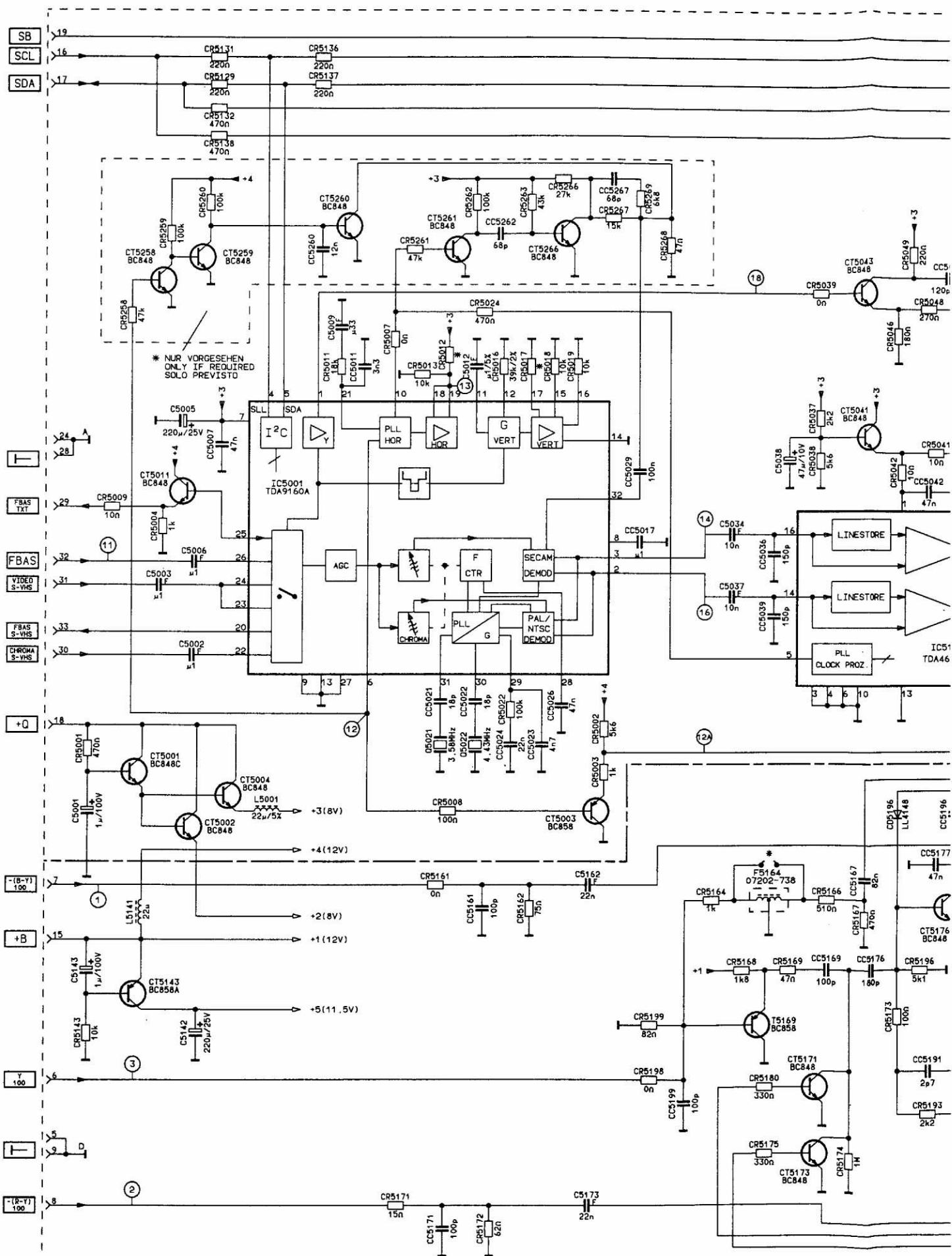


Rule:
Itage and readjust if necessary.

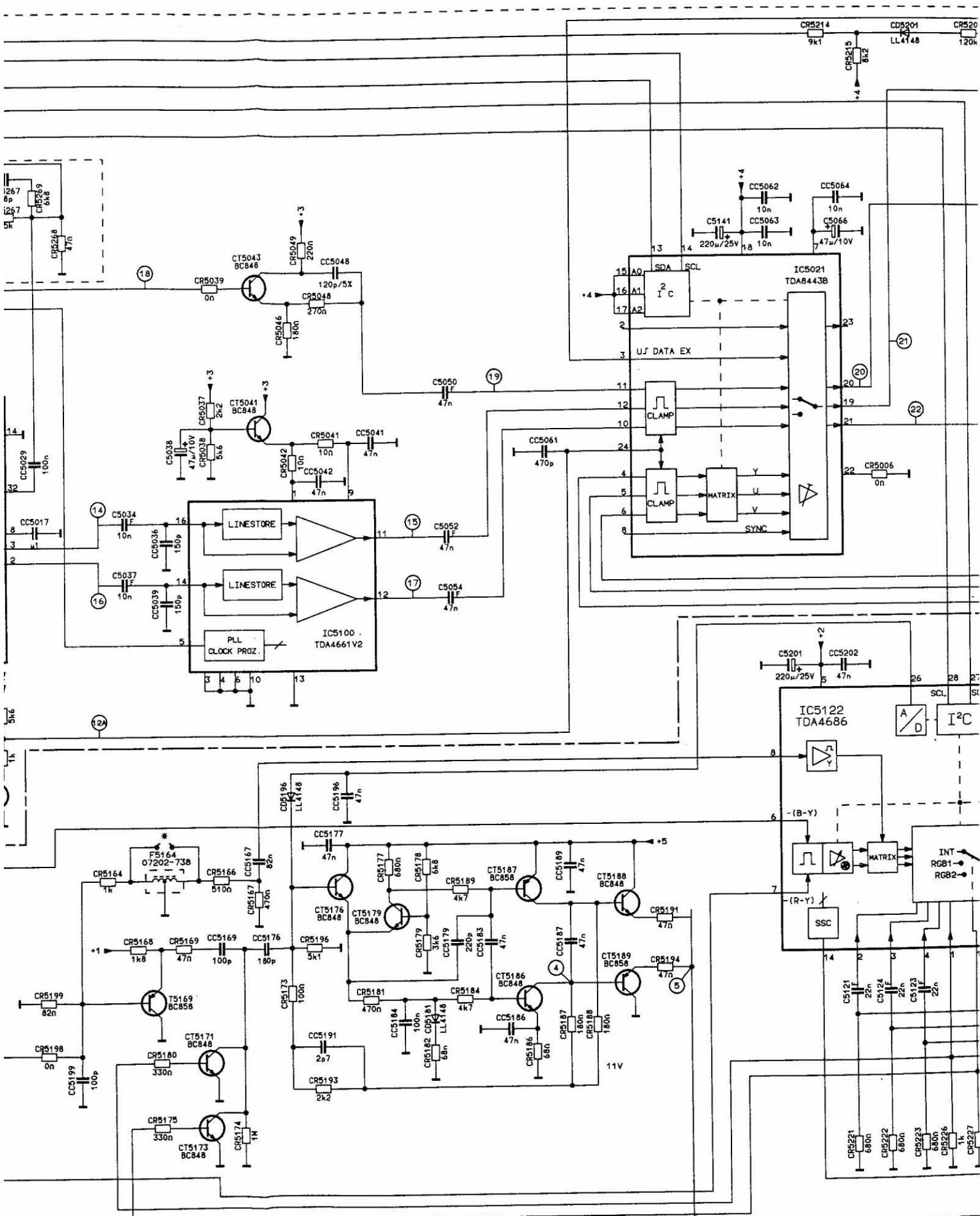


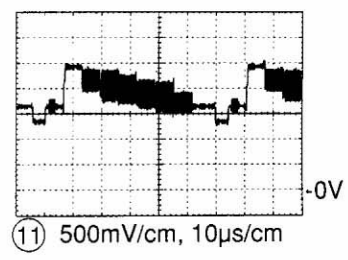
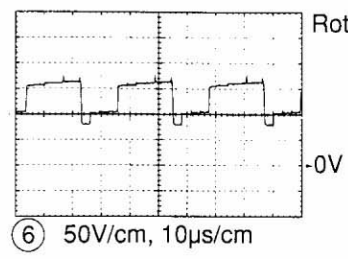
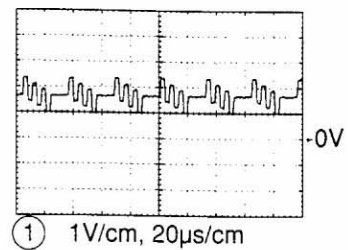
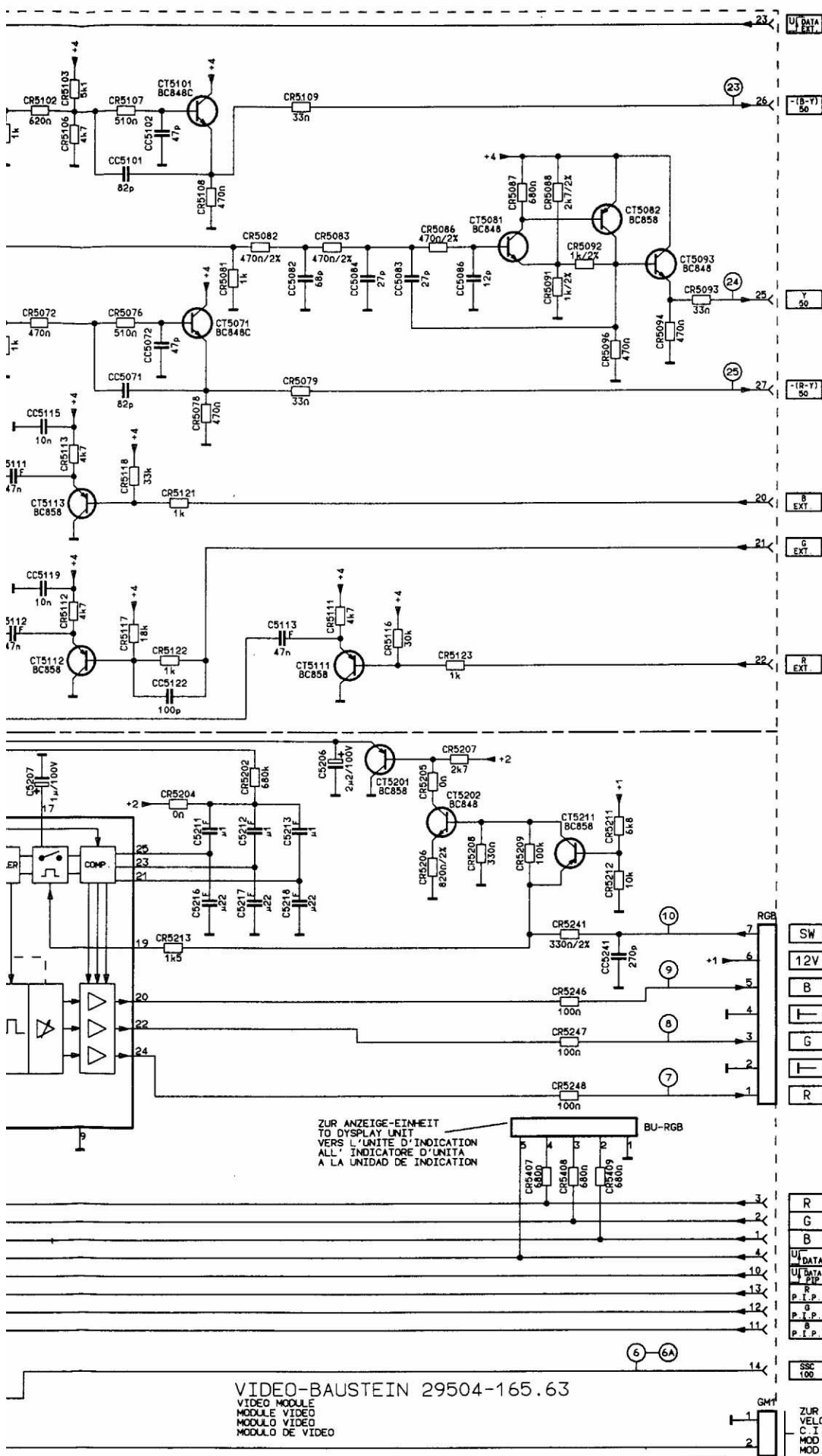




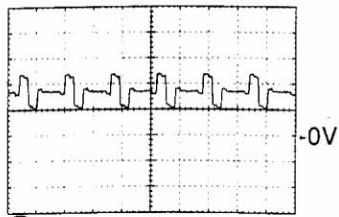


the module: see alignment page 3-5 (1.6)

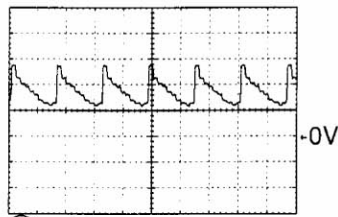




- U1 DATA EXT.
- (B-V) 50
- Y 50
- (R-V) 50
- B EXT.
- G EXT.
- R EXT.
- RGB
- SW
- 12V
- B
- G
- R
- R
- G
- B
- U1 DATA
- U1 DATA
- P.I.P.
- P.I.P.
- P.I.P.
- P.I.P.
- SSC 100
- GM



② 1V/cm, 20µs/cm

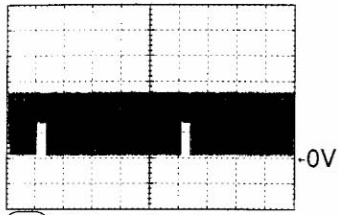


③ 1V/cm, 20µs/cm

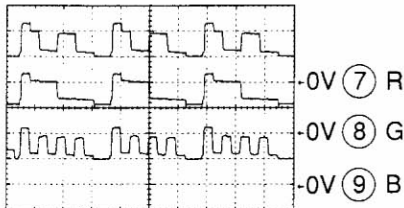


④ 200mV/cm, 500ns/cm

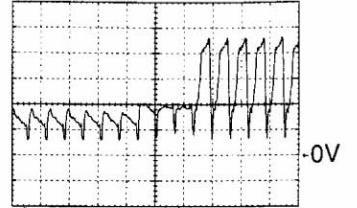
⑤ 5V/cm, 500ns/cm
mit Gittermuster
with grid pattern



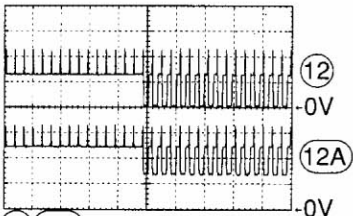
⑥A 2V/cm, 2ms/cm



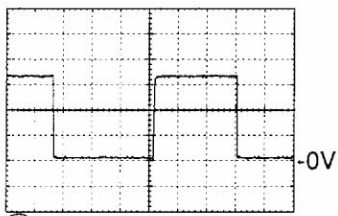
⑦ ⑧ ⑨ 2V/cm, 10µs/cm



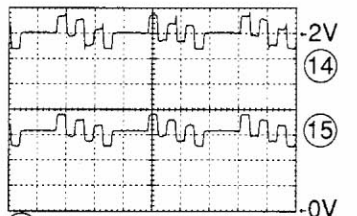
⑩ 2V/cm, 50µs/cm
auf Bild getriggert
triggered to field frtequency



⑫ ⑫A 2V/cm, 200µs/cm

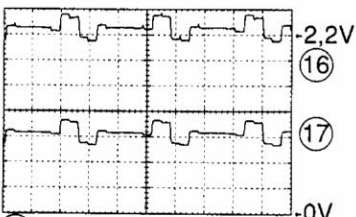


⑬ 1V/cm, 10µs/cm



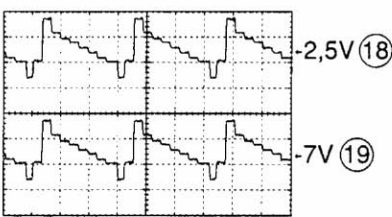
⑭ 500mV/cm, 20µs/cm

⑮ 1V/cm, 20µs/cm



⑯ 500mV/cm, 20µs/cm

⑰ 1V/cm, 20µs/cm



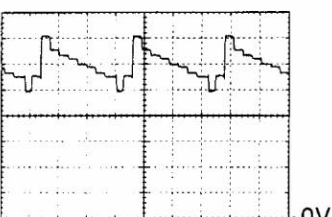
⑱ 200mV/cm, 20µs/cm



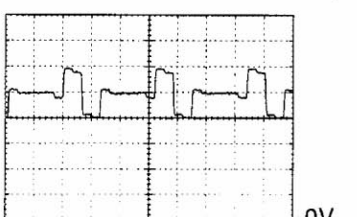
⑳ ㉑ ㉒ 1V/cm, 20µs/cm



㉓ 1V/cm, 20µs/cm

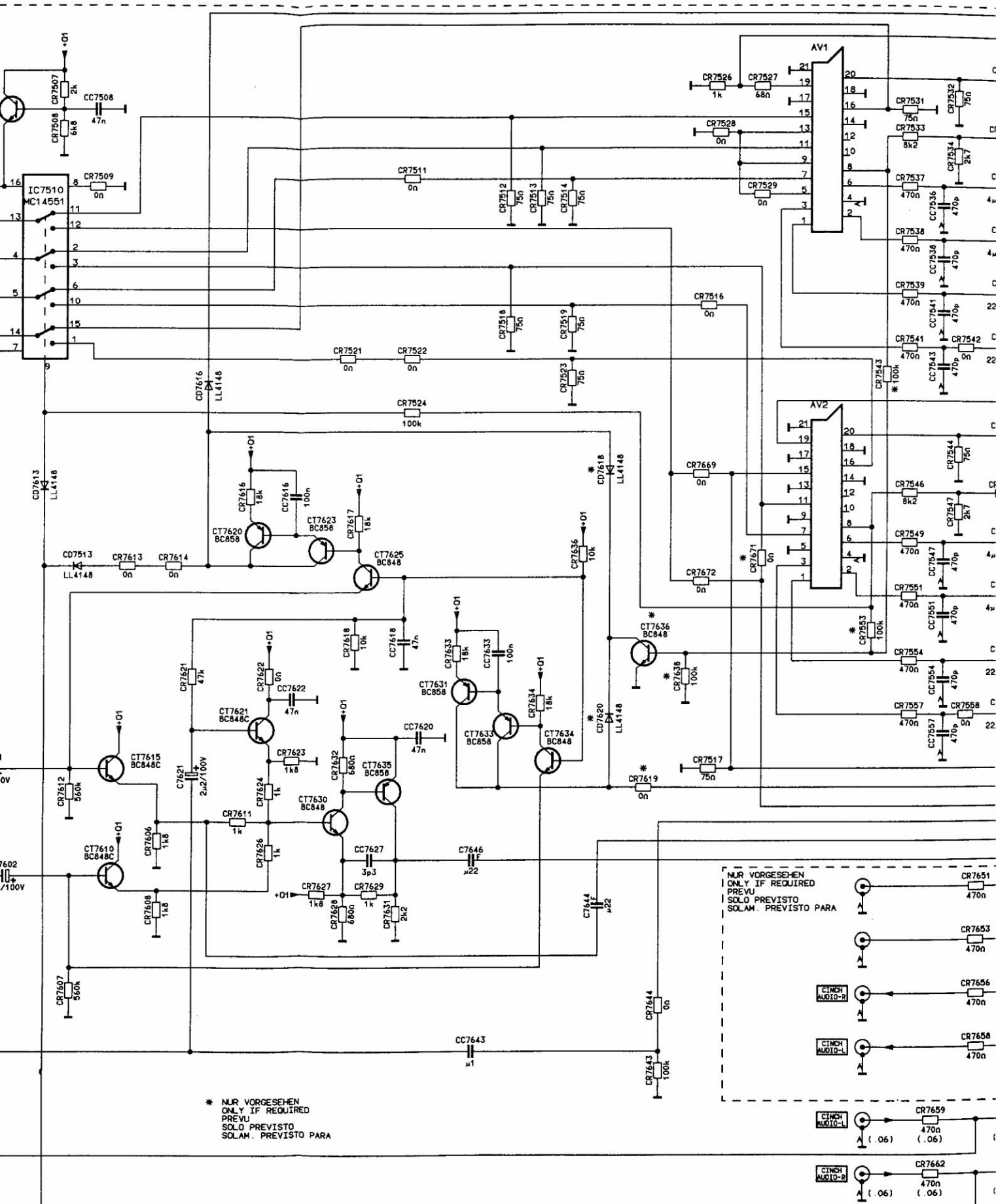


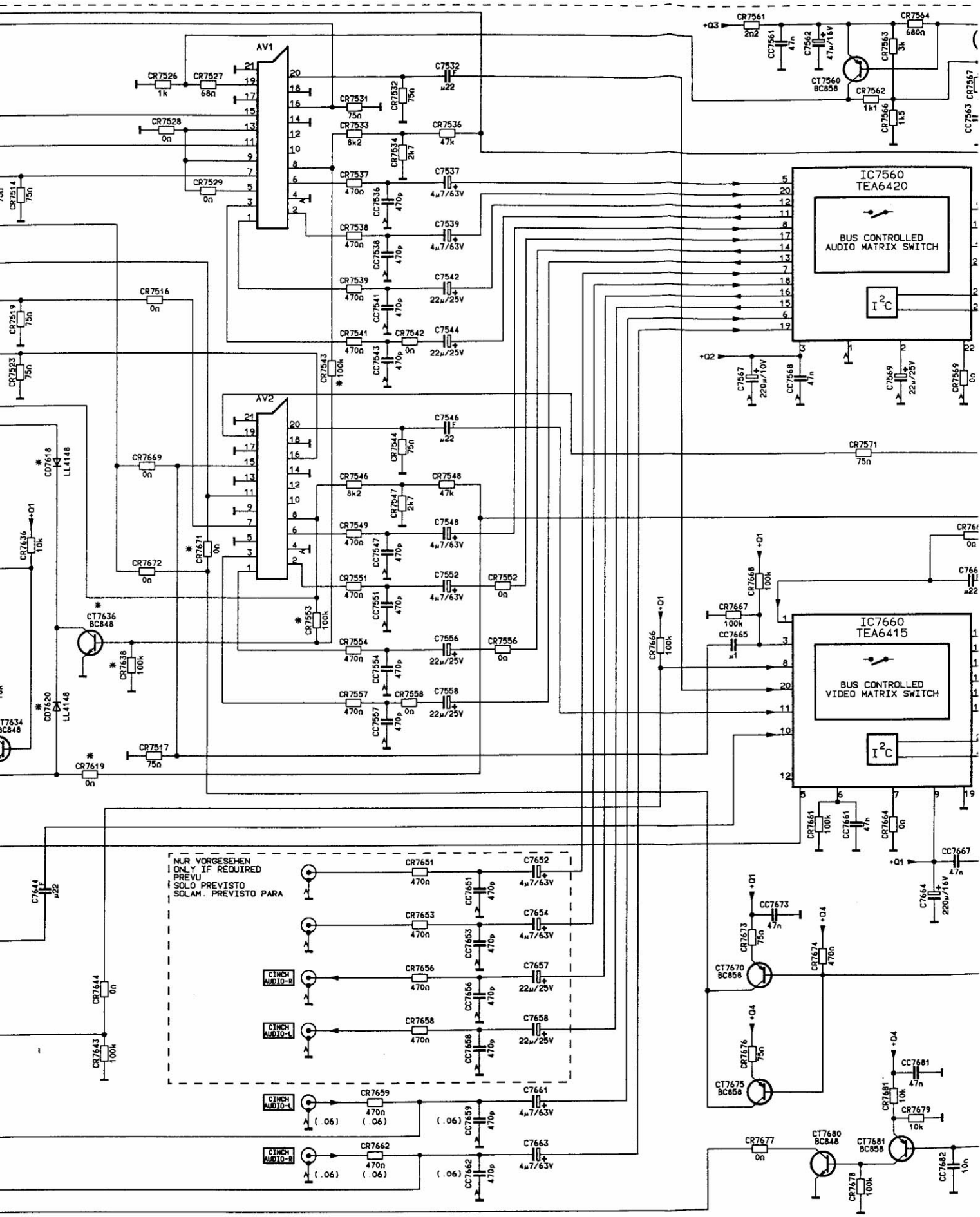
㉔ 1V/cm, 20µs/cm



㉕ 1V/cm, 20µs/cm

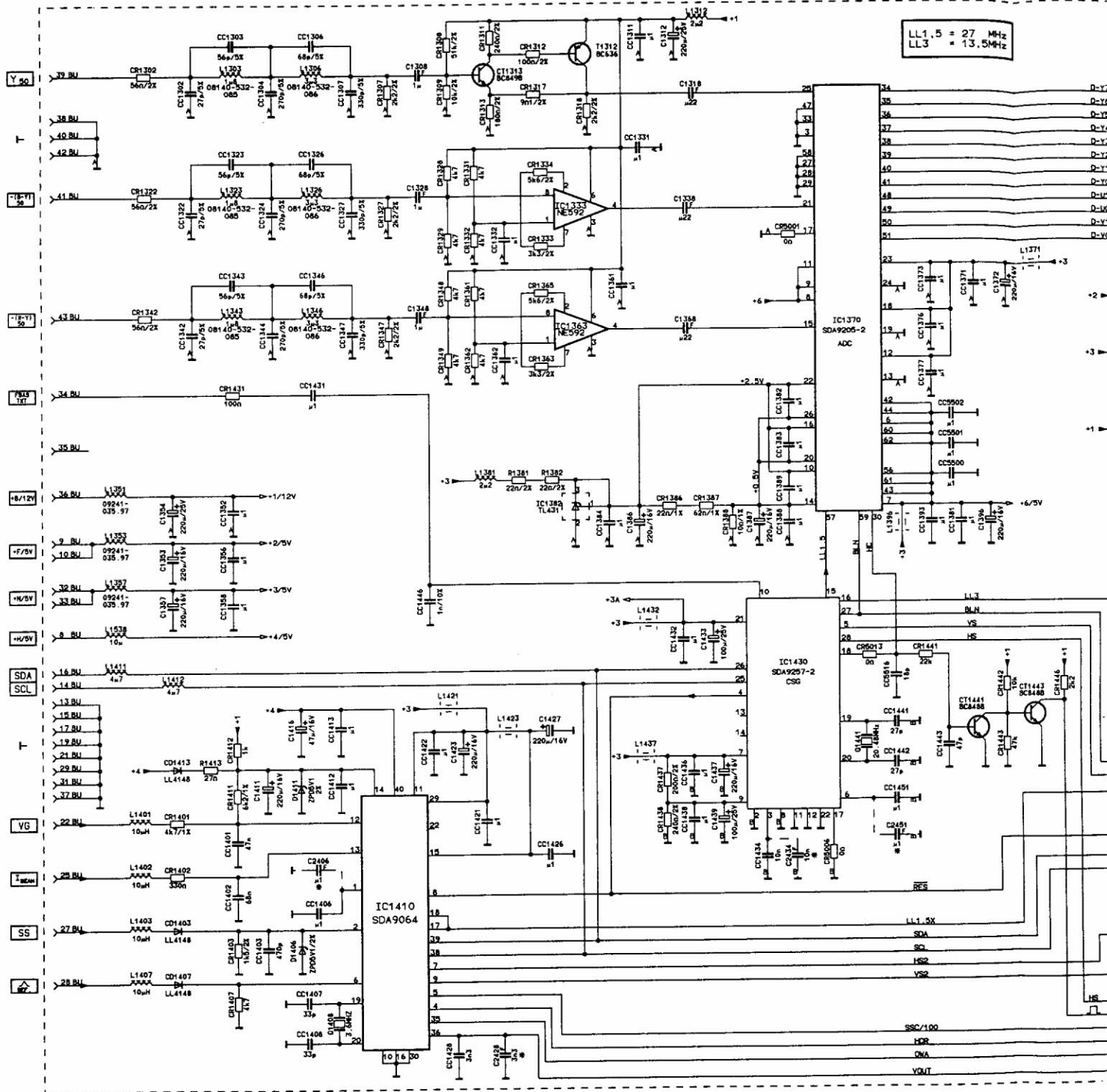
work after replacing the module: none

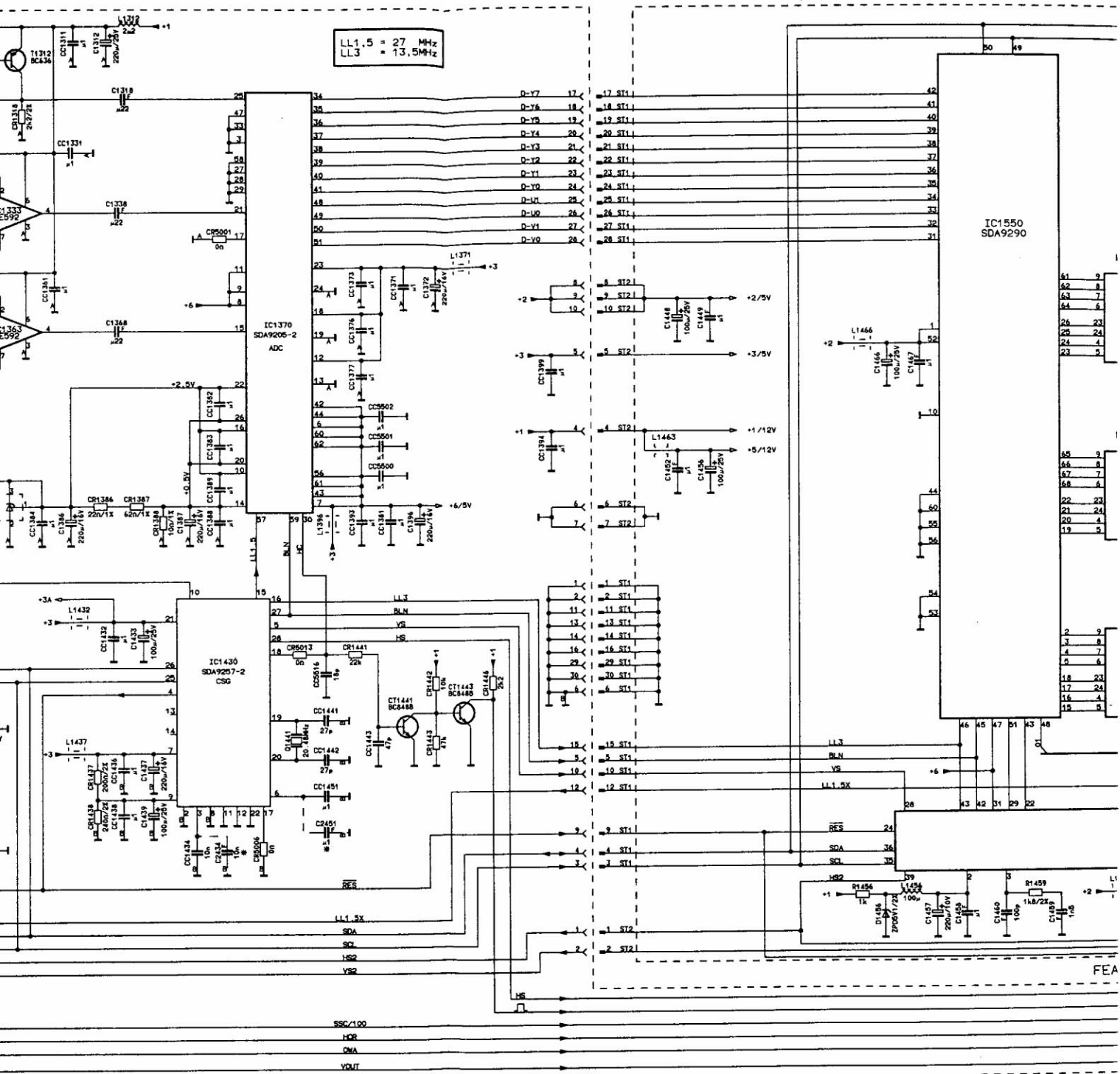




SOCKET BOARD
C.I. PRISES
PIASTRA PRESE
PLACA DE TOMAS

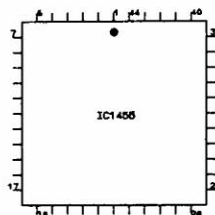
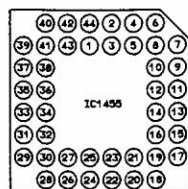
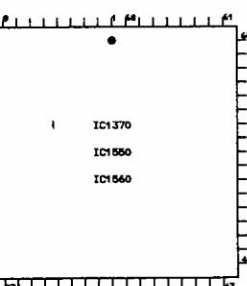


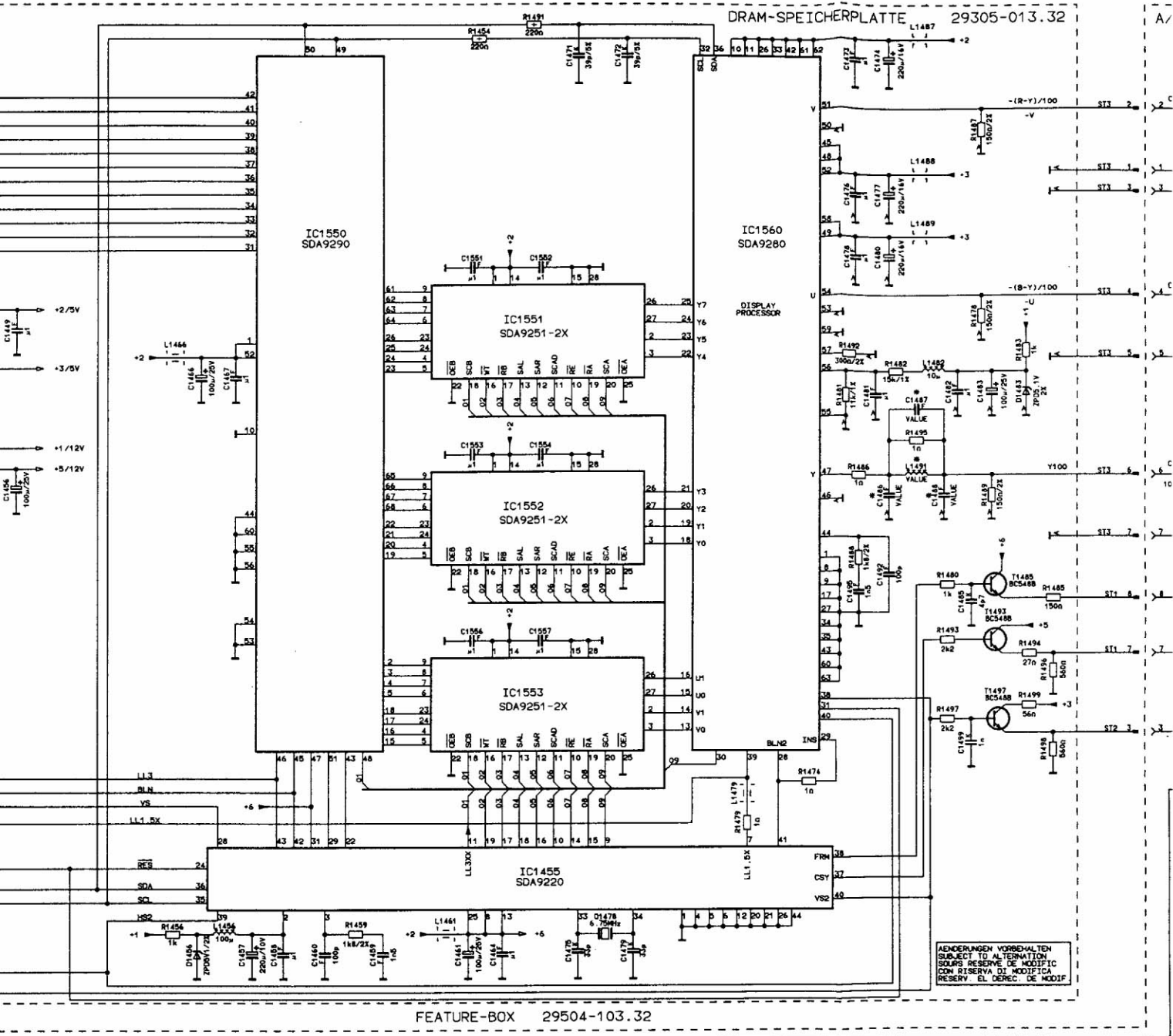


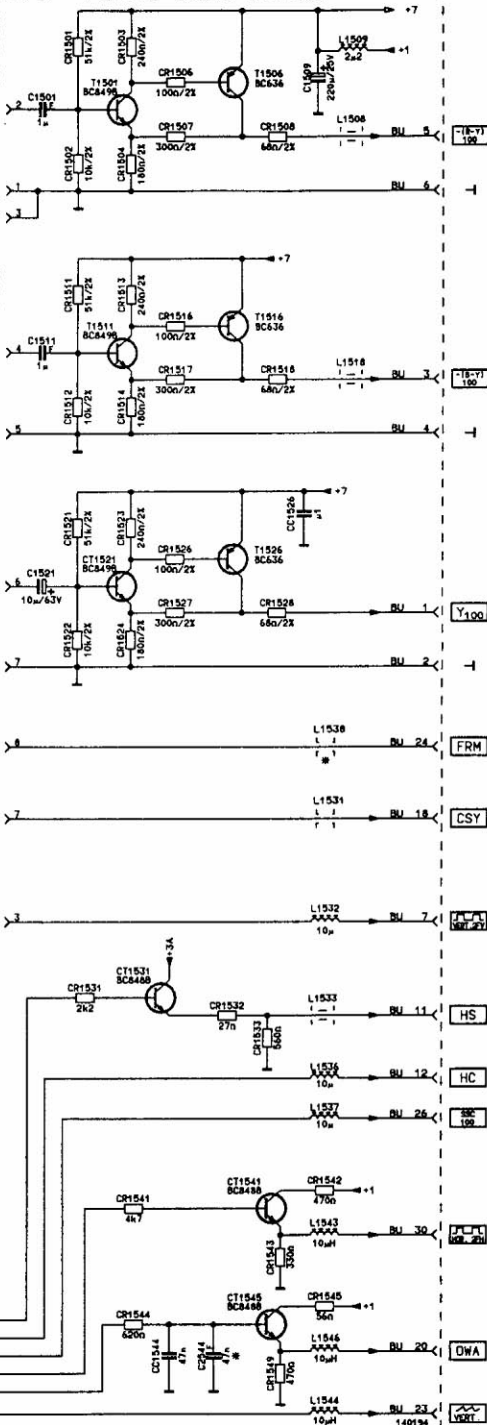
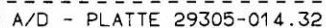
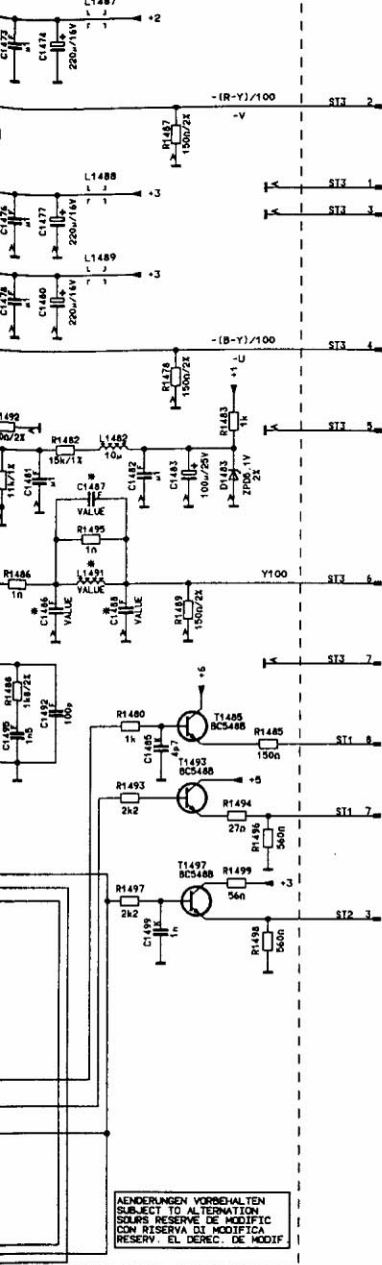
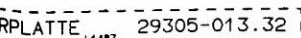


* NUR VORGESCHEN

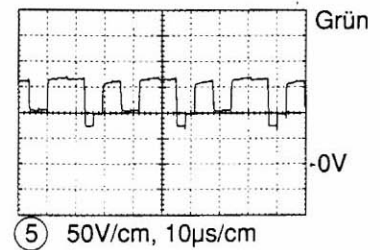
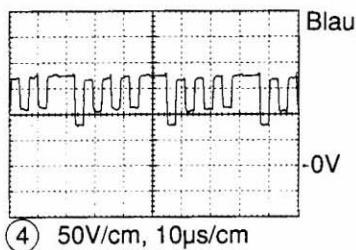
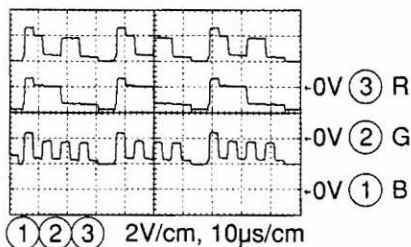
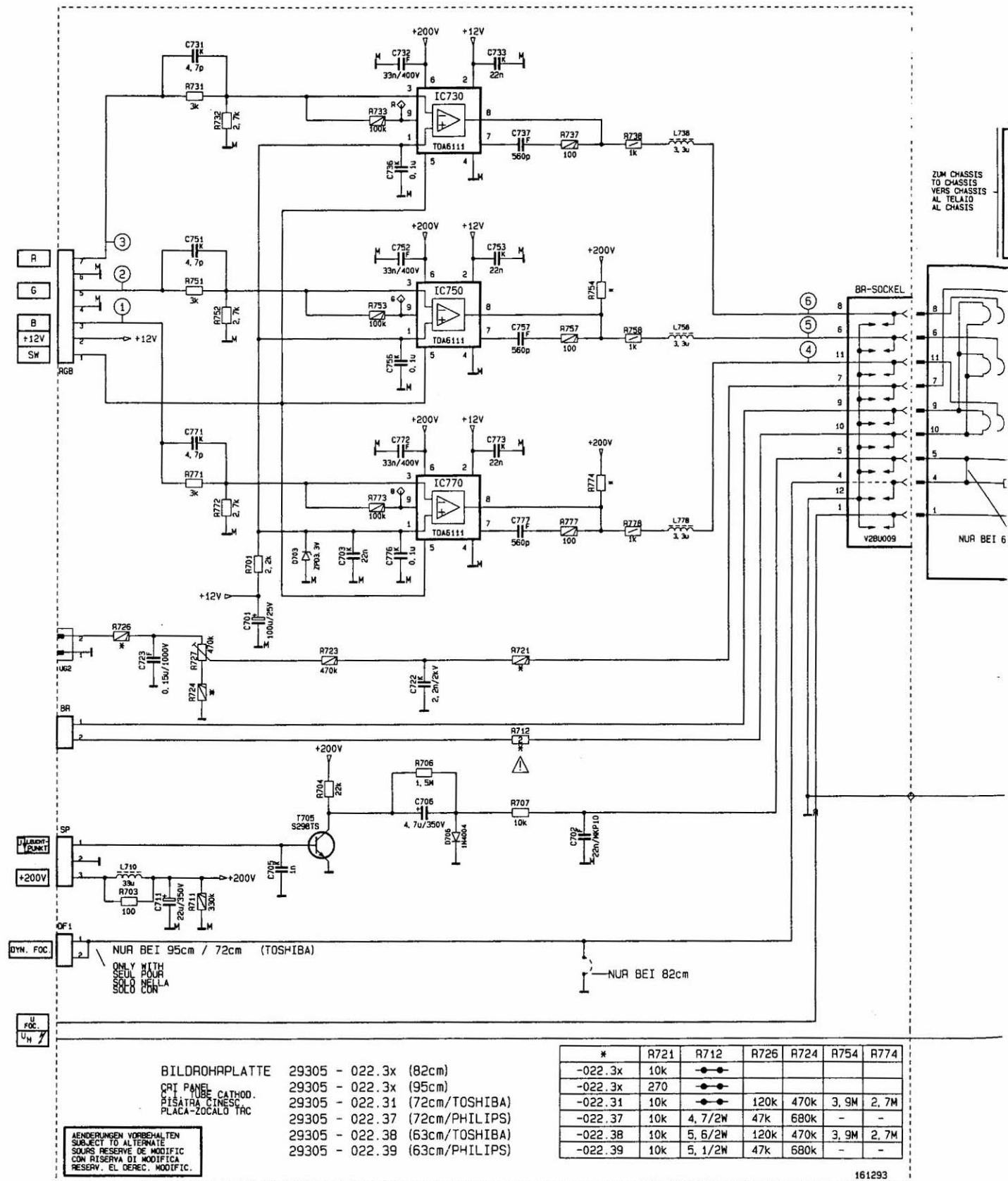
PLCC44

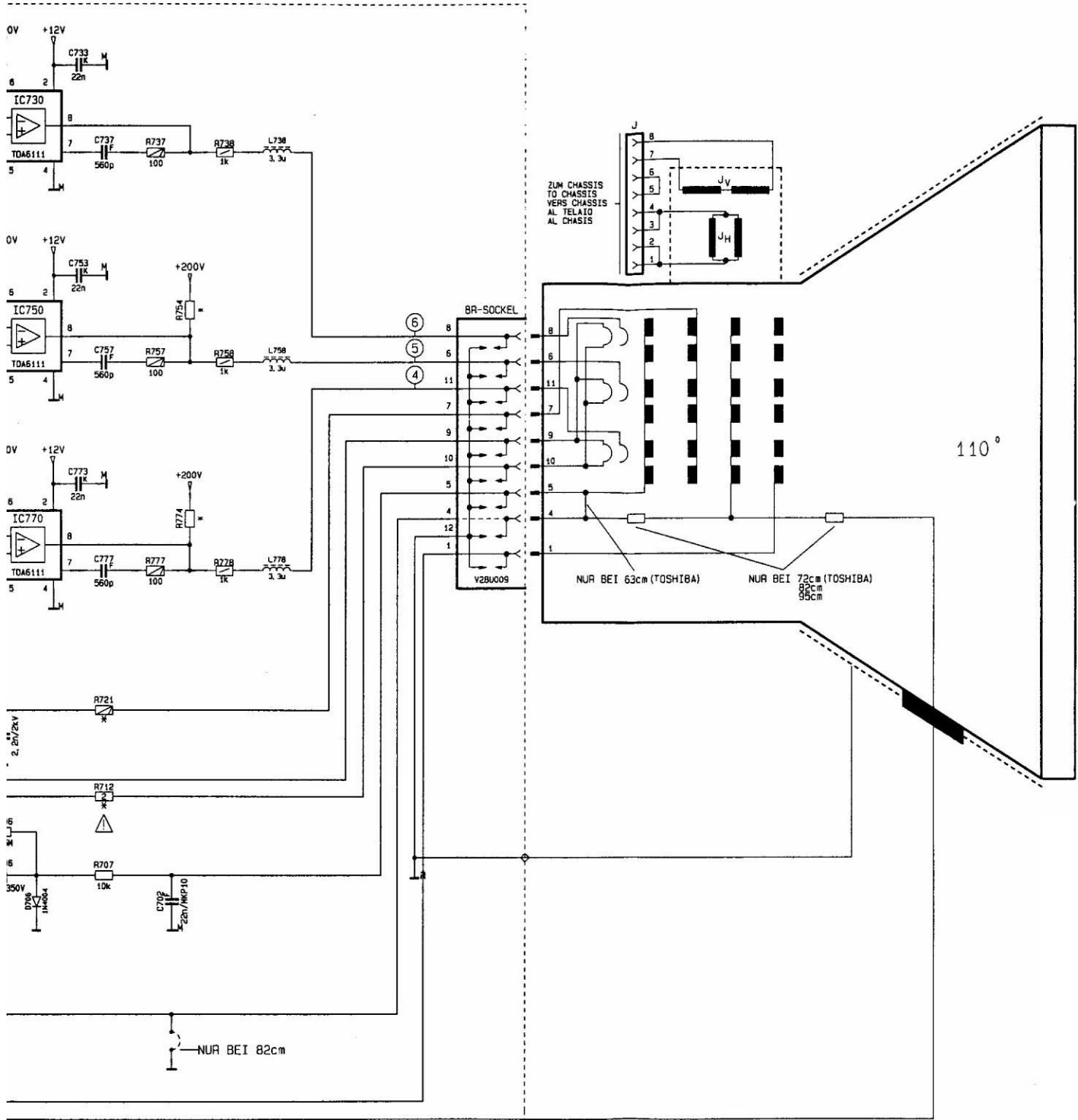






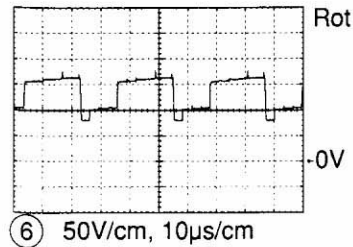
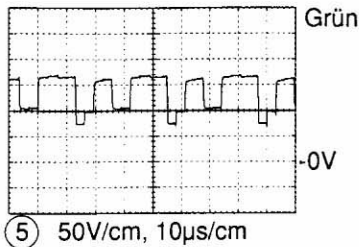
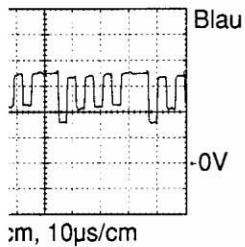
	BU-	ST1	ST2	ST3
01	Y/100 →	MASSE	HS2	MASSE ANALOG
02	MASSE	MASSE	YS2	-(R-Y)/100
03	-(B-Y)/100 →	SCL	VERT. 2FV	MASSE ANALOG
04	MASSE	SDA	+1/12V	-(B-Y)/100
05	-(R-Y)/100 →	BLN	+3/5V	MASSE ANALOG
06	MASSE	MASSE	MASSE	Y/100
07	VERT. 2FV →	CSY	MASSE	MASSE ANALOG
08	→ +H (+4/5V)	FRM	+2/5V	
09	→ +F (+2/5V)	RES	+2/5V	
10	→ +F (+2/5V)	VS	+2/5V	
11	+B →	MASSE		
12	HC →	LL1.5X		
13	MASSE	MASSE		
14	→ SCL	MASSE		
15	MASSE	LL3		
16	→ SDA →	MASSE		
17	MASSE	D-Y7		
18	CSY →	D-Y6		
19	MASSE	D-Y5		
20	DWA →	D-Y4		
21	MASSE	D-Y3		
22	→ VG	D-Y2		
23	VERT. ~~~~~	D-Y1		
24	FRM →	D-Y0		
25	→ IBEAM	D-U1		
26	SSC/100 →	D-U0		
27	→ SS	D-V1		
28	→ ~~~ REF	D-V0		
29	MASSE	MASSE		
30	HOR. 2FH →	MASSE		
31	MASSE			
32	→ +N (+3/5V)			
33	→ +N (+3/5V)			
34	→ BAS			
35	FREI			
36	→ +B (+1/12V)			
37	MASSE			
38	MASSE ANALOG			
39	→ Y50			
40	MASSE ANALOG			
41	→ - (B-Y)/50			
42	MASSE ANALOG			
43	→ - (R-Y)/50			





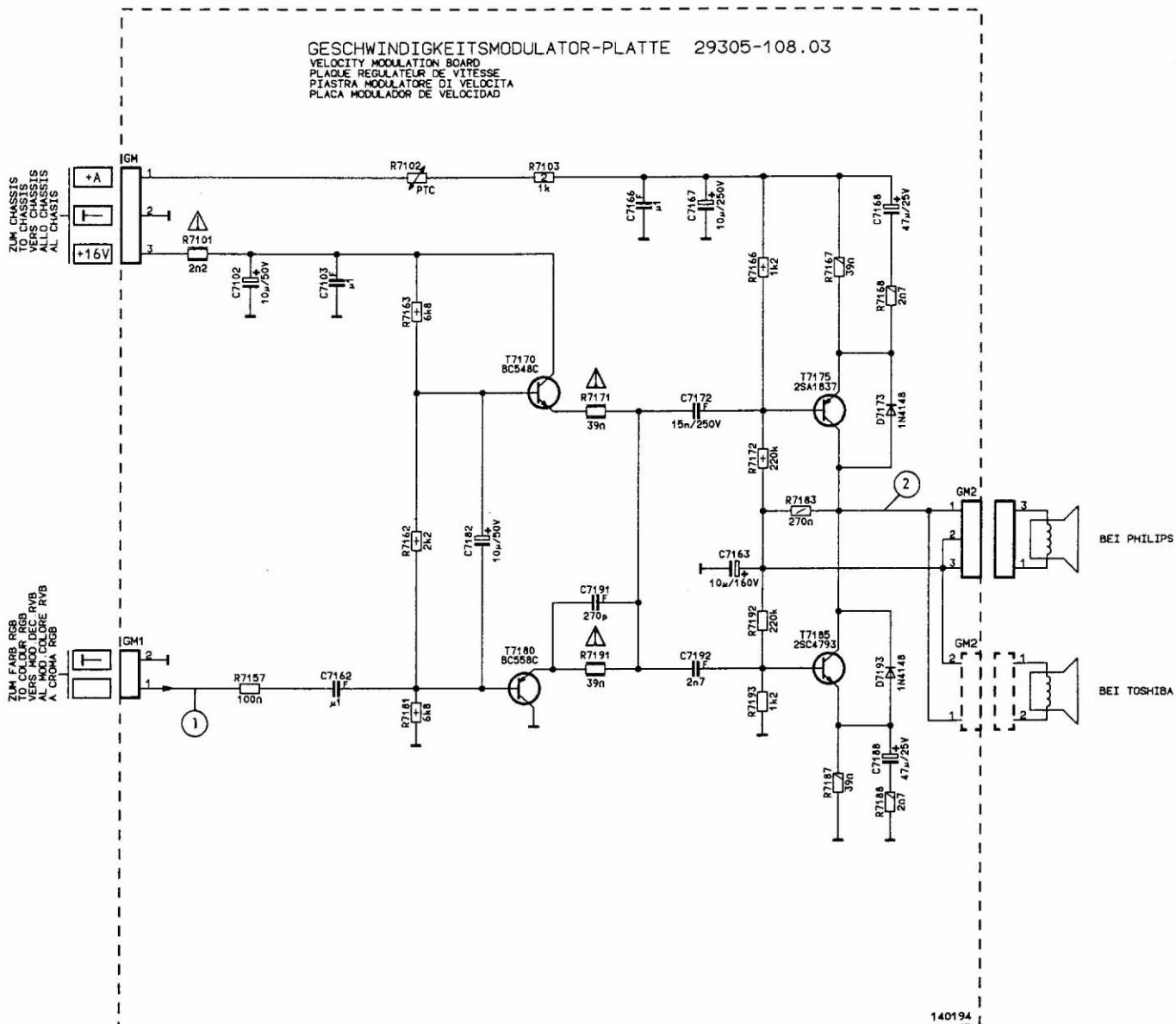
	*	R721	R712	R726	R724	R754	R774
cm)	-022.3x	10k	●—●				
cm)	-022.3x	270	●—●				
cm/TOSHIBA)	-022.31	10k	●—●	120k	470k	3, 9M	2, 7M
cm/PHILIPS)	-022.37	10k	4, 7/2W	47k	680k	—	—
cm/TOSHIBA)	-022.38	10k	5, 6/2W	120k	470k	3, 9M	2, 7M
cm/PHILIPS)	-022.39	10k	5, 1/2W	47k	680k	—	—

161293

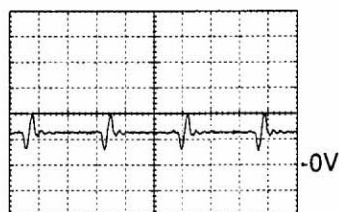


Velocity Modulation Board

Servicearbeiten nach Bausteinwechsel: keine
Servicing work after replacing the module: none



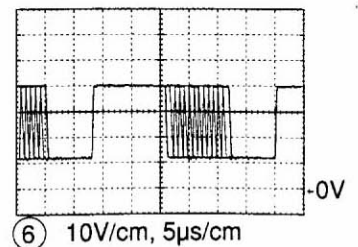
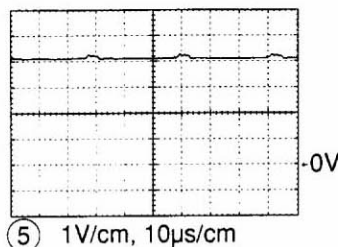
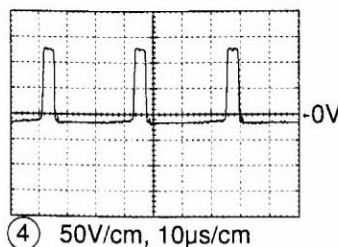
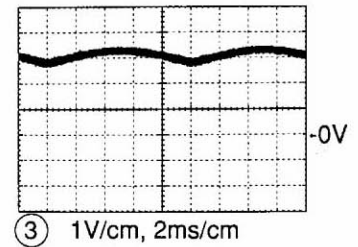
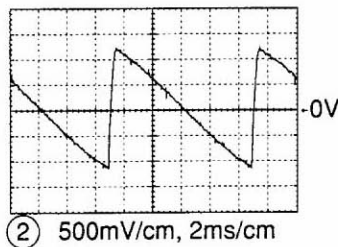
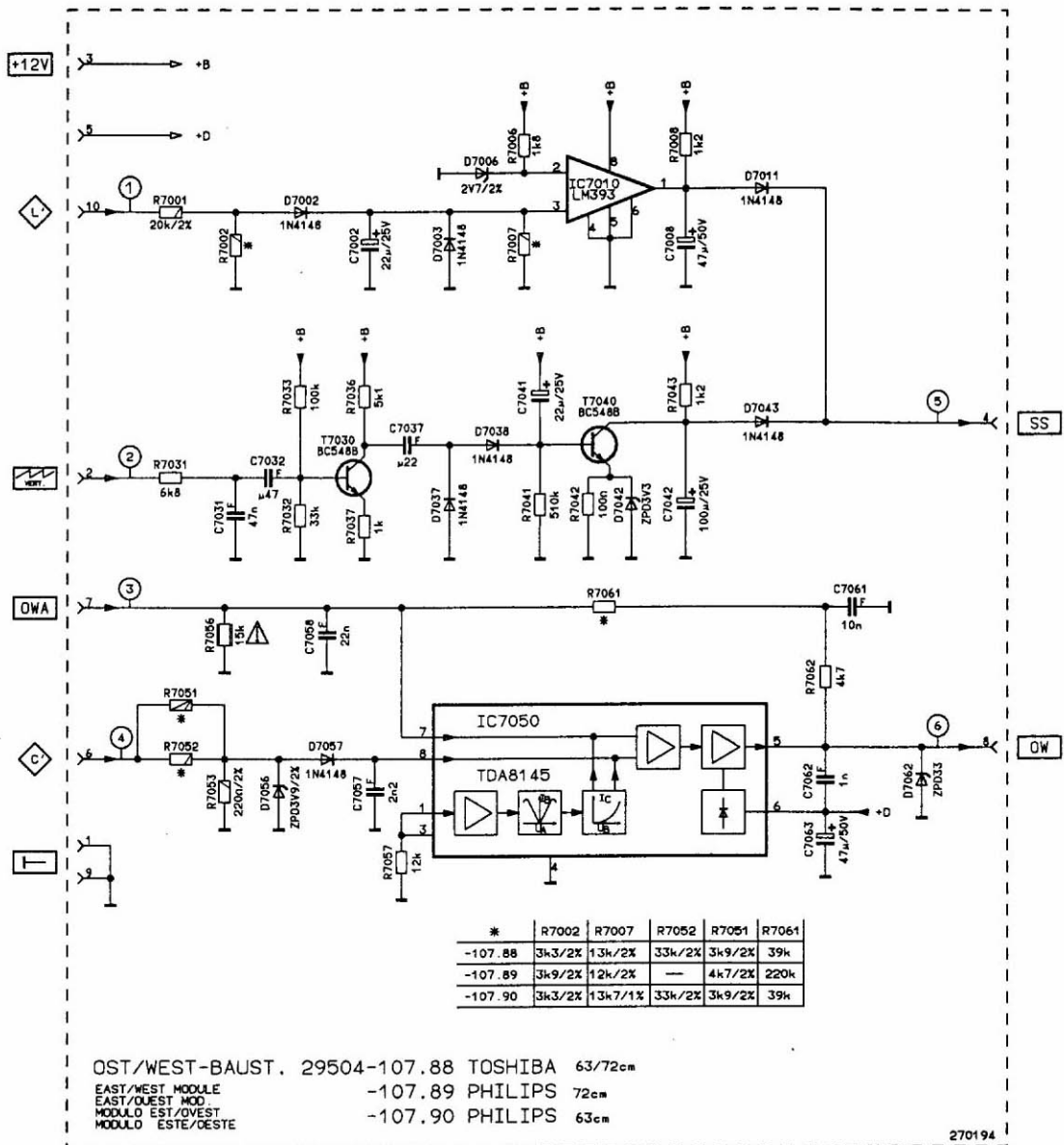
DRUCK 29304-786.03



① 5V/cm, 500ns/cm
mit Gittermuster
with grid pattern



② 20V/cm, 500ns/cm



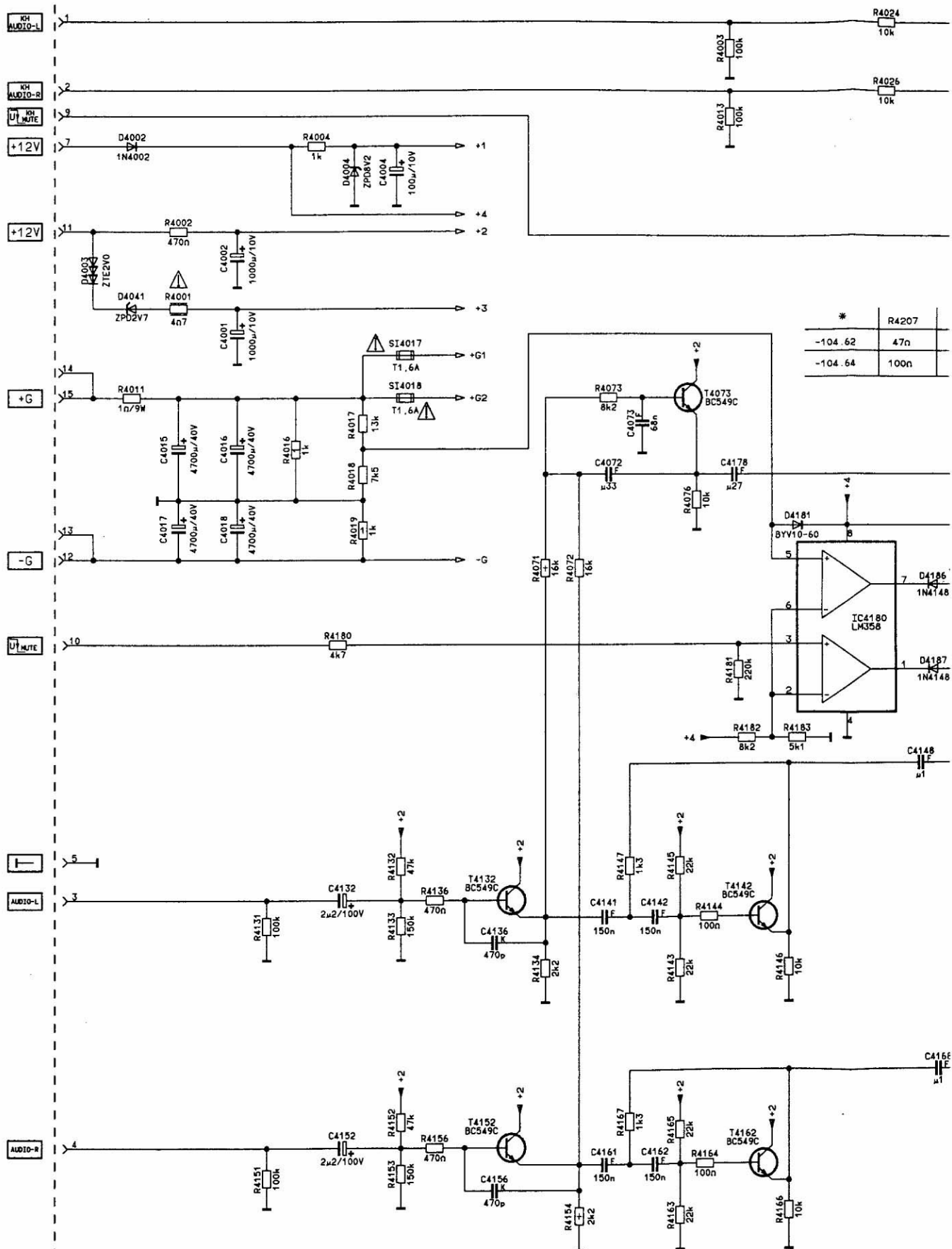
AF Amplifier

Servicearbeiten nach Bausteinwechsel: keine
Servicing work after replacing the module: none

NF-VERSTÄRKER 29504-104.62

AF AMPLIFIER
AMPLI. BF
BF AMPLI.
AMPL. DE BF

-104.64

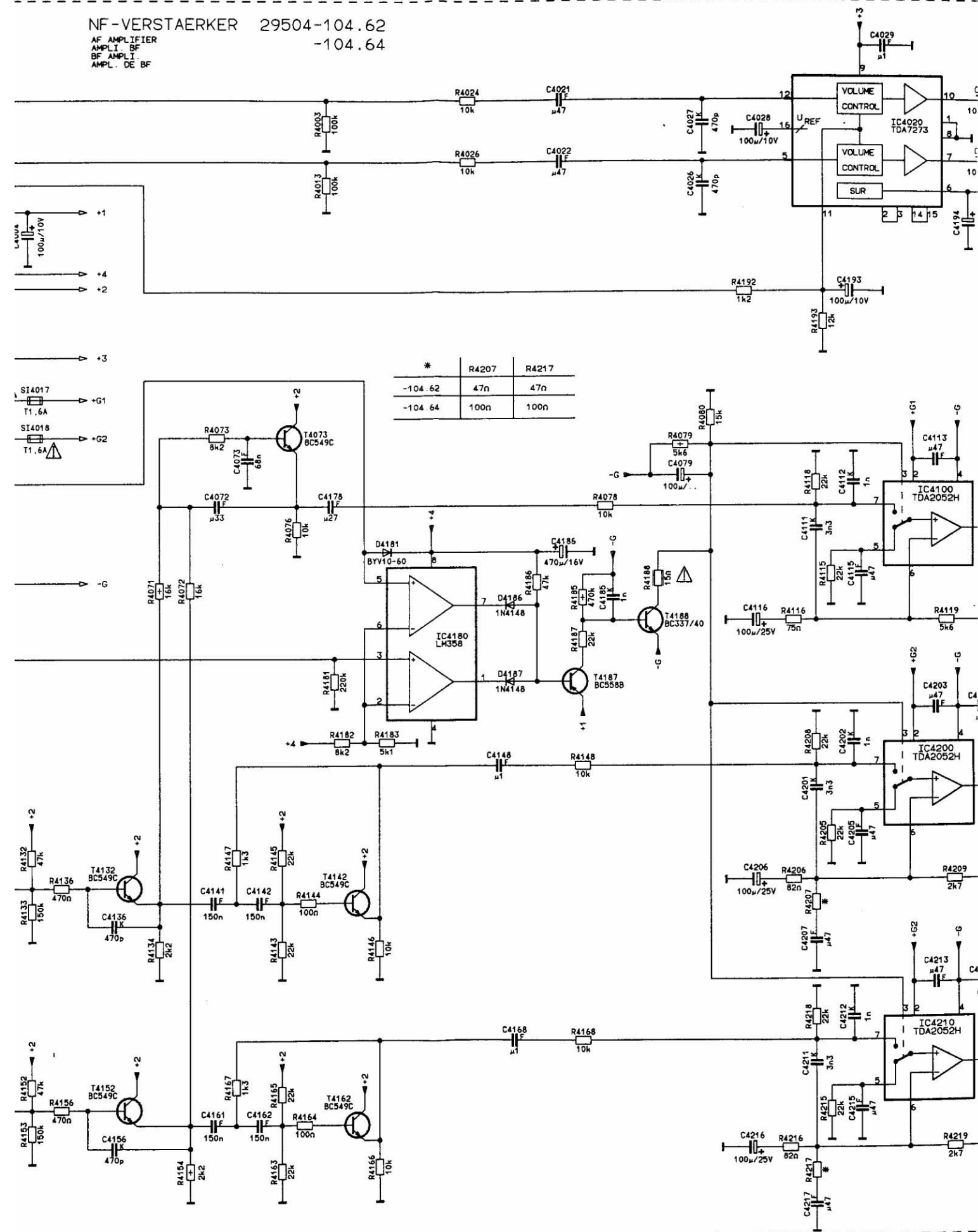


Servicearbeiten nach Bausteinwechsel: keine
Servicing work after replacing the module: none

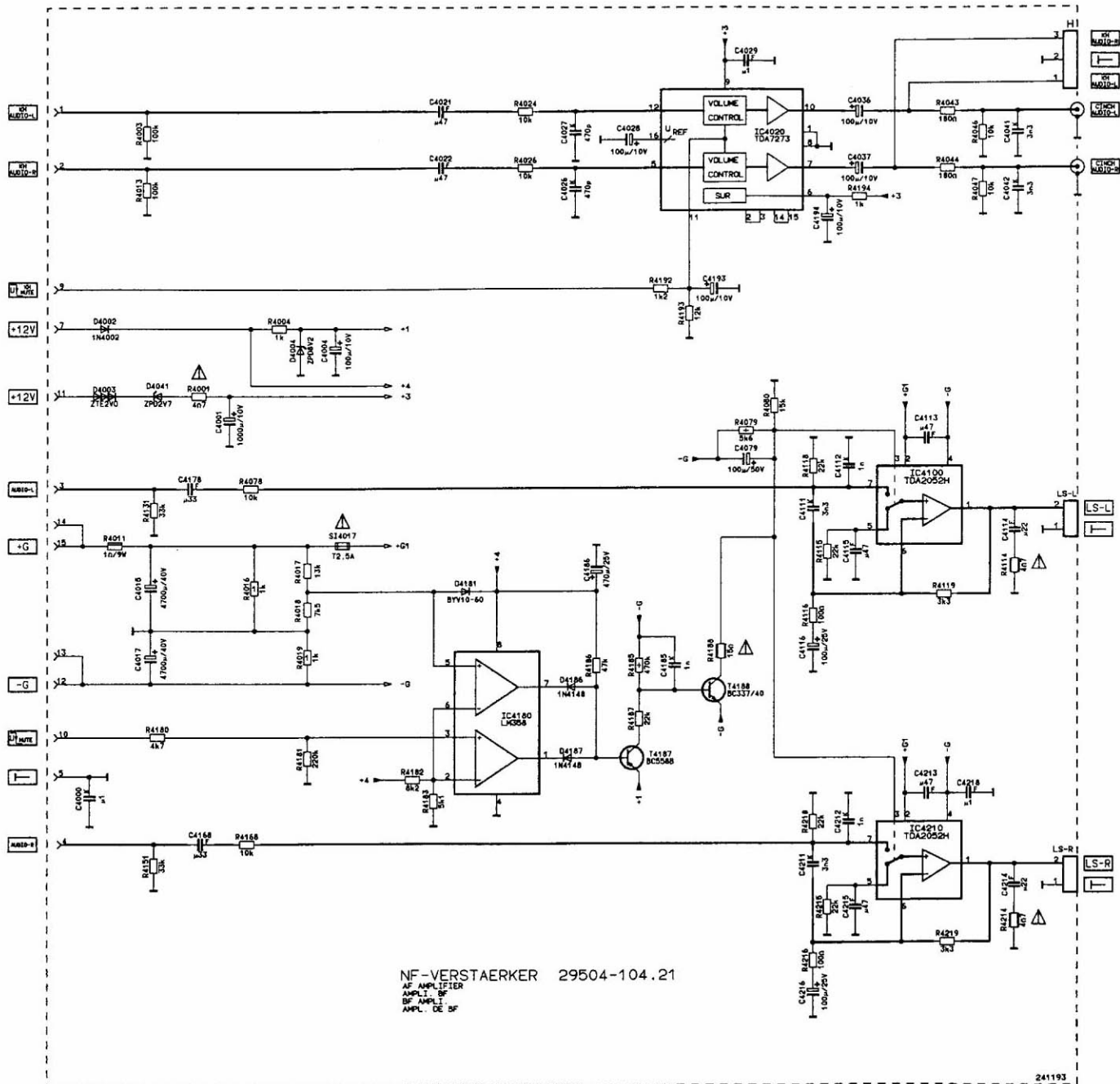
NF-VERSTAERKER 29504-104.62

AF AMPLIFIER
AMPLI. BF
BF AMPLI.
AMPL. DE BF

-104.64



Servicearbeiten nach Bausteinwechsel: keine
Servicing work after replacing the module: none



NF-ENDSTUFE 2x25W 29504-104.26

AF-OUTPUT STAGE
PRISE B.F.
STADIO FINALE BF
PASO FINAL FB

