

Service Manual

TOYOTA

ORDER NO.
CRT4361

AUDIO SYSTEM HEAD UNIT

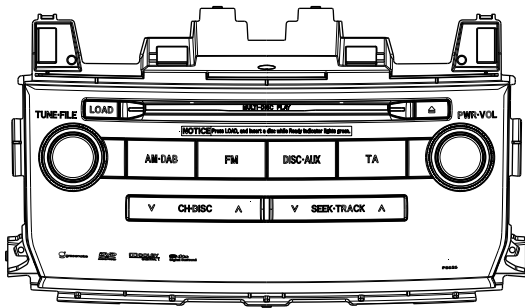
DVZ-MG9097ZT /XSEW
DVZ-MG9197ZT /XSEW
DVZ-MG9197ZT /XSRE
DVZ-G9097ZT91 /XSEW
DVZ-G9197ZT91 /XSEW
DVZ-G9197ZT91 /XSRE

VEHICLE	DESTINATION	PRODUCED AFTER	OEM PARTS No.	ID No.	PIONEER MODEL No.
LAND CRUISER	Europe	July 2009	86120-60J80	P8626	DVZ-MG9097ZT/XSEW
					DVZ-G9097ZT91/XSEW
LAND CRUISER	Europe	July 2009	86120-60G90	P8627	DVZ-MG9197ZT/XSEW
					DVZ-G9197ZT91/XSEW
LAND CRUISER	Russia	July 2009	86120-60J00	P7550	DVZ-MG9197ZT/XSRE
					DVZ-G9197ZT91/XSRE

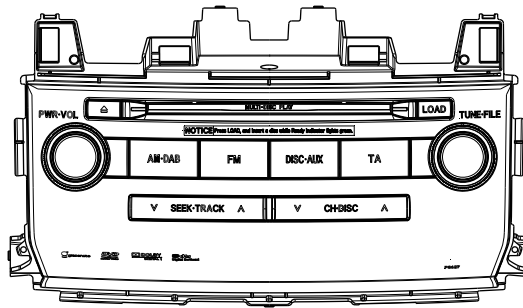
This service manual should be used together with the following manual(s) listed below.
 For the parts numbers, adjustments, etc. which are not shown in this manual,
 refer to the following manual(s).

Model No.	Order No.	Mech. Module	Remarks
DVZ-MG4587ZT/EW	CRT4240		
CX-3207	CRT4233	MG5	DVD Mech. Module:Circuit Descriptions, Mech. Over View, Disassembly, How To Assemble

A

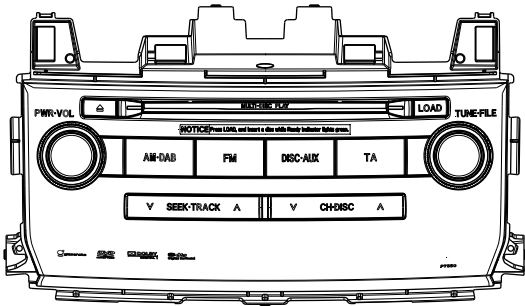


DVZ-MG9097ZT/XSEW
ID No. P8626



DVZ-MG9197ZT/XSEW
ID No. P8627

B



DVZ-MG9197ZT/XSRE
ID No. P7550

C



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D

E

Supplementary model is identical to the original except for the addition of following items.

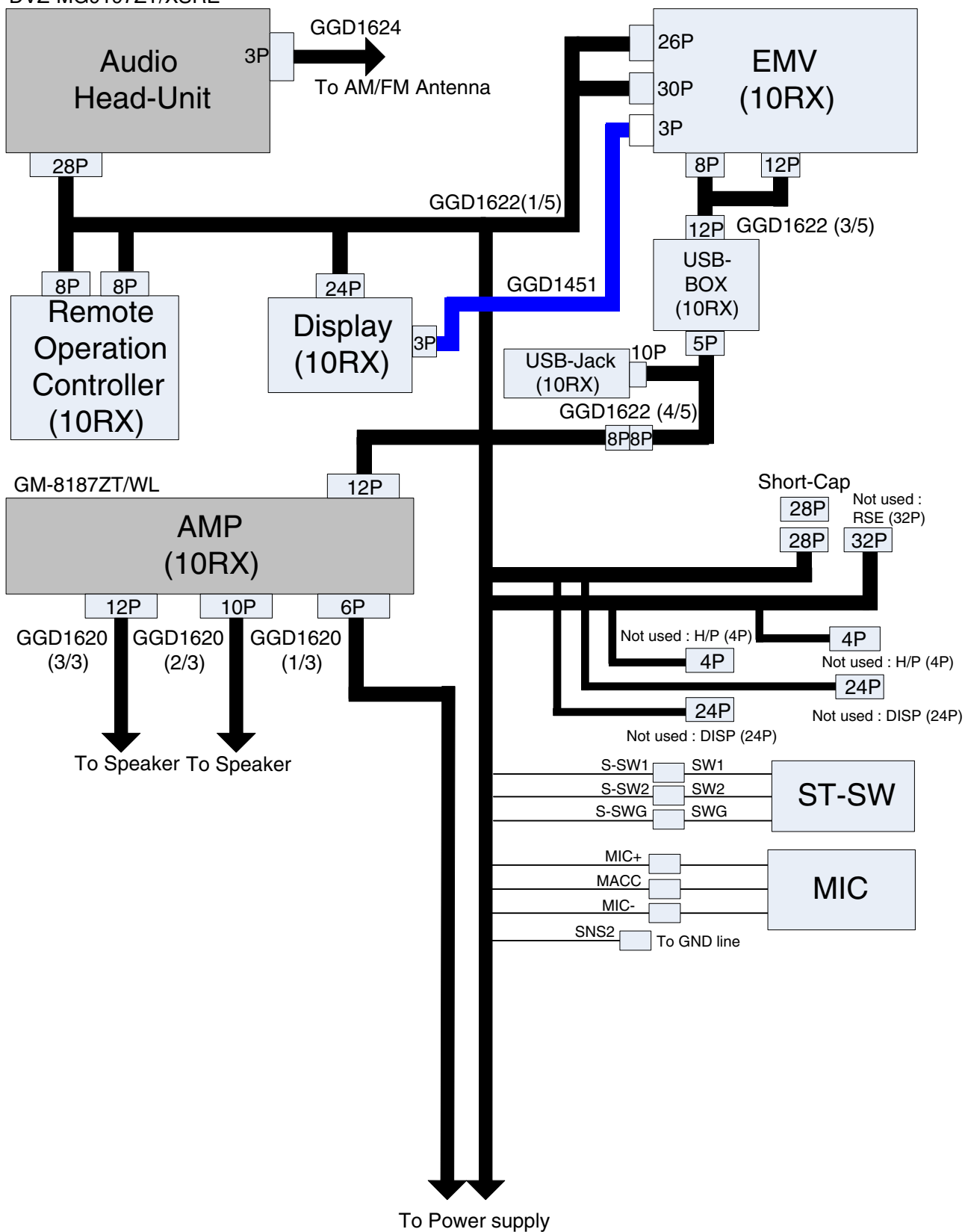
Description	91 model
Cover	CEG1045 (x2)
Cover	CEG1324
Unit Box	CHG4861
Contain Box	CHL4861 (x1/2)
Air Cushioned Bag	CHW1945
Air Cushioned Bag	CHW1948 (x2)

F

BASIC ITEMS FOR SERVICE JIGS LIST

Connection Diagram

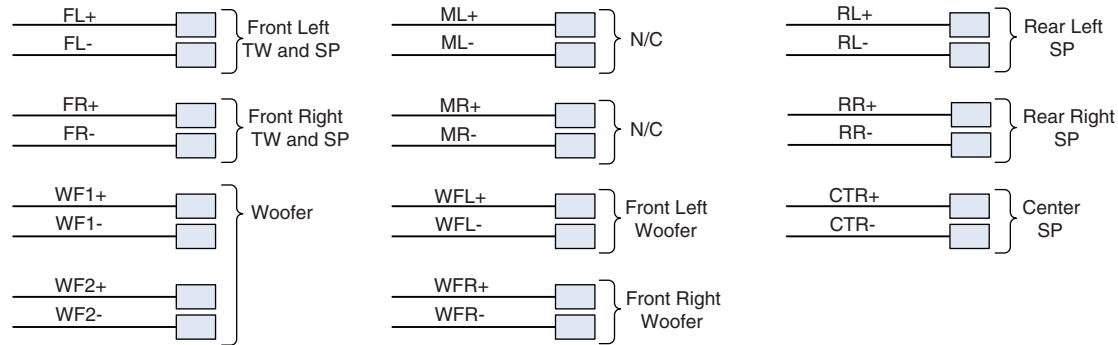
DVZ-MG9097ZT/XSEW
DVZ-MG9197ZT/XSEW
DVZ-MG9197ZT/XSRE



Connection Diagram(terminal)

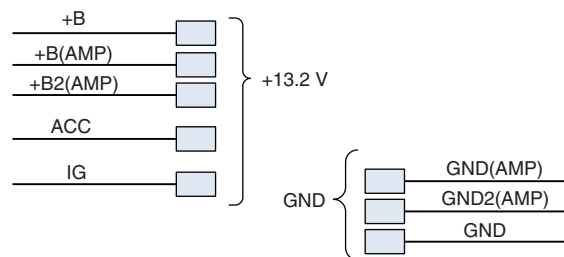
A

Speaker Terminal



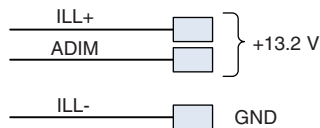
B

Power Terminal



C

Illumination Terminal



D

Jigs List

E

Name	Jig No.	Remarks
System Harness	GGD1620	For system confirmation
System Harness	GGD1622	For system confirmation
System Cable	GGD1451	For system confirmation
System Cable	GGD1624	For system confirmation

F

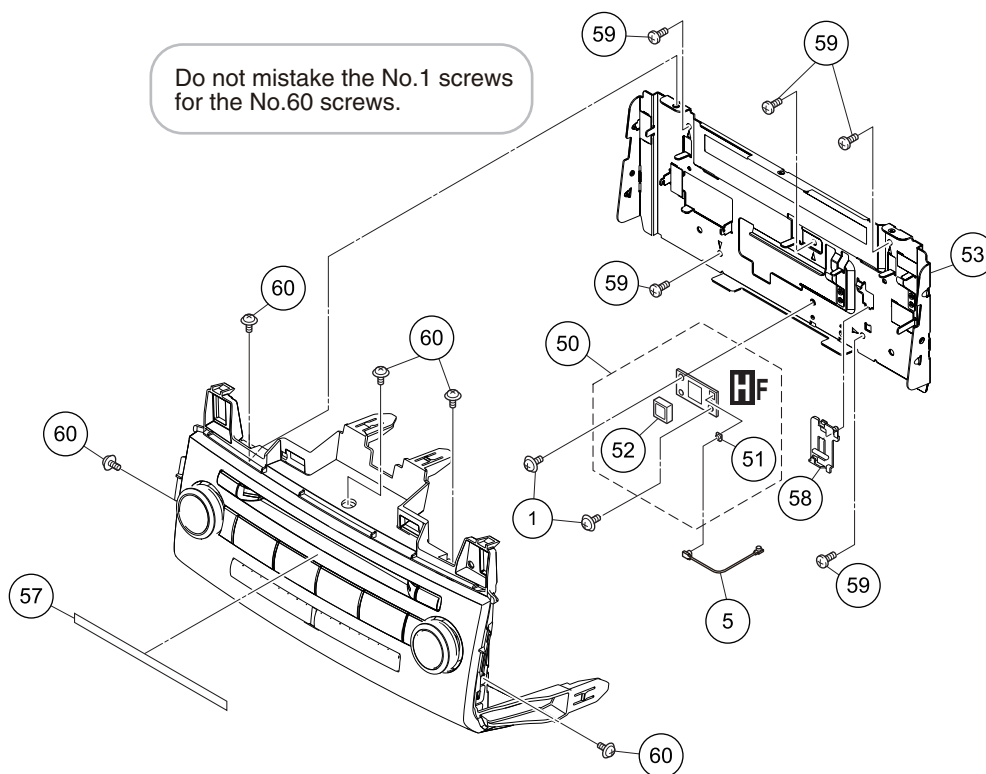
EXPLODED VIEWS AND PARTS LIST

EXTERIOR(3)(Page 66)

EXTERIOR(3) SECTION PARTS LIST

*:Non spare part

Mark	No.	Description	DVZ-MG4687ZT/EW	DVZ-MG9097ZT/XSEW DVZ-MG9197ZT/XSEW DVZ-MG9197ZT/XSRE
	2	Screw	BMZ50P080FTC	Not used
	3	Screw	BSZ26P050FTC	Not used
	6	86203-48010	CDE8708	Not used
	7	Holder	CND4526	Not used
	8	86212-48100	CND4683	Not used
	9	86200-48100	CND4684	Not used
	10	Cushion	CNN2388	Not used
	11	90467-13082	CNV9101	Not used
	12	Holder	CNW1130	Not used
	13	Guide	CNW1157	Not used
	34	Sub Unit	CWN3419	CWN4962
	49	Screw	IMS26P050FTC	Not used
	50	Antenna Unit	CWN3673	CWN4287(BT ANT Unit)
	53	Frame Unit	CXC8722	CXC9986
	54	Door Unit	CXC9313	CXE1739
	58	Holder	Not used	CNW1386
	59	Screw	Not used	BSZ26P050FTC
	60	Screw	Not used	ISS26P060FTC



A

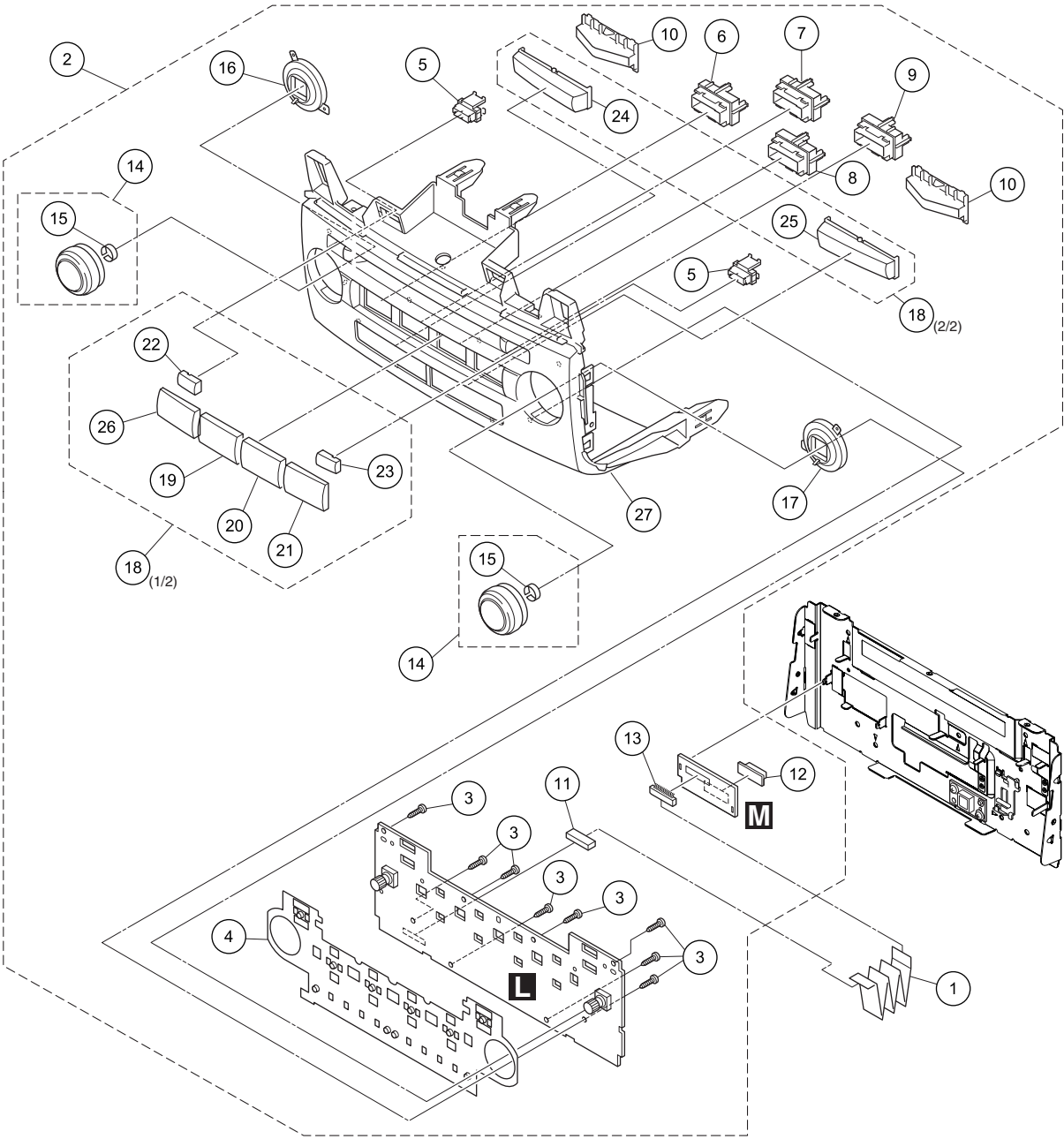
B

C

D

E

F



EXTERIOR(4) SECTION PARTS LIST

Mark	No.	Description	DVZ-MG9097ZT/XSEW	DVZ-MG9197ZT/XSEW	DVZ-MG9197ZT/XSRE
*	1	Connector	CDE8348	CDE8348	CDE8348
	2	Panel Assy	CPN2889	CPN2888	CPN2891
	3	Screw	BPZ20P080FTC	BPZ20P080FTC	BPZ20P080FTC
	4	Rubber	CNW1166	CNW1166	CNW1166
	5	Holder	CNW1688	CNW1688	CNW1688
	6	Holder	CNW1690	CNW1690	CNW1690
	7	Holder	CNW1691	CNW1691	CNW1691
	8	Holder	CNW1692	CNW1692	CNW1692
	9	Holder	CNW1693	CNW1693	CNW1693
	10	Holder	CNW1703	CNW1703	CNW1703
	11	Connector(CN2001)	CKS3859	CKS3859	CKS3859
	12	Connector(CN2101)	CKS6054	CKS6054	CKS6054
	13	18P FFC Connector (Side)(CN2102)	VKN1310	VKN1310	VKN1310
	14	Knob Unit	CXE1367	CXE1367	CXE1367
	15	Spring	CBL1711	CBL1711	CBL1711
	16	Lighting Conductor Unit	CXE1369	CXE1369	CXE1369
	17	Lighting Conductor Unit	CXE1370	CXE1370	CXE1370
	18	Button Unit	CXE1383	CXE1382	CXE1382
	19	Button(FM)	CAI1032	CAI1032	CAI1032
	20	Button(DISC.AUX)	CAI1033	CAI1033	CAI1033
	21	Button(TA)	CAI1036	CAI1036	CAI1036
	22	Button	CAI1063(LOAD)	CAI1029(EJECT)	CAI1029(EJECT)
	23	Button	CAI1064(EJECT)	CAI1030(LOAD)	CAI1030(LOAD)
	24	Button	CAI1081(CH.DISC)	CAI1037(SEEK.TRACK)	CAI1037(SEEK.TRACK)
	25	Button	CAI1082(SEEK.TRACK)	CAI1038(CH.DISC)	CAI1038(CH.DISC)
	26	Button(AM.DAB)	CAI2293	CAI2293	CAI2293
	27	Grille Unit	CXE1933	CXE1932	CXE1935

EXTERIOR(5)(Page 70)

EXTERIOR(5) SECTION PARTS LIST

A

Mark	No.	Description	DVZ-MG4687ZT/EW	DVZ-MG9097ZT/XSEW DVZ-MG9197ZT/XSEW	DVZ-MG9197ZT/XSRE
	1	Connector	CDE8519	Not used	Not used
	9	Insulator	CNN1280	CNN3161	CNN3161
	10	Main Unit	CWN2286	CWN3956	CWN3954
	11	Screw(M3 x 6)	CBA2154	CBA2120	CBA2120
	27	Insulator	CNM9861	CNN2579	CNN2579
	35	Screw	ASZ26P050FTC	Not used	Not used
B	36	Screw	BSZ26P050FTC	Not used	Not used
	37	Chassis	CND4231	Not used	Not used
	38	Case	CND4527	Not used	Not used
	39	Sheet	CNN2530	Not used	Not used
	40	Holder	CNW1131	Not used	Not used
	41	Panel Control Unit	CWN3772	Not used	Not used
	42	Screw(M3 x 6)	CBA2154	Not used	Not used
	43	Plug(CN2801)	CKM1563	Not used	Not used
	44	Connector(CN2802)	CKS5732	Not used	Not used
	45	Shield	CND5354	Not used	Not used
C	46	Screw	IMS26P050FTC	Not used	Not used

D

E

F

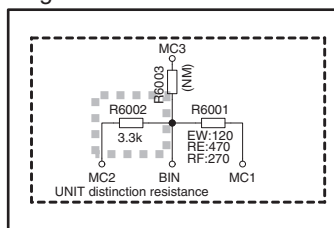
ELECTRICAL PARTS LIST(Page 196)

MAIN UNIT

Circuit Symbol and No.	Part Name	DVZ-MG4687ZT/EW	DVZ-MG9097ZT/XSEW DVZ-MG9197ZT/XSEW
IC601	IC	PEG371A8	PEG371C8
R4001		RS1/16SS332J	RS1/16SS121J
R6001		RS1/16SS122J	RS1/16SS121J
R6002		Not used	RS1/16SS332J

Circuit Symbol and No.	Part Name	DVZ-MG4687ZT/RE	DVZ-MG9197ZT/XSRE
IC601	IC	PEG371A8	PEG371C8
R4001		RS1/16SS182J	RS1/16SS471J
R6001		RS1/16SS821J	RS1/16SS471J
R6002		Not used	RS1/16SS332J

Page 76 Address 1D



SUB UNIT

Circuit Symbol and No.	Part Name	DVZ-MG4687ZT/EW	DVZ-MG9097ZT/XSEW DVZ-MG9197ZT/XSEW
IC1003	IC	PEH124A8	PEH127D8

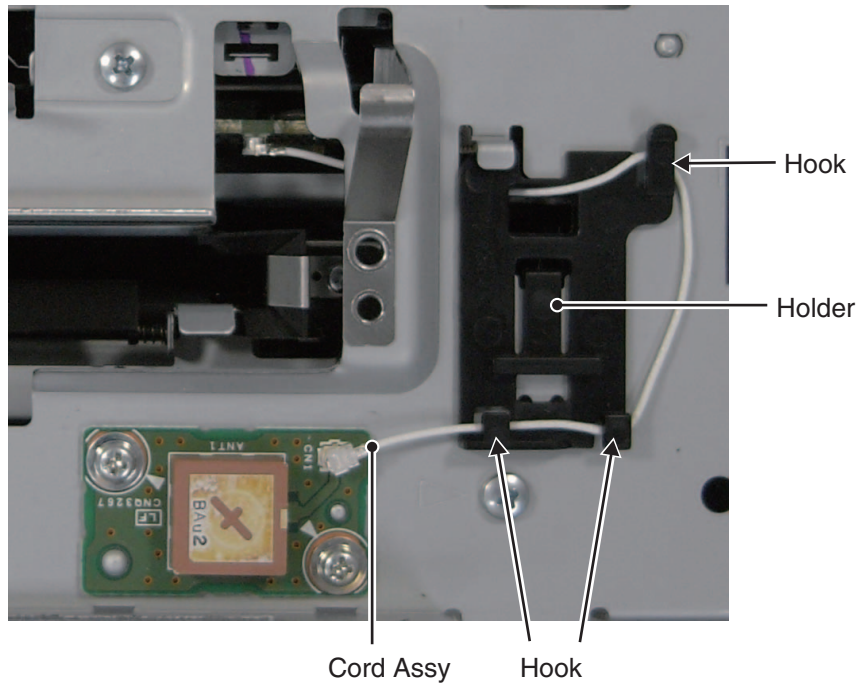
● Attention at installation of Code Assy

A

The Code Assy is helded three Hook of the Holder as shown in figure.

B

C



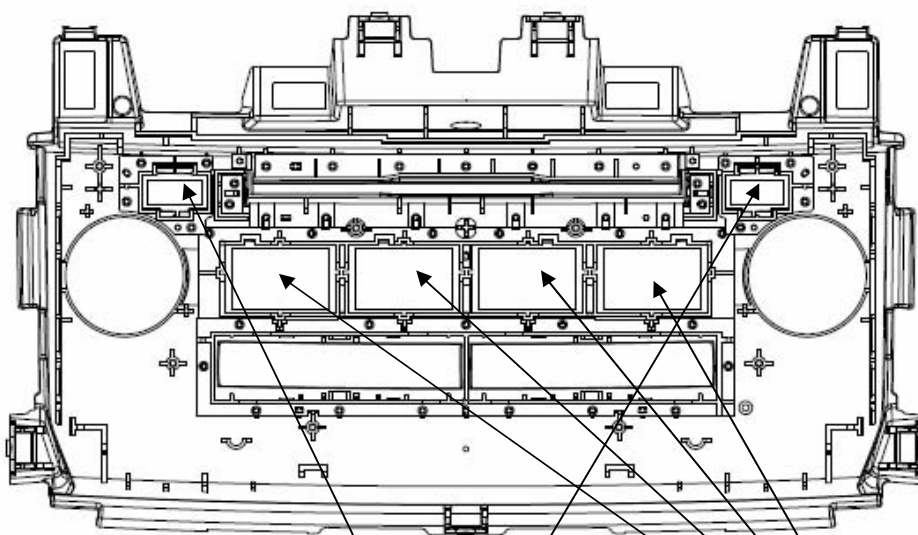
D

E

F



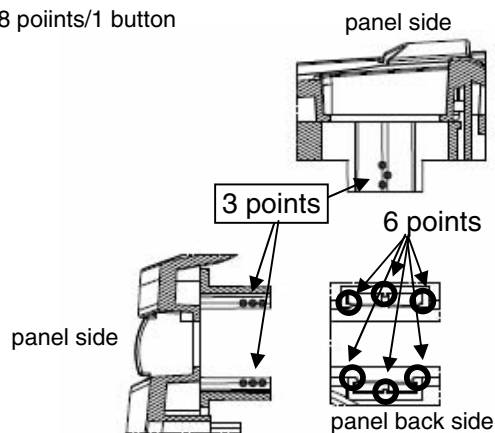
- Notice for changing buttons in Front Panel
Grease in panel when replacing buttons.
Please refer to the following procedure.
- Grease List(Jig No.)
GGK1004 : syringe(w/o needle)
GGL1011 : needle
GEM1048 : Grease
GGF1561 : Sample of Grease amount
- Procedure for applying Grease
 1. Clean off the old Grease where the buttons are installed.
 2. Install the needle in syringe and Grease in it.
*Not to fall off the needle, install it tightly.
 3. Use the syringe and apply Grease about 2.0 mg on the spots shown in the following pictures.
*As for the amount of Grease, refer to the sample(GGF1561).
 4. Install the buttons after applying Grease.
Check the Grease if it is stuck out or not.
*If the Grease is stuck out, return to Procedure Number 1.



Grease is painted on the panel.

LOAD/EJECT button part

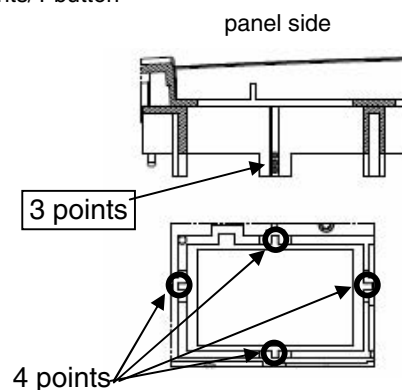
18 points/1 button



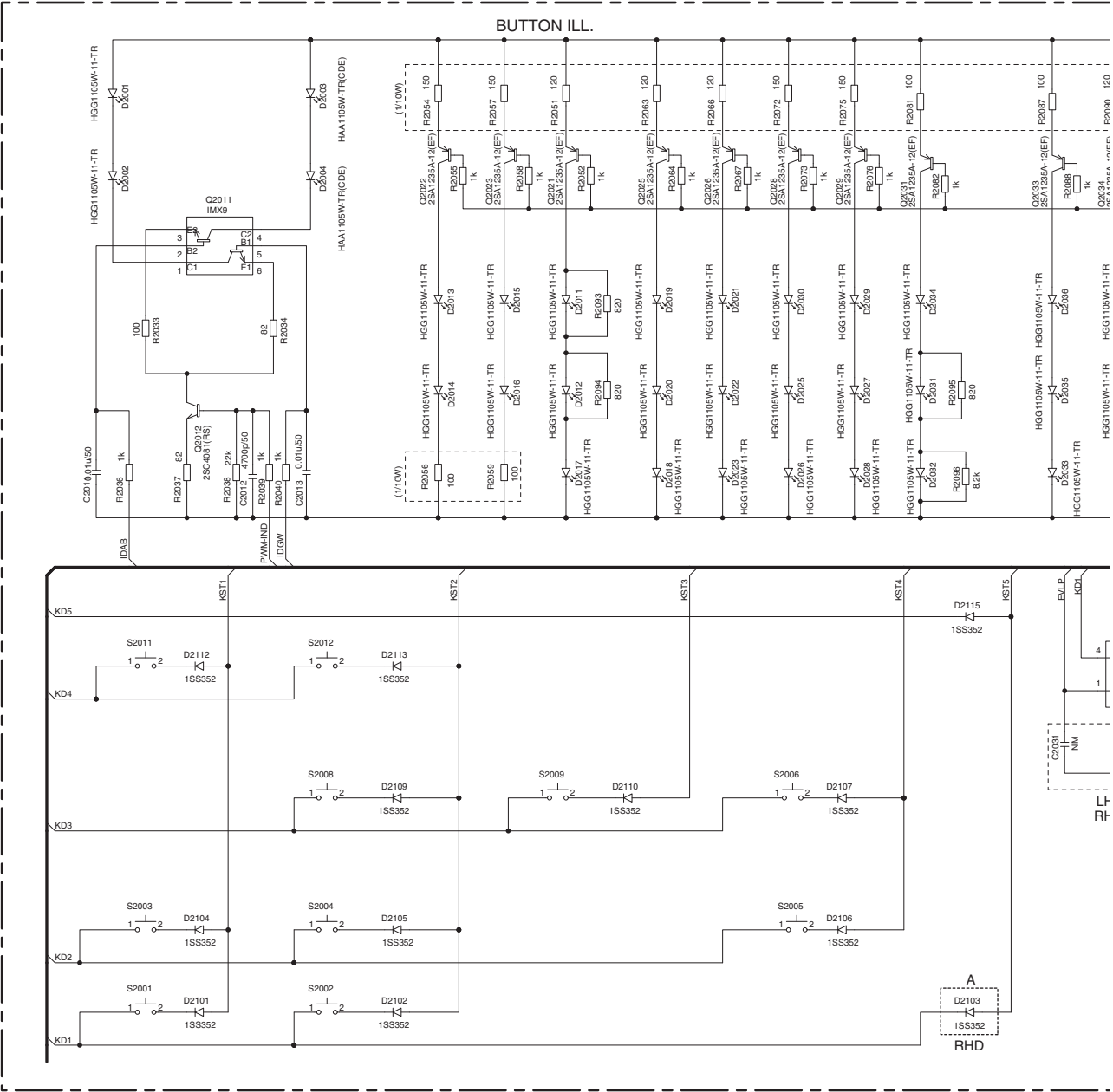
Grease is painted on the panel.

SOURCE button part

12 points/1 button

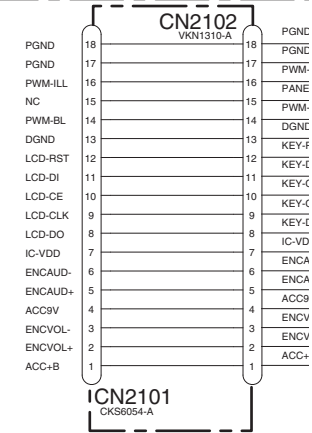


SCHEMATIC DIAGRAM
KEYBOARD UNIT



	A	B,C
S2001	DISC UP	SEEK UP
S2002	DISC DOWN	SEEK DOWN
S2003	AM.DAB	AM.DAB
S2004	FM	FM
S2005	DISC.AUX	DISC.AUX
S2006	TA	TA
S2008	LOAD	EJECT
S2009	EJECT	LOAD
S2011	SEEK UP	DISC UP
S2012	SEEK DOWN	DISC DOWN
S2013	TUNE	PWR
S2014	PWR	TUNE

B 4/6
CN1507



M CONNECTOR PCI



△

SIDE B

A

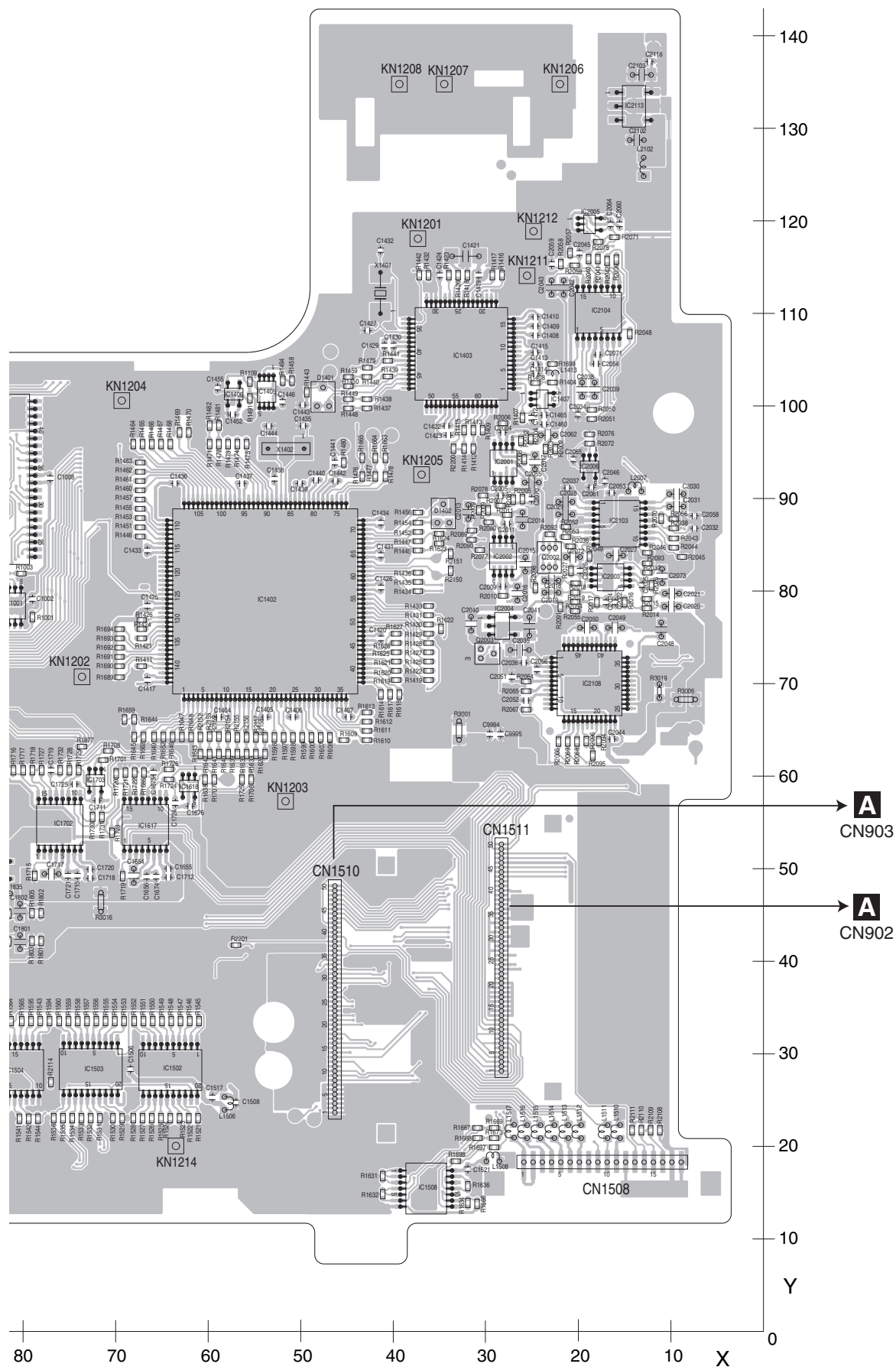
B

C

D

E

F



DVZ-MG9097ZT/XSEW

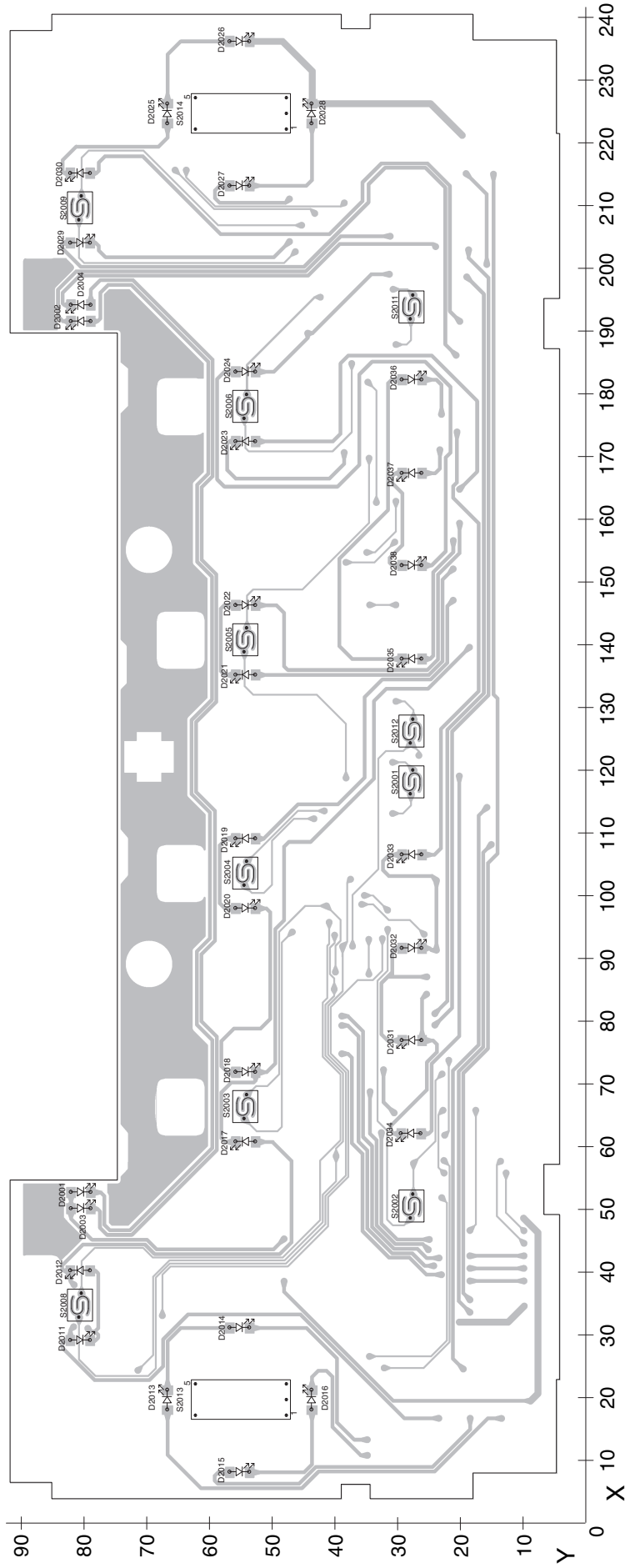
KEYBOARD PCB

KEYBOARD PCB

model	
A:DVZ-MG9097ZT/XSEW	RHD
B:DVZ-MG9197ZT/XSEW	LHD
C:DVZ-MG9197ZT/XSRE	LHD

	A	B,C
S2001	DISC UP	SEEK UP
S2002	DISC DOWN	SEEK DOWN
S2003	AM.DAB	AM.DAB
S2004	FM	FM
S2005	DISC.AUX	DISC.AUX
S2006	TA	TA
S2008	LOAD	EJECT
S2009	EJECT	LOAD
S2011	SEEK UP	DISC UP
S2012	SEEK DOWN	DISC DOWN
S2013	TUNE	PWR
S2014	PWR	TUNE

SIDE A



DVZ-MG9097ZT/XSEW

CONNECTOR PCB

A

M CONNECTOR PCB

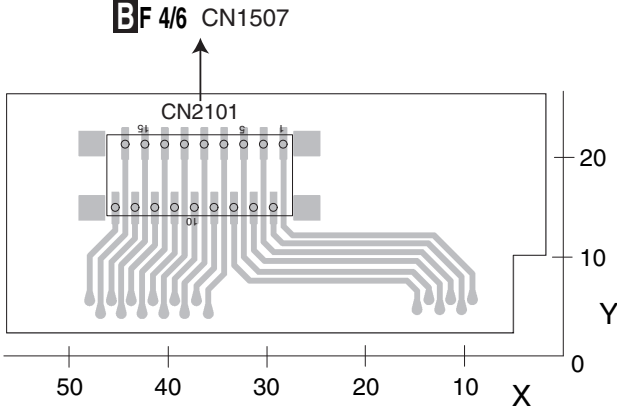
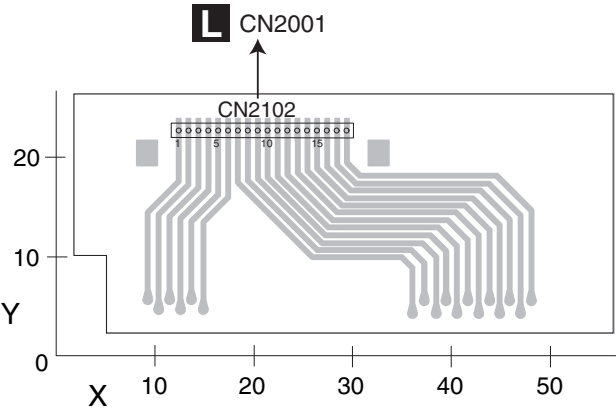
SIDE A

M CONNECTOR PCB

SIDE B

B

C



D

E

F

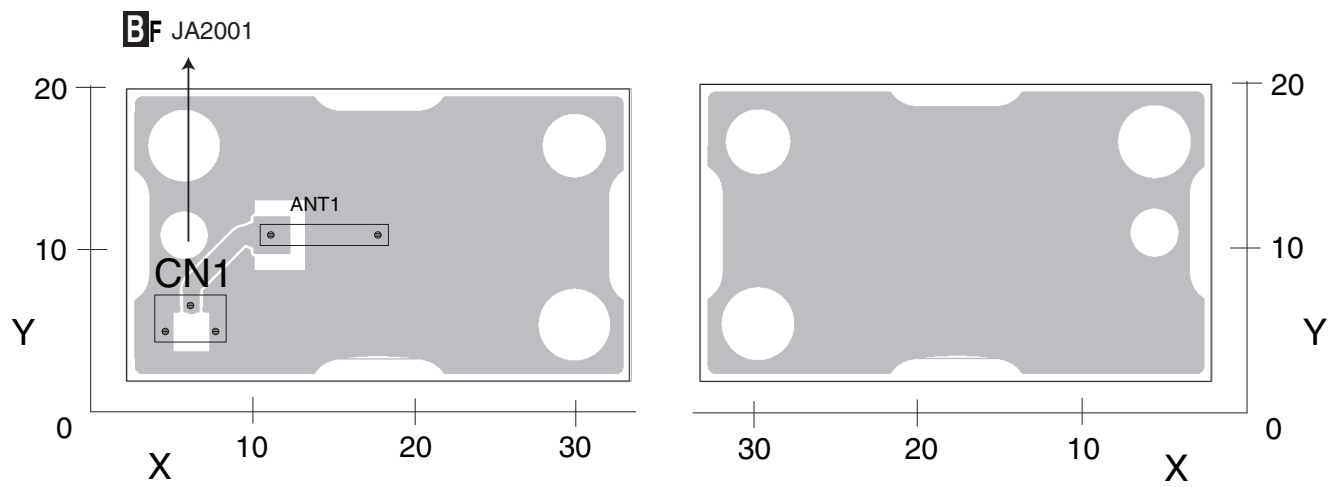
M

HF BT ANT UNIT

SIDE A

HF BT ANT UNIT

SIDE B



ELECTRICAL PARTS LIST

NOTE:

- Parts whose parts numbers are omitted are subject to being not supplied.
- The part numbers shown below indicate chip components.

Chip Resistor

RS1/○○○○○J,RS1/○○○○○J

Chip Capacitor (except for CQS.....)

CKS....., CCS....., CSZS.....

- The  mark found on some component parts indicates the importance of the safety factor of the part. Therefore, when replacing, be sure to use parts of identical designation.

- Meaning of the figures and others in the parentheses in the parts list.

Example) IC 301 is on the point (face A, 91 of x-axis, and 111 of y-axis) of the corresponding PC board.

IC 301 (A, 91, 111) IC NJM2068V

- The expression of the unit in this manual is shown by u instead of μ . Please do not make a mistake.

Circuit Symbol and No.

Part No.

Circuit Symbol and No.

Part No.

A:DVZ-MG9097ZT/XSEW
B:DVZ-MG9197ZT/XSEW
C:DVZ-MG9197ZT/XSRE

D 2011 (A,29,81) LED HGG1105W-11-TR
D 2012 (A,40,81) LED HGG1105W-11-TR
D 2013 (A,20,67) LED HGG1105W-11-TR
D 2014 (A,31,55) LED HGG1105W-11-TR
D 2015 (A,8,55) LED HGG1105W-11-TR

KEYBOARD UNIT

Consists of
KEYBOARD PCB
CONNECTOR PCB

D 2016 (A,20,44) LED HGG1105W-11-TR
D 2017 (A,61,54) LED HGG1105W-11-TR
D 2018 (A,72,54) LED HGG1105W-11-TR
D 2019 (A,109,54) LED HGG1105W-11-TR
D 2020 (A,98,54) LED HGG1105W-11-TR

L M

Unit Number:CWS1508(B,C)

Unit Number:CWS1509(A)

Unit Name:Keyboard Unit

D 2021 (A,135,54) LED HGG1105W-11-TR
D 2022 (A,146,54) LED HGG1105W-11-TR
D 2023 (A,172,54) LED HGG1105W-11-TR
D 2024 (A,184,54) LED HGG1105W-11-TR
D 2025 (A,225,67) LED HGG1105W-11-TR

MISCELLANEOUS

IC 2001 (B,80,31) IC LC75700TS
Q 2001 (B,65,29) Digital Transistor DTC144EUA
Q 2011 (B,201,27) Transistor IMX9
Q 2012 (B,211,19) Transistor 2SC4081
Q 2021 (B,20,22) Transistor 2SA1235A-12

D 2026 (A,236,55) LED HGG1105W-11-TR
D 2027 (A,213,55) LED HGG1105W-11-TR
D 2028 (A,225,44) LED HGG1105W-11-TR
D 2029 (A,204,81) LED HGG1105W-11-TR
D 2030 (A,215,81) LED HGG1105W-11-TR

Q 2022 (B,20,12) Transistor 2SA1235A-12
Q 2023 (B,20,17) Transistor 2SA1235A-12
Q 2025 (B,146,18) Transistor 2SA1235A-12
Q 2026 (B,151,18) Transistor 2SA1235A-12
Q 2028 (B,190,18) Transistor 2SA1235A-12

D 2031 (A,77,28) LED HGG1105W-11-TR
D 2032 (A,92,28) LED HGG1105W-11-TR
D 2033 (A,107,28) LED HGG1105W-11-TR
D 2034 (A,62,28) LED HGG1105W-11-TR
D 2035 (A,138,28) LED HGG1105W-11-TR

Q 2029 (B,185,18) Transistor 2SA1235A-12
Q 2031 (B,118,18) Transistor 2SA1235A-12
Q 2033 (B,155,18) Transistor 2SA1235A-12
Q 2034 (B,170,18) Transistor 2SA1235A-12
Q 2041 (B,113,19) Transistor 2SA1235A-12

D 2036 (A,182,28) LED HGG1105W-11-TR
D 2037 (A,167,28) LED HGG1105W-11-TR
D 2038 (A,153,28) LED HGG1105W-11-TR
D 2061 (B,109,21) Diode UDZS5R1(B)
D 2101 (B,127,31) Diode 1SS352

Q 2042 (B,106,22) Transistor 2SC4081
D 2001 (A,53,81) LED HGG1105W-11-TR
D 2002 (A,192,81) LED HGG1105W-11-TR
D 2003 (A,50,81) LED HAA1105W-TR(CDE)
D 2004 (A,194,81) LED HAA1105W-TR(CDE)

D 2102 (B,92,31) Diode 1SS352
D 2103 (B,96,38) Diode(A) 1SS352
D 2104 (B,159,35) Diode 1SS352
D 2105 (B,150,38) Diode 1SS352
D 2106 (B,172,33) Diode 1SS352

D 2107 (B,172,31) Diode 1SS352
D 2109 (B,92,29) Diode 1SS352
D 2110 (B,183,33) Diode 1SS352
D 2112 (B,167,30) Diode 1SS352
D 2113 (B,143,30) Diode 1SS352

Circuit Symbol and No.**Part No.**

D	2115	(B,96,36) Diode	1SS352
D	2116	(B,183,32) Diode(A)	1SS352
D	2117	(B,150,34) Diode(B,C)	1SS352
L	2001	(B,66,32) Inductor	LCTAW101J2520
S	2013	(A,20,55) Encoder(B,C)(PWR)	CSD1130
		(A,20,55) Encoder(A)(TUNE)	CSD1131
S	2014	(A,225,55) Encoder(B,C)(TUNE)	CSD1131
		(A,225,55) Encoder(A)(PWR)	CSD1130
CN	2001	(B,40,15) Connector	CKS3859
CN	2101	(B,37,18) Connector	CKS6054
CN	2102	(A,21,19) Terminal	VKN1310

RESISTORS

R	2006	(B,88,33)	RS1/16S102J
R	2007	(B,90,36)	RS1/16S102J
R	2008	(B,91,38)	RS1/16S102J
R	2009	(B,88,38)	RS1/16S102J
R	2010	(B,85,38)	RS1/16S102J
R	2011	(B,73,28)	RS1/16S393J
R	2012	(B,73,31)	RS1/16S473J
R	2013	(B,79,37)	RS1/16S102J
R	2014	(B,81,37)	RS1/16S102J
R	2015	(B,75,37)	RS1/16S102J
R	2016	(B,71,35)	RS1/16S102J
R	2017	(B,71,32)	RS1/16S472J
R	2021	(B,60,20) (B,C)	RS1/16S100J
R	2022	(B,64,20) (B,C)	RS1/16S100J
R	2023	(B,62,20) (B,C)	RS1/16S100J
R	2024	(B,66,20) (B,C)	RS1/16S100J
R	2025	(B,54,20) (A)	RS1/16S100J
R	2026	(B,56,20) (A)	RS1/16S100J
R	2027	(B,58,20) (A)	RS1/16S100J
R	2028	(B,52,20) (A)	RS1/16S100J
R	2033	(B,201,20)	RS1/10S221J
R	2034	(B,211,22)	RS1/10S470J
R	2036	(B,198,21)	RS1/16S102J
R	2037	(B,207,16)	RS1/10S680J
R	2038	(B,212,16)	RS1/16S223J
R	2039	(B,214,16)	RS1/16S102J
R	2040	(B,204,21)	RS1/16S102J
R	2041	(B,112,23)	RS1/16S331J
R	2042	(B,111,16)	RS1/16S561J
R	2043	(B,103,15)	RS1/16S271J
R	2044	(B,106,15)	RS1/16S223J
R	2045	(B,105,19)	RS1/16S102J
R	2051	(B,16,21)	RS1/10S820J
R	2052	(B,23,22)	RS1/16S102J
R	2054	(B,16,11)	RS1/10S820J
R	2055	(B,23,12)	RS1/16S102J
R	2056	(B,13,32)	RS1/10S101J
R	2057	(B,16,16)	RS1/10S820J
R	2058	(B,23,17)	RS1/16S102J
R	2059	(B,11,32)	RS1/10S101J
R	2063	(B,145,22)	RS1/10S820J
R	2064	(B,145,15)	RS1/16S102J
R	2066	(B,150,22)	RS1/10S820J
R	2067	(B,150,15)	RS1/16S102J
R	2072	(B,189,22)	RS1/10S820J

Circuit Symbol and No.**Part No.**

R	2073	(B,190,15)	RS1/16S102J
R	2075	(B,184,22)	RS1/10S820J
R	2076	(B,184,15)	RS1/16S102J
R	2081	(B,117,22)	RS1/10S820J
R	2082	(B,117,15)	RS1/16S102J
R	2087	(B,154,22)	RS1/10S820J
R	2088	(B,155,15)	RS1/16S102J
R	2090	(B,169,22)	RS1/10S820J
R	2091	(B,165,23)	RS1/16S102J

CAPACITORS

C	2001	(B,74,28)	CKSRYB102K50
C	2002	(B,69,28)	CKSRYB472K50
C	2003	(B,72,35)	CCSRCH101J50
C	2004	(B,76,37)	CCSRCH101J50
C	2005	(B,82,37)	CCSRCH101J50
C	2006	(B,78,37)	CCSRCH101J50
C	2007	(B,71,28)	CKSRYB104K50
C	2008	(B,62,29)	CKSRYB104K50
C	2011	(B,199,16)	CKSRYB103K50
C	2012	(B,210,16)	CKSRYB472K50
C	2013	(B,205,16)	CKSRYB103K50
C	2021	(B,114,23)	CKSRYB473K50
C	2022	(B,105,15)	CKSRYB472K50
C	2023	(B,97,15)	CKSRYB104K25
C	2024	(B,95,15)	CKSRYB104K25
C	2035	(B,84,38)	CCSRCH330J50
C	2036	(B,87,38)	CCSRCH330J50
C	2037	(B,89,38)	CCSRCH330J50
C	2038	(B,90,35)	CCSRCH330J50
C	2039	(B,89,33)	CCSRCH330J50

