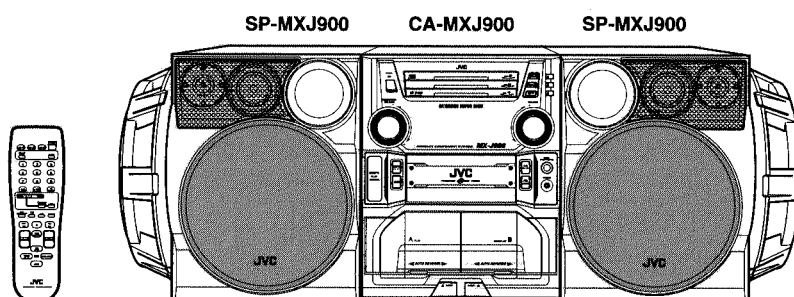


JVC

SERVICE MANUAL

COMPACT COMPONENT SYSTEM

MX-J900 MX-J950R



Area Suffix

J	U.S.A.
C	Canada
B	U.K.
E	Continental Europe
EN	Northern Europe
U	Other Areas

This Illustration is MX-J900

COMPACT
disc
DIGITAL AUDIO



Only MX-J950R(B/E/EN)

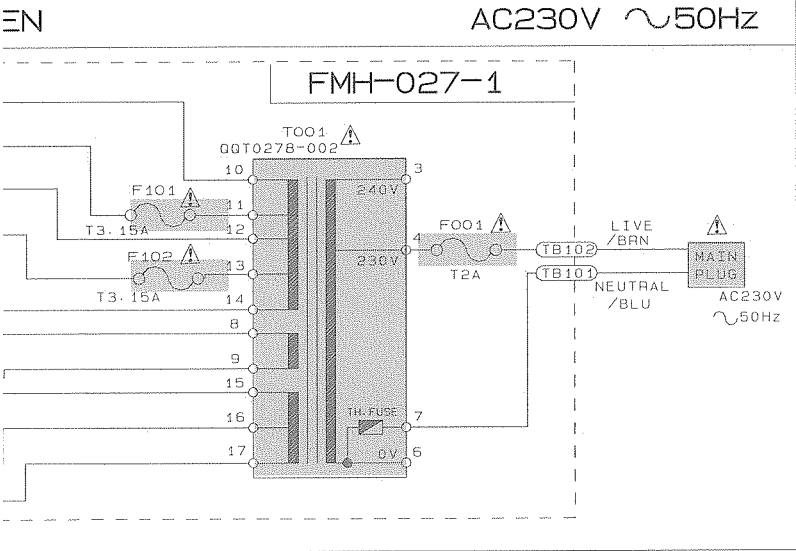
Each difference point

Model	CD/DECK/RECEIVER	SPEAKER	RDS	MIC	Packing method
MX-J900(J/C)	CA-MXJ900	SP-MXJ900	—	—	together
MX-J900(U)	CA-MXJ900	SP-MXJ900	—	○	another
MX-J950R(B/E/EN)	CA-MXJ950R	SP-MXJ950R	○	—	another

Contents

Safety precautions	1-2	Flow of functional operation	
Important for laser products	1-3	until TOC read	2-29
Preventing static electricity	1-4	Maintenance of laser pickup	2-30
Precautions at disassembling		Replacement of laser pickup	2-30
and parts replacement	1-5	Description of major ICs	2-31
Instructions(CA-MXJ950R)(SP-MXJ950R) ---	1-6~16	Block diagrams	2-49
Disassembly method	2-1	Standard schematic diagrams	2-51
Adjustment method	2-24	Printed circuit boards	2-60~64
Diagnosis which uses		Parts list	3-1~33
extension wire method	2-28		

SUPPLY BLOCK



VERSION CODES	
J	:U. S. A.
C	:CANADA
B	:U. K.
E	:CONTINENTAL EUROPE
EN	:NORDIC COUNTRIES
U	:UNIVERSAL EXCEPT ALL OF ABOVE

50Hz

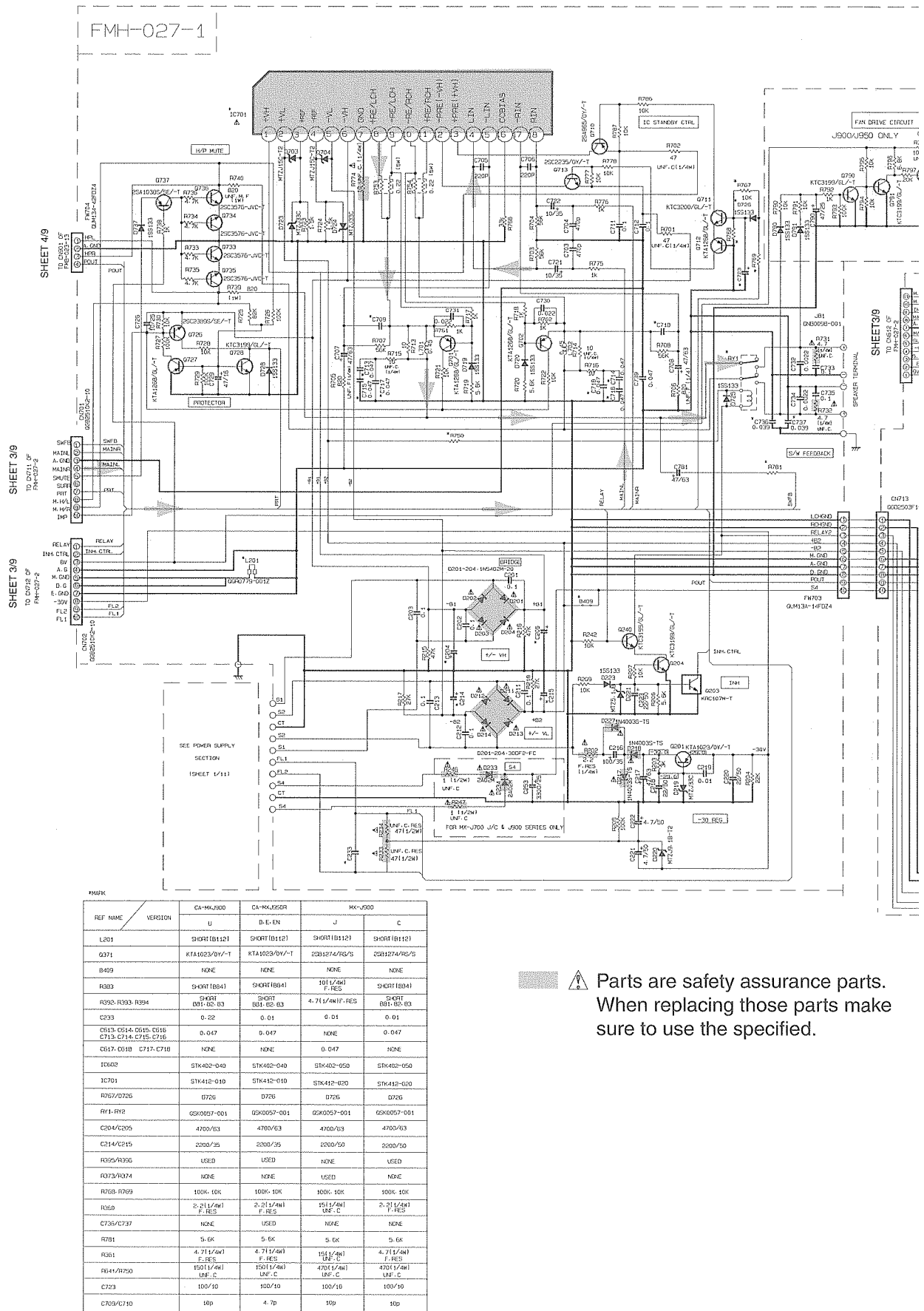
220V/50Hz

 Parts are safety assurance parts.
When replacing those parts make sure to use the specified.

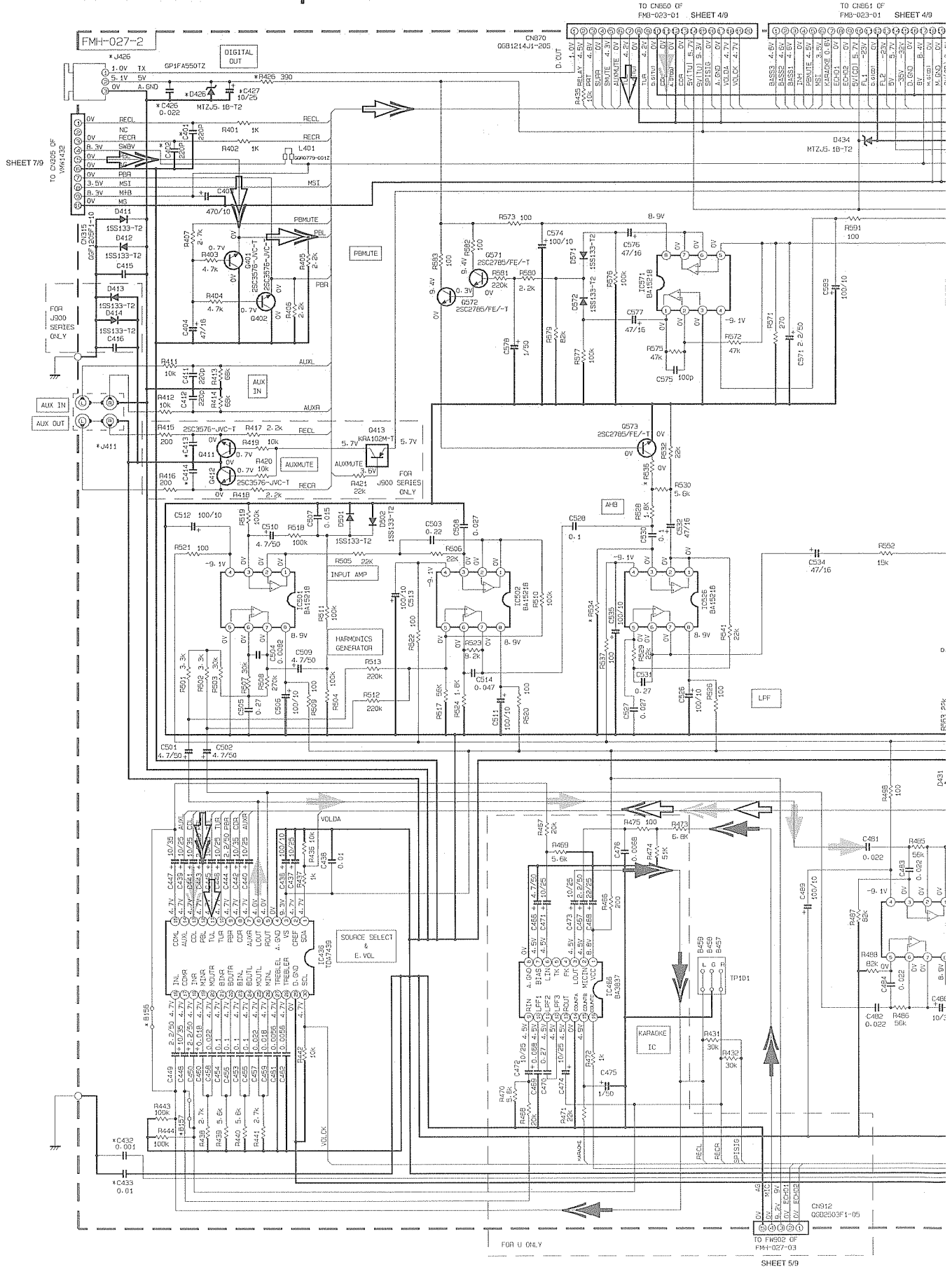
EXPLANATION OF OVERALL OF SCHEMA.	
MODEL	CA-MXJ900/CA-MXJ950R/MX-J900/MX-J950R

SHEET NUMBER	MODEL NUMBERS TO BE APPLIED	CIRCUITS DESCRIPTION
1/9	CA-MXJ900/CA-MXJ950R MX-J900/MX-J950R	.PRIMARY WITH MAINS TRANSFORMER
2/9	CA-MXJ900/CA-MXJ950R MX-J900/MX-J950R	.DC REGULATORS/AUDIO OUTPUT
3/9	CA-MXJ900/CA-MXJ950R MX-J900/MX-J950R	.EXTERNAL INPUT, SOURCE SELECTOR SWITCH
4/9	CA-MXJ900/CA-MXJ950R MX-J900/MX-J950R	.FL DISPLAY, SYSTEM CONTROL LSI, USER CONTROL KEYS
5/9	CA-MXJ900	.MIC AMP, ECHO CIRCUIT (ONLY FOR U)
6/9	CA-MXJ900/CA-MXJ950R MX-J900/MX-J950R	.CD SERVO AND CD SYSTEM CONTROL .CD CHANGER MECHANISM CONTROL
7/9	CA-MXJ900/CA-MXJ950R MX-J900/MX-J950R	.TAPE DECK MECHANISM CONTROL .TAPE CIRCUITS SUCH AS PRE-AMP AND BIAS
8/9	CA-MXJ900/CA-MXJ950R	.TUNER RF/IF/FM MULTIPLEX (ONLY FOR B, E, EN)
9/9	CA-MXJ900 MX-J900	.TUNER RF/IF/FM MULTIPLEX (ONLY FOR C, J, U)

Power amplifier & regulator section



■ Function & Main amplifier section



A

B

C

D

5

4

3

2

1

FOR U.04.Y

SHEET 5/9



* MAFIC

	MODEL	CA-MXJ300	CA-MXJ350R	MX-J350
	VERSION	U	B-E-EN	C-J
DIGITAL OUT	C426	USED	USED	USED
	C427	USED	USED	USED
	D426	USED	USED	USED
	J426	USED	USED	USED
	R426	USED	USED	USED
	C401	NONE	USED	NONE
	C402	NONE	USED	NONE
	C415	1000p	0.0022	100p
	C416	0.0022	0.0022	100p
	C432	NONE	USED	NONE
ENC	C433	NONE	USED	NONE
	L401	SHORT	USED	SHORT
	B156	USED	NONE	NONE
	B157	USED	NONE	NONE
	C413	220p	0.001	220p
	C414	220p	0.001	220p
	J411		GW0132-001	
	R534		220k	
	R536		12k	
OTHERS				

SHEET 2/9

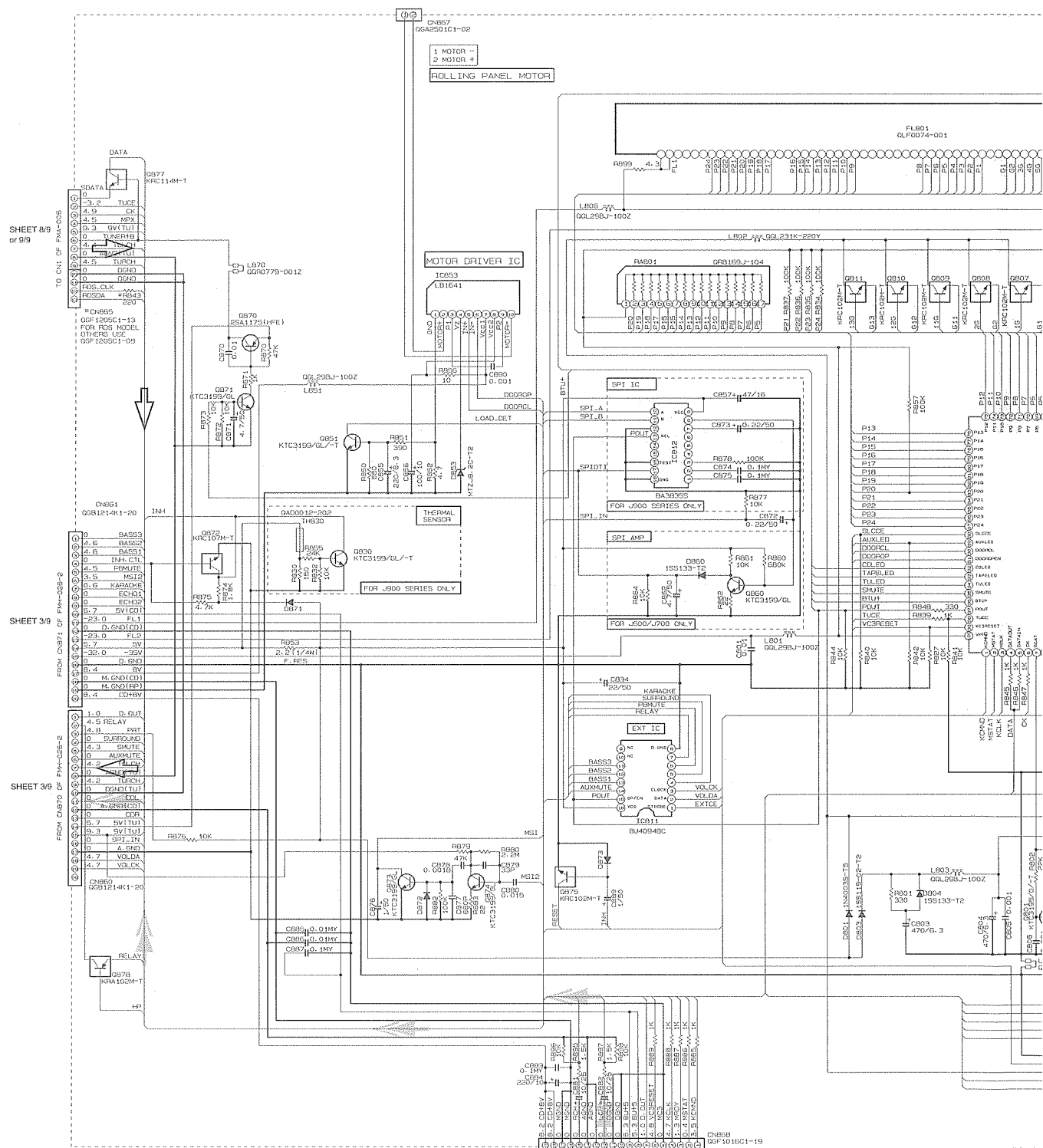
SHEET 2/9

NOTES

1. VOLTAGES ARE DC-MEASURED WITH A DIGITAL VOLT METER OR OSCILLOSCOPE WITHOUT INPUT SIGNAL.
CONDITION --- AUX MODE, VOL MIN, SUBSCOOPER VOL 1.
2. UNLESS OTHERWISE SPECIFIED
RESISTORS ARE 1/4W 1% CARBON RESISTOR.
ALL RESISTANCE VALUES ARE IN OHM(Ω).
ALL CAPACITORS ARE CERAMIC CAPACITOR OR MILAR CAPACITOR.
ALL CAPACITANCE VALUES ARE IN PICO(μ).
ALL INDUCTANCE VALUES ARE IN MILLI(m).
ALL CAPACITORS ARE SHOWN IN THE FORM OF CAPACITANCE (μ F)/RATED VOLTAGE (V).
ALL DIODES ARE 1SS139

-  CD signal
-  TAPE P.B. signal
-  TUNER signal
-  MAIN signal
-  MIC signal

■ FL Display & system controller section

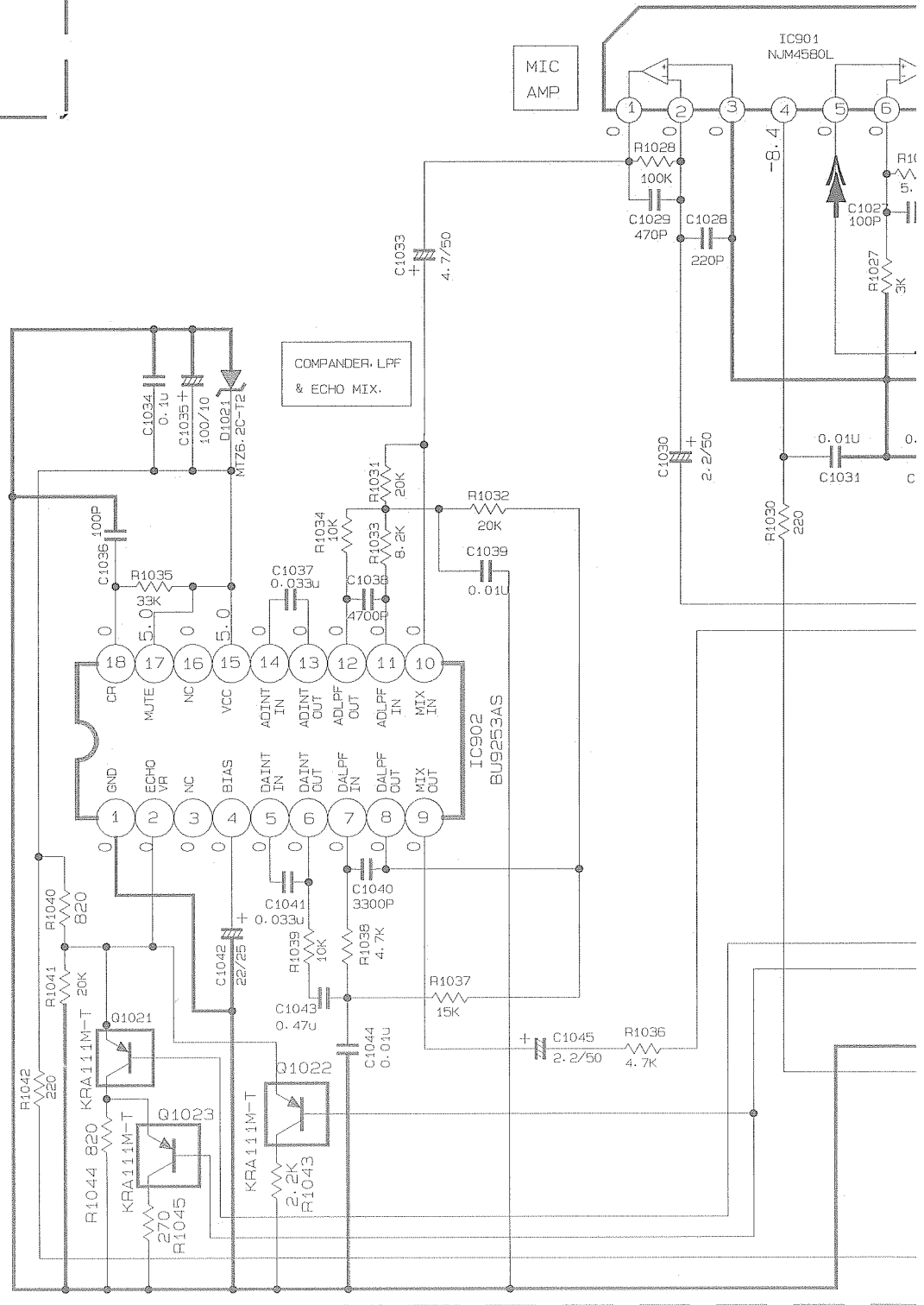


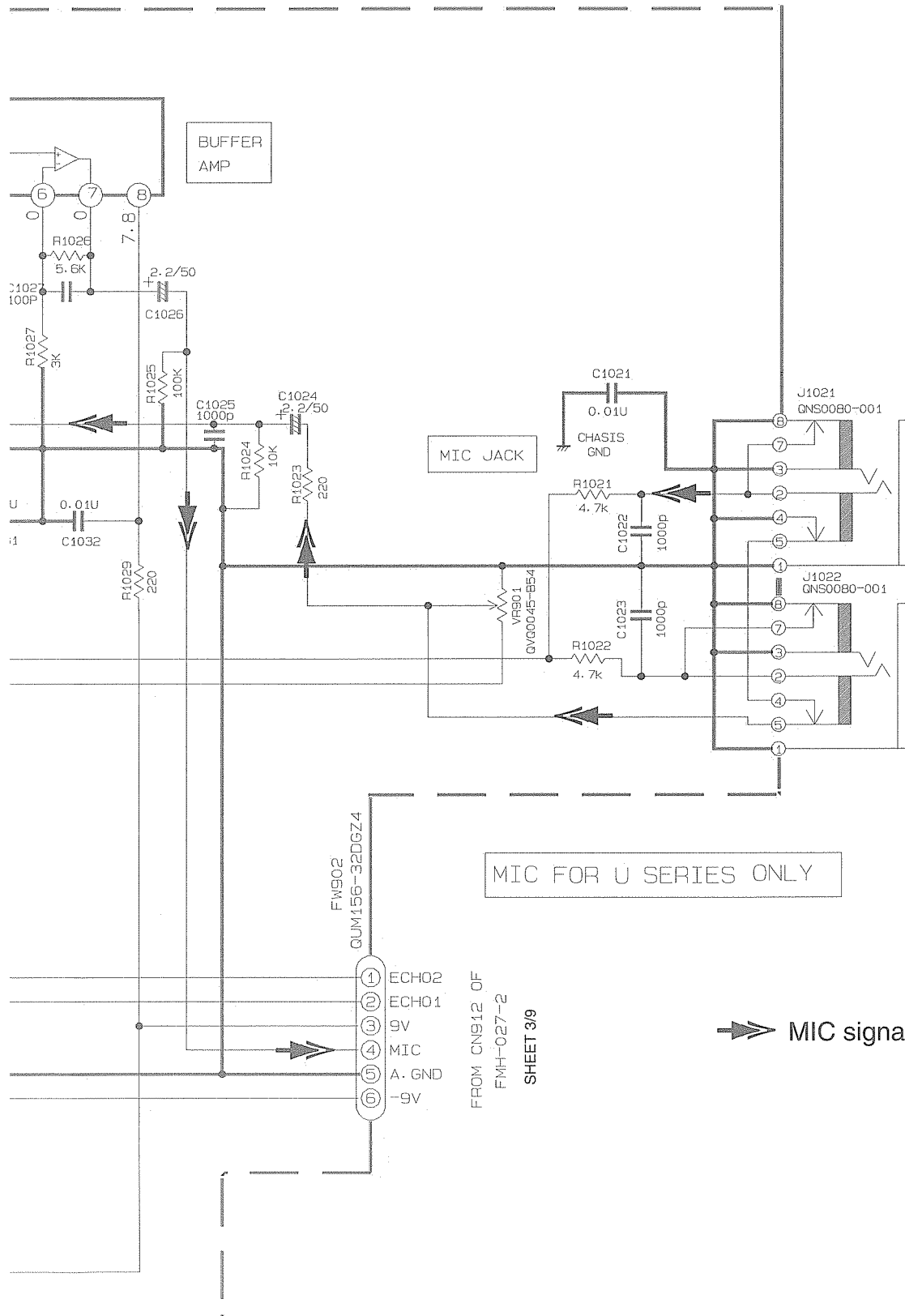
	CA-MX500 U	MX-U500 C-J	CA-MX500R S-E-EN
R904	18K	18K	18K
R991	75K	75K	330K
R993	75K	75K	75K
R994	330K	75K	330K
D902-D902-D951-D991	SLA-576J13F	SLA-576J13F	SLA-576J13F
D952-D994-D9503-D993	SLA-576J13F	SLA-576J13F	SLA-576J13F
D990-D997-D999-D999	75	75	75
D990-D991	KPC-T	KPC-T	KPC-T
D941-D942-D943-D944	NP0T	NP0T	02940003-D012
L1001-L1002	SH0RT	SH0RT	012-231K-0012
C1001-C1002	NONE	NONE	3600P
L1003	Q0L231K-0012Y	Q0L231K-0012Y	02907231K-0012
R025-R035	USE	USE	USE
R040	USE	USE	USE
X001	0AX0003-0012	0AX0003-0012	0AX0003-0012

TO CNSS1 GR EMW10729
ICD CHANGER)
SHEET 6/9

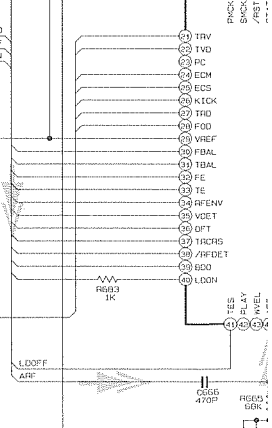
■ Microphone amplifier section

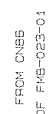
FMH-027-3





D





SHEET 4/9

CD signal

CD CONTROL & SERVO CIRCUIT

SHEET 6/9

EMW10729

A horizontal number line with five tick marks labeled D, E, F, G, and H from left to right. The line is divided into four equal segments by these points.

Head amplifier & Mechanism control section

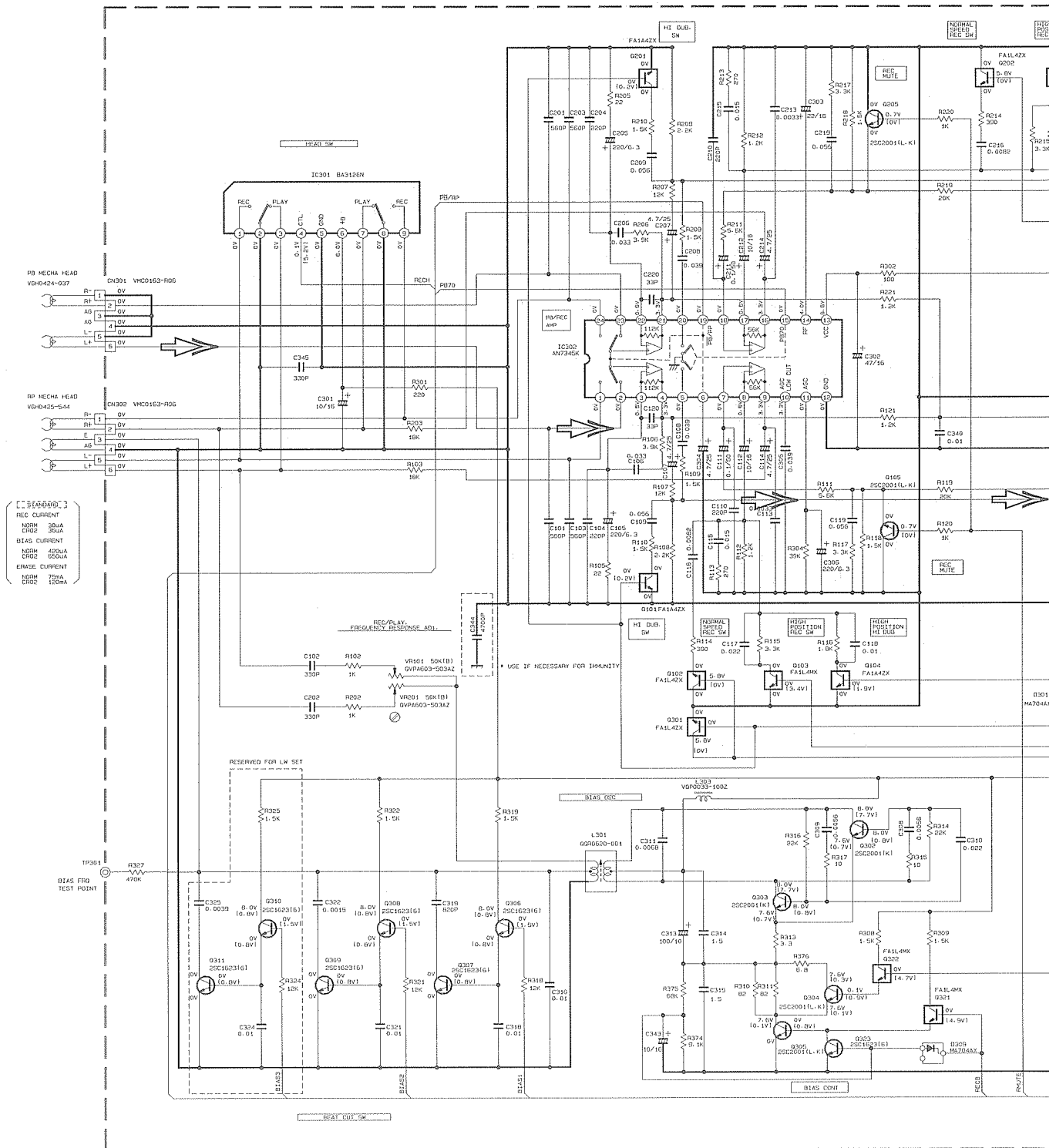
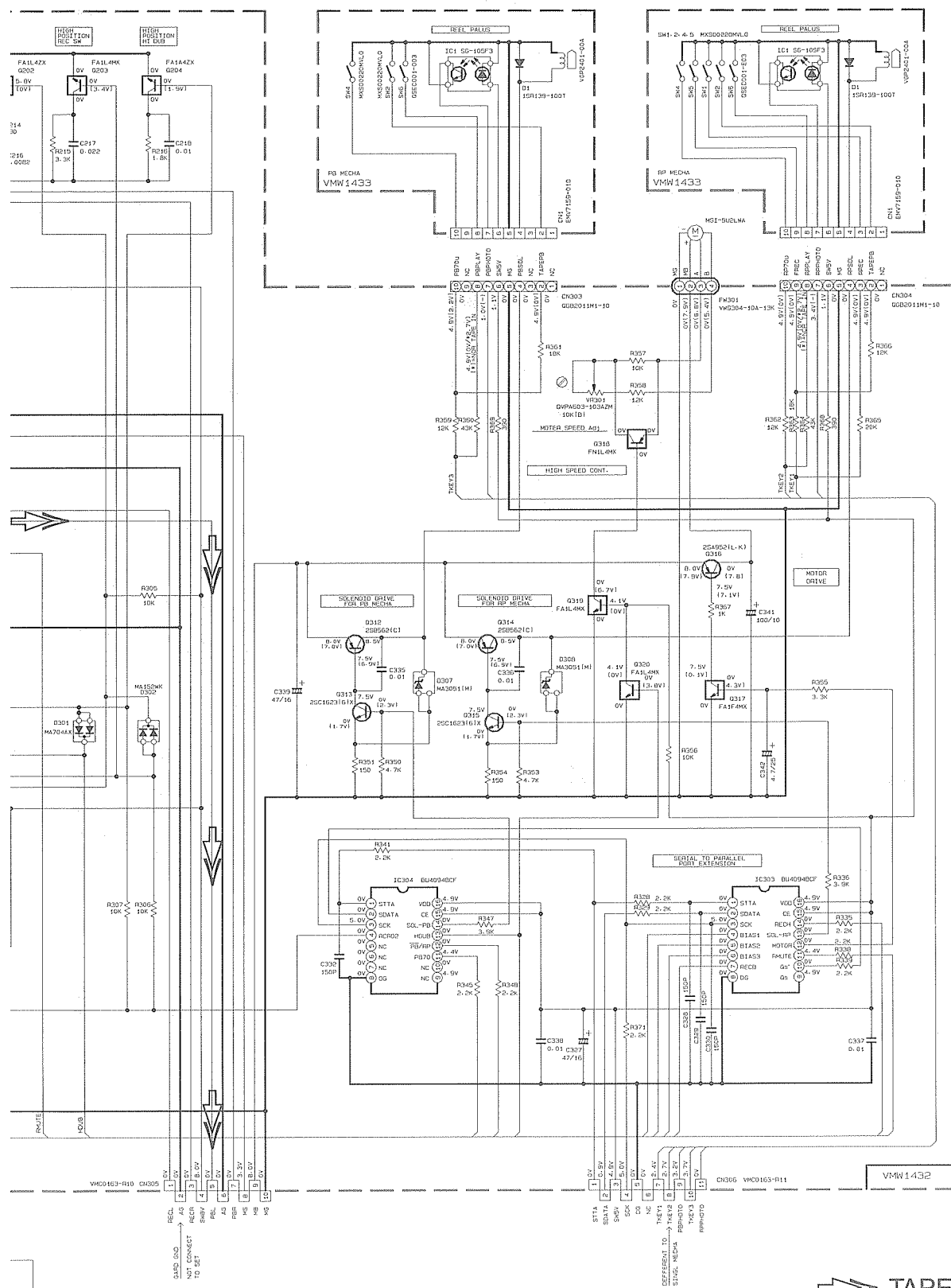


TABLE 1: DIGITAL TR LIST

PART NO	CONSTRUCTION	REF. NO		
FA14M		Q316	FA14M	Q317
FA14Z		Q101/Q201 Q104/Q204	FA14M	Q103/Q203 Q319 Q320/Q331/Q332
FA14Z		Q102/Q202 Q301		

CASSETTE MECHA CONTROL CIRCUIT [SLC]



⇒ TAPE P.B. signal

FROM PRE-AMP CIRCUIT

FROM MICON CIRCUIT

FROM CN315 OF FMH-027-2

FROM CN869 OF FMB~023~01

SHEET 3/9

SHEET 4/9

SHEET 7/9

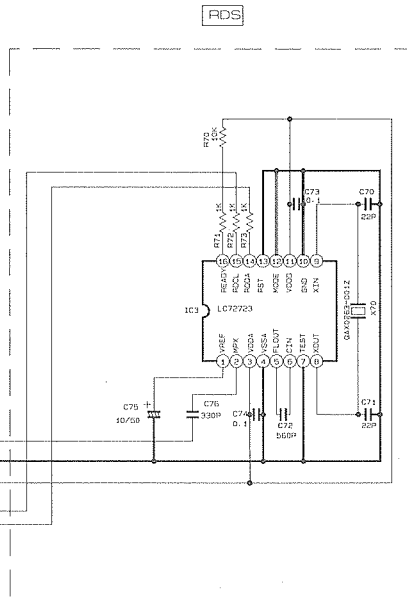
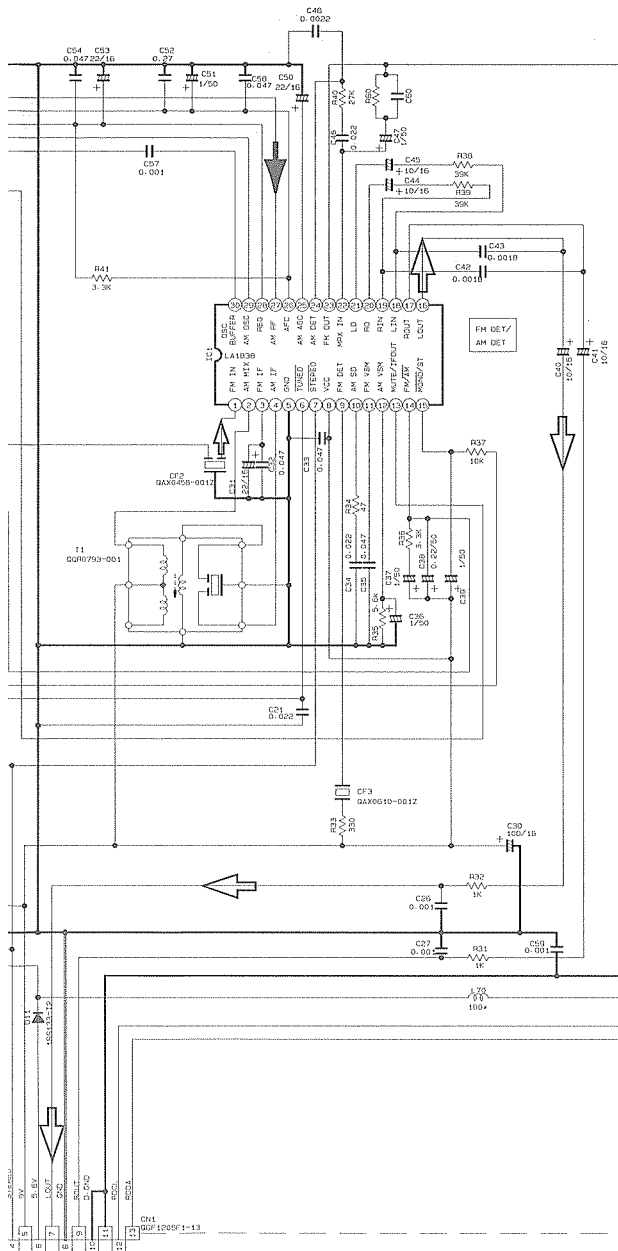
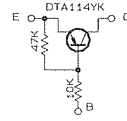
4

1

NOTES

1. VOLTAGES ARE DC-MEASURED WITH A DIGITAL VOLT METER.
2. ALL RESISTORS ARE 1/8W ±5% METAL GLAZE RESISTOR.
3. ALL RESISTANCE VALUES ARE IN OHM(Ω).
4. ALL CAPASITANCE VALUES ARE IN nF(pF).
5. ALL E-CAPASITORS ARE SHOWN IN THE FORM OF CAPASITANCE (nF)/RATED VOLTAGE (V).
6. SI DIODES (▷) ARE ALL 1SS133-T THAT CAN BE CHANGED TO SIMILAR DIODE SUCH AS MA165 OR HSS104J.
7. PARTS NO. OF TRANSISTORS ARE AS FOLLOWS.
Q1 2SC2B14/4-5/-X Q2-Q3 2SC2412K/R/-X
Q4-Q5 DTA114YKA-X

8. INSIDE OF DIGITAL TRANSISTORS ARE SHOWN AS FOLLOWS.



N732 OF FM3-012-1

SHEET 4/9

Tr. NO.	Q1			Q5					
PIN NO.	E	C	B	E	C	B			
FM 87.5MHz NO SIGNAL	0	7.1	0.85	B.9	B.8	0			
AM 520KHz NO SIGNAL	0	0	0	9.0	0	8.9			
Tr. NO.	Q2			Q3			Q4		
PIN NO.	E	C	B	E	C	B	E	C	B
AM 520KHz NO SIGNAL	0	0	0.7	0	0	0.7	0	3.6	0.7
AM 144KHz NO SIGNAL	0	0	0.3	0	0.3	0.3	3.6	3.6	3.6

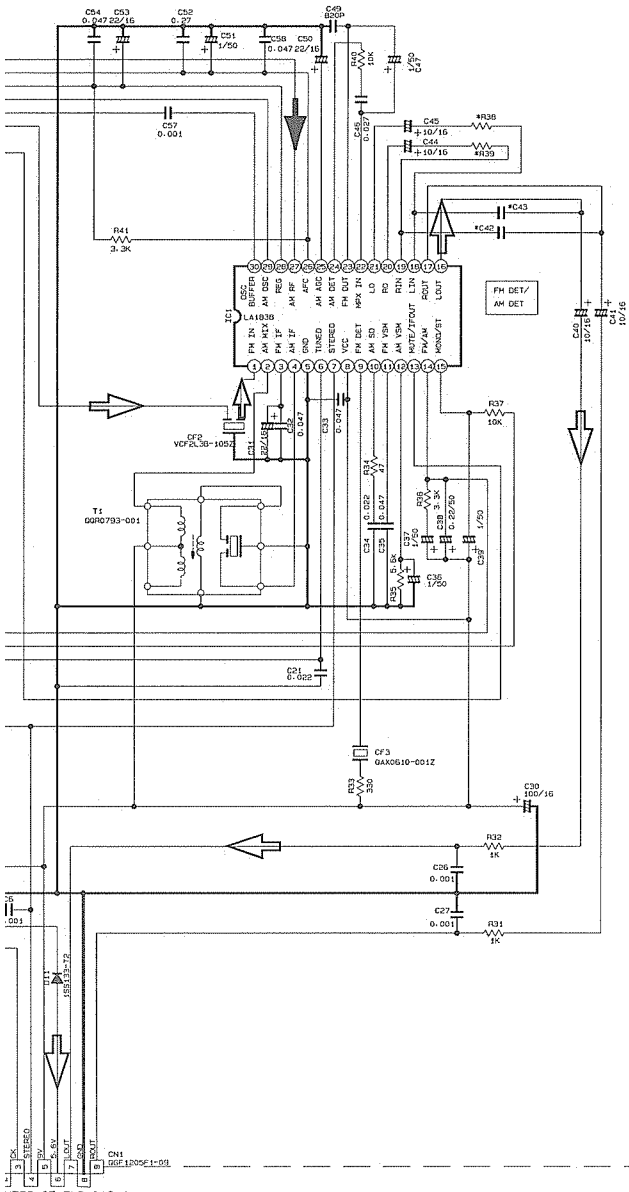
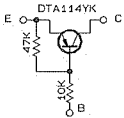
⇒ FM/TUNER signal
⇒ AM signal

SHEET 8/9

NOTES

- 1. VOLTAGES ARE DC-MEASURED WITH A DIGITAL VOLT METER.
- 2. ALL RESISTORS ARE 1/8W ±5% METAL GLAZE RESISTOR.
- 3. ALL RESISTANCE VALUES ARE IN OHM(Ω).
- 4. ALL CAPASITANCE VALUES ARE IN #F(P=pF).
- 5. ALL E. CAPASITORS ARE SHOWN IN THE FORM OF CAPASITANCE (pF)/RATED VOLTAGE (V).
- 6. SI DIODES (▷) ARE ALL 1SS133-T THAT CAN BE CHANGED TO SIMILAR DIODE SUCH AS MA165 OR HSS104J.
- 7. PARTS NO. OF TRANSISTORS ARE AS FOLLOWS.
Q1 2SC2814/4-5/-X Q2-Q3 2SC2412K/R/-X
Q4-Q5 DTA114YKA-X

B. INSIDE OF DIGITAL TRANSISTORS ARE SHOWN AS FOLLOWS.



VERSION		
	J/C	U/DOH
R38	623	623
R39	623	623
C42	0.0022	0.0015
C43	0.0022	0.0015

N732 OF FMD-012-1
SHEET 4/9

	28	29	30
51	3-6	3-6	2-7
51	3-6	3-6	2-7
101	3-6	3-6	2-1

Tr NO.	Q1			Q5					
	E	C	B	E	C	B			
FM 87.5MHz NO SIGNAL	0	7.1	0.85	8.9	8.8	0			
AM 520kHz NO SIGNAL	0	0	0	9.0	0	8.9			
Tr NO.	Q2			Q3			Q4		
	E	C	B	E	C	B	E	C	B
AM 520kHz NO SIGNAL	0	0	0.7	0	0	0.7	0	3-6	0.7
AM 1440kHz NO SIGNAL	0	0	0.3	0	0.3	0.3	3-6	3-6	3-6

⇒ FM/TUNER signal
⇒ AM signal