

DVD AUDIO/VIDEO SA-CD PLAYER DVD-S657/DV-S5860

SERVICE MANUAL

IMPORTANT NOTICE

This manual has been provided for the use of authorized YAMAHA Retailers and their service personnel.

It has been assumed that basic service procedures inherent to the industry, and more specifically YAMAHA Products, are already known and understood by the users, and have therefore not been restated.

WARNING: Failure to follow appropriate service and safety procedures when servicing this product may result in personal injury, destruction of expensive components, and failure of the product to perform as specified. For these reasons, we advise all YAMAHA product owners that any service required should be performed by an authorized YAMAHA Retailer or the appointed service representative.

IMPORTANT: The presentation or sale of this manual to any individual or firm does not constitute authorization, certification or recognition of any applicable technical capabilities, or establish a principle-agent relationship of any form.

The data provided is believed to be accurate and applicable to the unit(s) indicated on the cover. The research, engineering, and service departments of YAMAHA are continually striving to improve YAMAHA products. Modifications are, therefore, inevitable and specifications are subject to change without notice or obligation to retrofit. Should any discrepancy appear to exist, please contact the distributor's Service Division.

WARNING: Static discharges can destroy expensive components. Discharge any static electricity your body may have accumulated by grounding yourself to the ground buss in the unit (heavy gauge black wires connect to this buss).

IMPORTANT: Turn the unit OFF during disassembly and part replacement. Recheck all work before you apply power to the unit.

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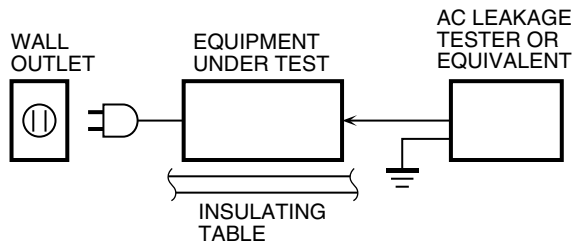
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■ TO SERVICE PERSONNEL

1. Critical Components Information
Components having special characteristics are marked $\triangle$ and must be replaced with parts having specifications equal to those originally installed.
 2. Leakage Current Measurement (For 120V Models Only)
When service has been completed, it is imperative to verify that all exposed conductive surfaces are properly insulated from supply circuits.
- Meter impedance should be equivalent to 1500 ohms shunted by 0.15 μ F.



- Leakage current must not exceed 0.5mA.
- Be sure to test for leakage with the AC plug in both polarities.

WARNING: CHEMICAL CONTENT NOTICE!

The solder used in the production of this product contains LEAD. In addition, other electrical/electronic and/or plastic (where applicable) components may also contain traces of chemicals found by the California Health and Welfare Agency (and possibly other entities) to cause cancer and/or birth defects or other reproductive harm.

DO NOT PLACE SOLDER, ELECTRICAL/ELECTRONIC OR PLASTIC COMPONENTS IN YOUR MOUTH FOR ANY REASON WHATSOEVER!

Avoid prolonged, unprotected contact between solder and your skin! When soldering, do not inhale solder fumes or expose eyes to solder/flux vapor!

If you come in contact with solder or components located inside the enclosure of this product, wash your hands before handling food.

WARNING: Laser Safety

This product contains a laser beam component. This component may emit invisible, as well as visible radiation, which may cause eye damage. To protect your eyes and skin from laser radiation, the following precautions must be used during servicing of the unit.

- 1) When testing and/or repairing any component within the product, keep your eyes and skin more than 30 cm away from the laser pick-up unit at all times. Do not stare at the laser beam at any time.
- 2) Do not attempt to readjust, disassemble or repair the laser pick-up, unless noted elsewhere in this manual.
- 3) CAUTION : Use of controls, adjustments or performance of procedures other than those specified herein may result in hazardous radiation exposure.

Laser Emitting conditions:

- 1) When the Top Cover is removed, and the STANDBY/ON SW is turned to the "ON" position, the laser component will emit a beam for several seconds to detect if a disc is present. During this time (5-10 sec.) the laser may radiate through the lens of the laser pick-up unit. Do not attempt any servicing during this period!
If no disc is detected, the laser will stop emitting the beam. When a disc is loaded, you will not be exposed to any laser emissions.
- 2) The laser power level can be adjusted with the VR on the pick-up PWB, however, this level has been set by the factory prior to shipping from the factory. Do not adjust this laser level control unless instruction is provided elsewhere in this manual. Adjustment of this control can increase the laser emission level from the device.

警告：レーザーの安全対策

本機はレーザー光線を放射する部品を搭載しています。この部品が放射するレーザー光線は目に損傷を起こします。このレーザー光線から目及び肌を保護するために、本機の修理作業中は下記の注意を厳守してください。

- 1) テスト時または修理時、目及び肌を光ピックアップから30cm 以上離してください。いかなる場合もレーザー光線を見つめないでください。
- 2) 光ピックアップの再調整及び分解はしないでください。
- 3) このマニュアル上で指定されている以外の制御、調整、手順はレーザー光線を照射される結果を招く恐れがあります。

レーザー放射条件

- 1) トップカバーを取り外しSTANDBY/ON スイッチをONにすると、ディスク検知のため5 ～10 秒間、光ピックアップからレーザー光線が放射されます。この間、修理はしないでください。
ディスクが検知されなければ、レーザー光線の放射は停止します。ディスクがセットされている場合、ディスクで遮られるのでレーザー光線は修理担当者には届きません。
- 2) レーザーパワーレベルは光ピックアップ基板上のVRにより調整可能ですが、工場出荷前に調整セット済みなので、このVR は廻さないでください。このVR を廻すと装置からのレーザー光線の放射レベルが上がる恐れがあります。

Laser Diode Properties

Type: Semiconductor laser GaAlAs
 Wave length: 650 nm (DVD)
 780 nm (VCD/CD)
 Output Power: 7 mW (DVD), 10 mW (VCD/CD)
 Beam divergence: 60 degree

レーザー

タイプ: 半導体レーザーGaAlAs
 波長: 650 nm (DVD)
 780 nm (VCD/CD)
 出力: 7 mW (DVD), 10 mW (VCD/CD)
 ビーム広がり: 60度

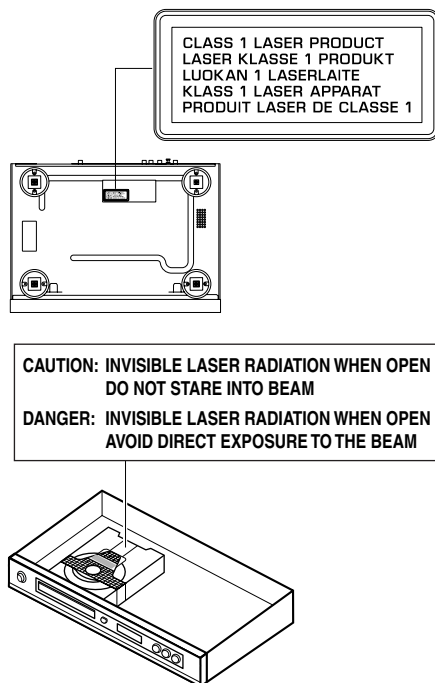
VARO! : AVATTAESSA JA SUOJALUKITUS OHITETTAESSA OLET ALTTIINA NÄKYMÄTTÖMÄLLE LASER-SÄTEILYLLE. ÄLÄ KATSO SÄTEESEEN.

WARNING! : OSYNLIG LASERSTRÅLNING NÄR DENNA DEL ÄR ÖPPNAD OCH SPÄRREN ÄR URKOPPLAD. BETRAKTA EJ STRÅLEN.

WARNING

The use of optical instruments with this product will increase eye hazard.

Repair handling should take place as much as possible with a disc loaded inside the player.



CAUTION VISIBLE AND INVISIBLE LASER RADIATION WHEN OPEN. AVOID EXPOSURE TO BEAM.

ADVARSEL SYNLIG OG USYNLIG LASERSTRÅLING VED ÅBNING. UNDGÅ UDSÆTTELSE FOR STRÅLING.

ADVARSEL SYNLIG OG USYNLIG LASERSTRÅLING NÅR DEKSEL ÅPNES. UNNGÅ EKSPONERING FOR STRÅLEN.

VARNING SYNLIG OCH OSYNLIG LASERSTRÅLNING NÄR DENNA DEL ÄR ÖPPNAD. BETRAKTA EJ STRÅLEN.

VARO! AVATTAESSA OLET ALTTIINA NÄKYVÄLLE JA NÄKYMÄTTÖMÄLLE LASER SÄ TEILYLLE. ÄLÄ KATSO SÄTEESEEN.

VORSICHT SICHTBARE UND UNSICHTBARE LASERSTRAHLUNG WENN ABDECKUNG GEÖFFNET. NICHT DEM STRAHL AUSSETZEN.

DANGER VISIBLE AND INVISIBLE LASER RADIATION WHEN OPEN. AVOID DIRECT EXPOSURE TO BEAM.

ATTENTION RAYONNEMENT LASER VISIBLE ET INVISIBLE EN CAS D'OUVERTURE. EXPOSITION DANGEREUSE AU FAISCEAU

Warning for power supply

The primary side of the power supply carries live mains voltage when the player is connected to the mains even when the player is switched off !

This primary area is not shielded so it is possible to touch copper tracks and/or components when servicing the player. Service personnel have to take precautions to prevent touching this area or components in this area.

Note:

The screws on the DVD mechanism may never be touched, removed or re-adjusted.

Handle the DVD mechanism with care when the unit has to be exchanged!

The DVD mechanism is very sensitive for dropping or giving shocks.

■ PREVENTION OF ELECTROSTATIC DISCHARGE

The laser diode in the DVD mechanism may be damaged due to static electricity from clothes or the human body. Use caution to prevent electrostatic damage when servicing or handling the DVD-mechanism.

1. Grounding for electrostatic damage prevention

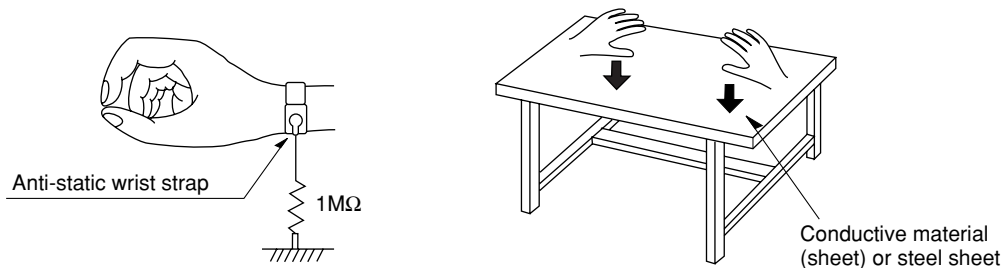
Some devices, such as the DVD player, use an optical pickup (laser diode) that will be damaged by static electricity in the working environment. Only attempt service after ensuring that all grounding procedures have been completed.

1. Worktable grounding

Put a grounded conductive material (sheet) or iron sheet on the area where the optical pickup is placed.

2. Human body grounding

Use an anti-static wrist strap to discharge the static electricity from your body.



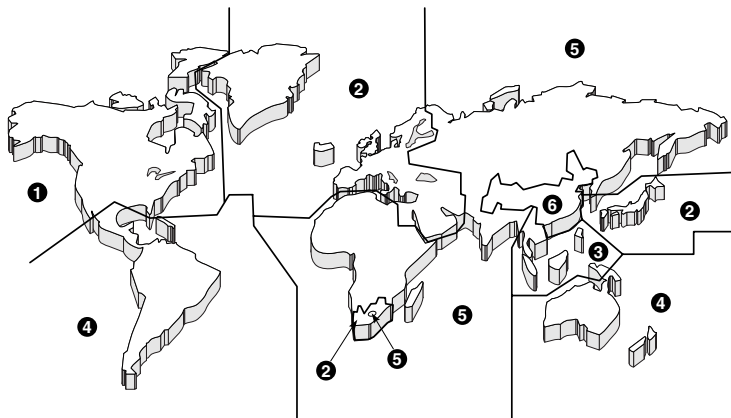
2. Handling Precautions for DVD mechanism

1. Handle the DVD mechanism gently, as it is an extremely high-precision assembly.
2. The flexible cable lines may break if an excessive force is applied to it. Use caution when handling the cable.
3. The semi-fixed resistor for laser power adjustment should not be adjusted. Do not turn the resistor.

■ LOCALE MANAGEMENT INFORMATION

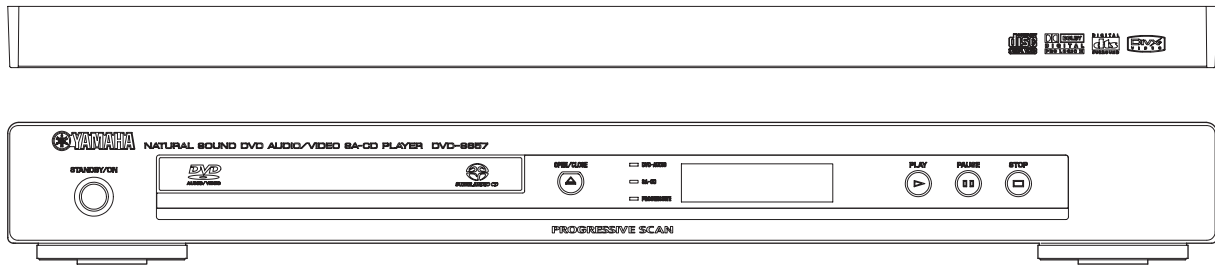
Locale Management Information : This DVD player is designed and manufactured to respond to the Locale Management Information that is recorded on a DVD disc. If the Locale number described on the DVD disc does not correspond to the Locale number of this DVD player, this DVD player cannot play this disc.

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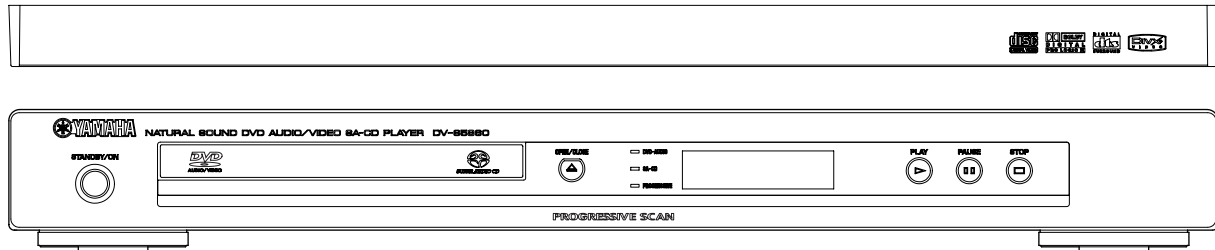


FRONT PANELS

DVD-S657 (U, R, K, A, B, G, P, J models)

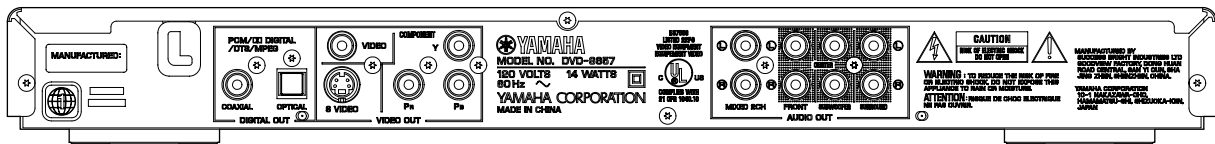


DV-S5860 (U, A models)

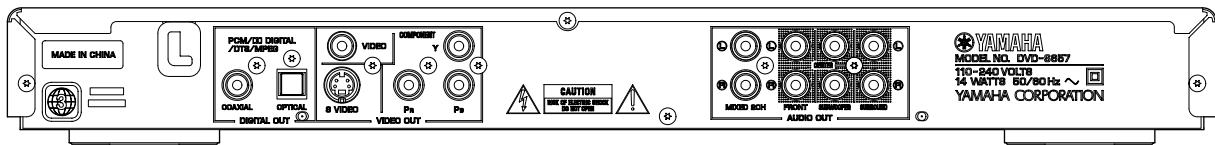


REAR PANELS

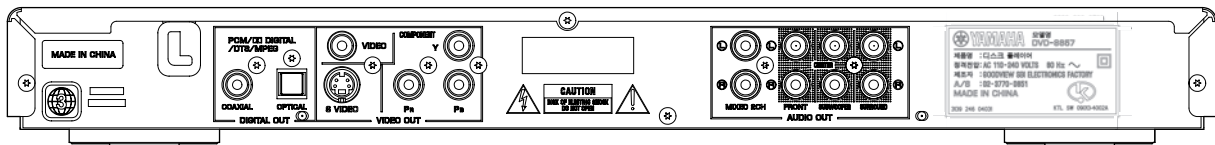
DVD-S657 (U model)



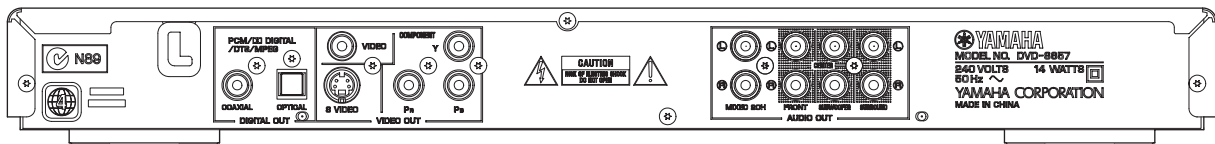
DVD-S657 (R model)



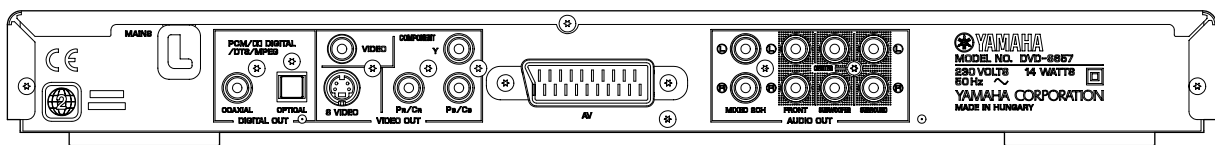
DVD-S657 (K model)



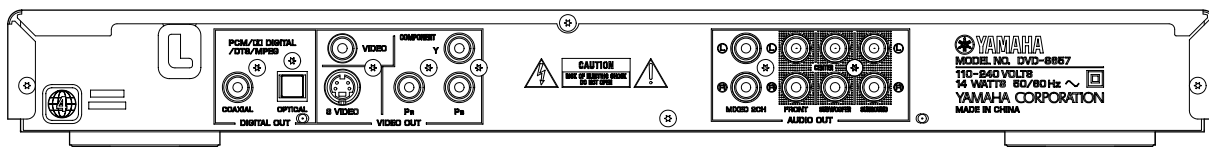
DVD-S657 (A model)



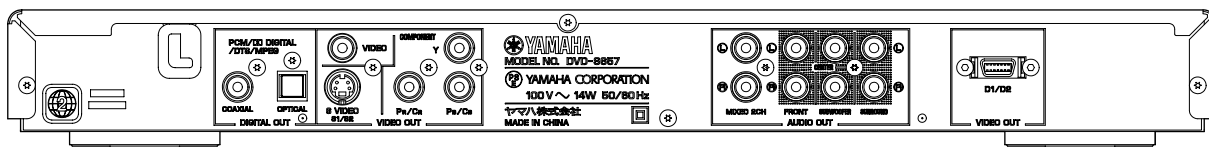
DVD-S657 (B, G models)



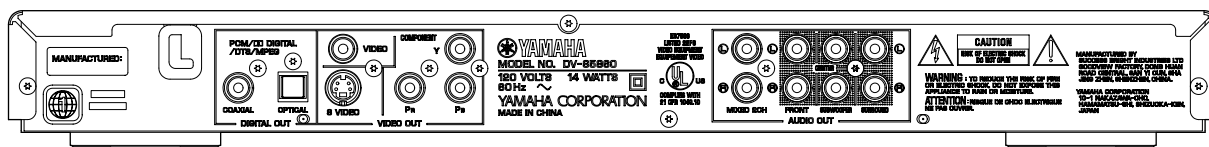
DVD-S657 (P model)



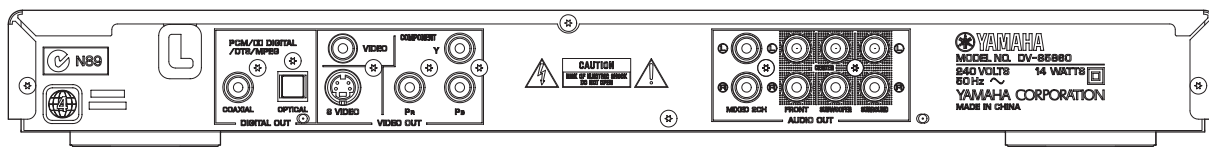
DVD-S657 (J model)



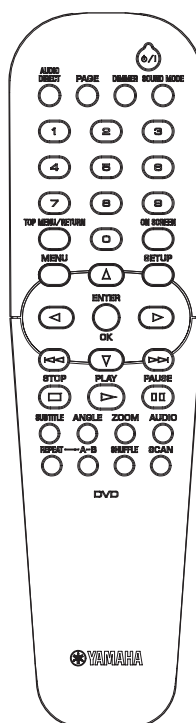
DV-S5860 (U model)



DV-S5860 (A model)



REMOTE CONTROL



■ SPECIFICATIONS / 参考仕様

PLAYBACK SYSTEM / 対応ディスク

DVD Video
 DVD-Audio
 SA-CD multi-channel and SA-CD stereo
 Video CD & SVCD
 CD
 PICTURE CD
 CD-R, CD-RW
 DVD+R, DVD+RW
 DVD-R, DVD-RW

VIDEO PERFORMANCE / ビデオ部

Video (CVBS) Output 1 Vpp into 75 ohms
 S-Video Output Y: 1Vpp into 75 ohms
 C: 0.3Vpp into 75 ohms
 Component Video Output Y: 1Vpp into 75 ohms
 Pb/Cb Pr/Cr: 0.7Vpp into 75 ohms
 RGB (SCART) Output 0.7 Vpp into 75 ohms (B, G models)
 D1/D2 Y:1 Vpp into 75 ohms (J model)
 Pb/Cb Pr/Cr: 0.7Vpp into 75 ohms (J model)

AUDIO FORMAT / オーディオフォーマット

Digital Mpeg/Dolby Digital/Compressed Digital
 DTS
 PCM 16, 20, 24 bits
 fs, 44.1, 48, 96 kHz
 MP3(ISO 9660) 24, 32, 56, 64, 96, 128, 256 kbps
 fs 16, 22.05, 24, 32, 44.1, 48 kHz
 WMA 32 kbps~192 kbps, mono, stereo
 Full decoding of Dolby Digital, DTS and MPEG multi-channel sound/analog stereo sound
 Dolby Surround Compatible Downmix from Dolby Digital multi-channel sound
 3D sound for virtual 5.1 channel sound on two speakers
 Dolby Pro Logic II 5.1 ch decoding from the stereo source

AUDIO PERFORMANCE / オーディオ特性

DA Converter 24 bits
 Signal-Noise (1kHz) 110 dB
 Dynamic Range (1kHz) 100 dB
 DVD fs 96 kHz 2 Hz to 44 kHz
 fs 48 kHz 2 Hz to 22 kHz
 SVCD fs 48 kHz 2 Hz to 22 kHz
 fs 44.1 kHz 2 Hz to 20 kHz
 CD/VCD fs 44.1 kHz 2 Hz to 20 kHz
 Distortion and Noise (1kHz) 0.003%

TV STANDARD (PAL/50Hz) (NTSC/60Hz)

Number of lines 625 525
 Playback Multistandard (PAL/NTSC)

CONNECTIONS / 接続端子

SCART Euroconnector (B, G models)
 D Terminal (J model)
 Y Output Cinch (green)
 Pb/Cb Output Cinch (blue)
 Pr/Cr Output Cinch (red)
 S-Video Output Mini DIN, 4 pins
 Video Output Cinch (yellow)
 Audio Output (L+R) Cinch (white / red)
 Digital Output 1 coaxial, 1 optical
 IEC60958 for CDDA / LPCM / MPEG1
 IEC61937 for MPEG 2, Dolby Digital and DTS

6 channel analog output

Audio Front L/R Cinch (white / red)
 Audio Surround L/R Cinch (white / red)
 Audio Center Cinch (blue)
 Audio Subwoofer Cinch (black)

GENERAL / 一般

Dimensions (W x H x D) / 435 x 51 x 318 mm
 寸法 (幅 x 高さ x 奥行き) (17-1/8" x 2" x 12-1/2")
 Weight / 質量 Approx. 2.6 Kg (5 lbs. 12 oz)
 Finish / 仕上げ [DVD-S657] Gold Color (R, K, J models)
 Black Color (U, A, G, P models)
 Titanium Color (U, B, G models)
 Silver Color (R, G, J models)
 [DV-S5860] Black Color (U model)
 Silver Color (U, A models)
 Power Supply / 電源電圧 AC120V, 60 Hz (U model)
 AC240V, 50 Hz (A model)
 AC110~240V, 50/60 Hz (R, K, P models)
 AC230V, 50 Hz (B, G models)
 AC100V, 50/60 Hz (J model)
 Power Consumption / 消費電力 Approx. 14W
 Standby Power Consumption / < 1W
 待機時消費電力

ACCESSORIES

Remote Control x 1, Battery x 2
 Audio/Video Cable (U, R, K, A, P, J models)
 Audio Pin Cable (B, G models)
 Video Pin Cable (B, G models)

**Specifications subject to change without prior notice.*

U U.S.A and Canada models R General model
 K Korean model A Australian model
 B British model G European model
 P South American model J Japanese model



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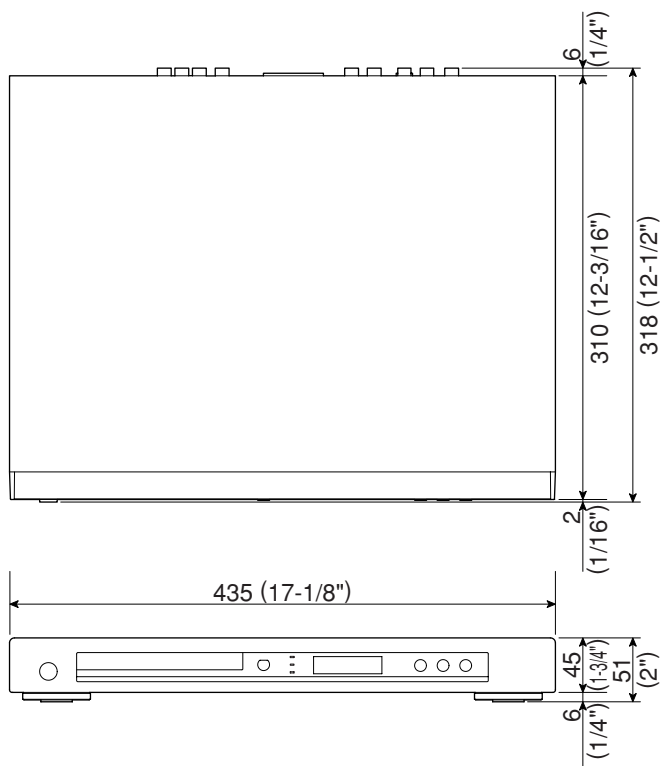


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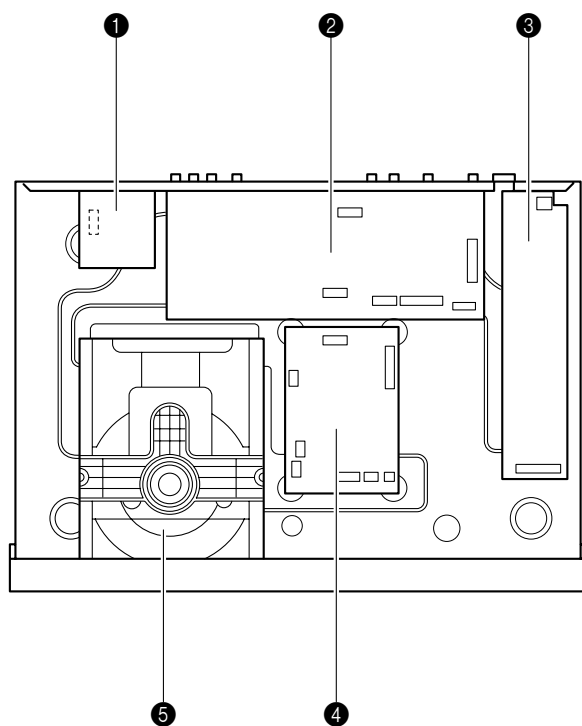
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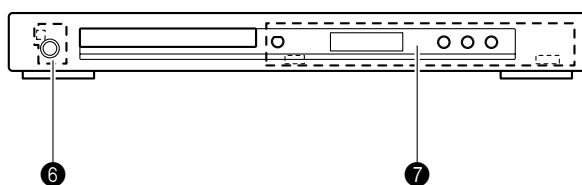
• DIMENSIONS / 寸法図



■ INTERNAL VIEW



- ① HDMI D2 Board (J model)
- ② AV Board
- ③ Power Supply Unit
- ④ MONO Board
- ⑤ DVD Mechanism



- ⑥ Front (2) Standby Board
- ⑦ Front (1) Display Board

REPAIR NOTES / 修理上の留意点

● Repair Tips

None of the components of the following units can be supplied separately.

Each unit must be replaced as a whole in case of a failure.

- DVD Mechanism
- MONO Board
- FRONT Board
- AV Board
- Power Supply Unit

● Power Supply Unit

Never touch the potentiometer (VR301) installed to the Power Supply Unit.

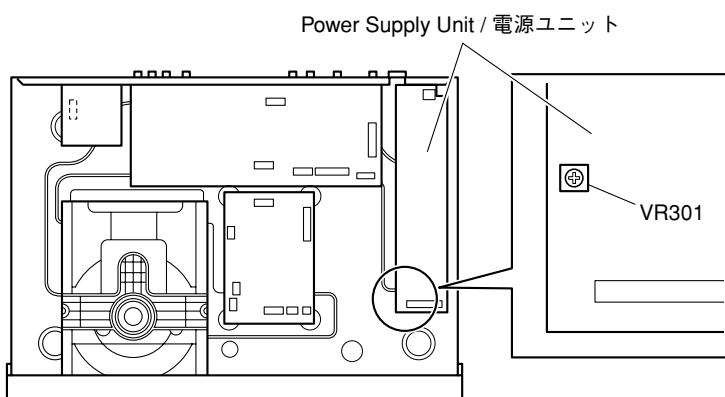
● 修理について

下記のユニットは、小部品の部品供給はできません。故障の場合は、各ユニットを交換してください。

- DVDメカ
- MONO Board
- FRONT Board
- AV Board
- HDMI D2 Board
- 電源ユニット

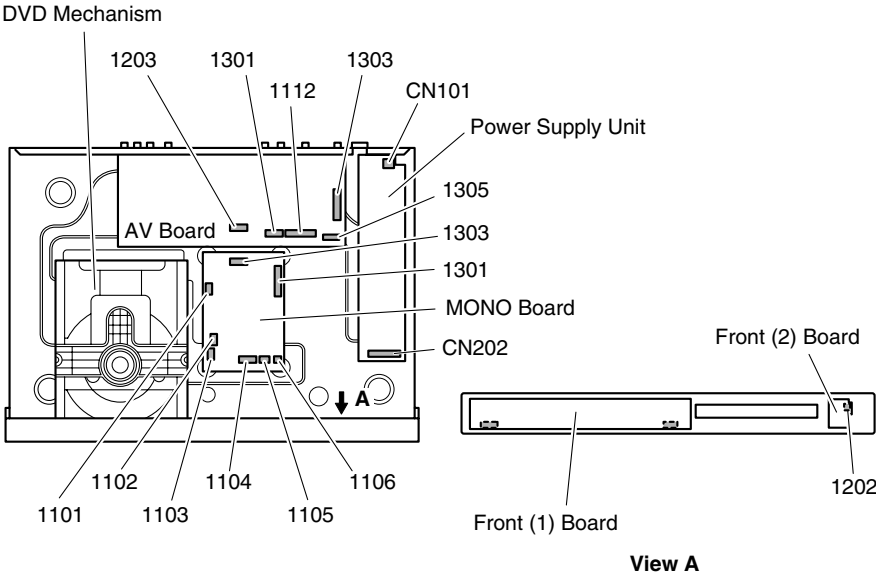
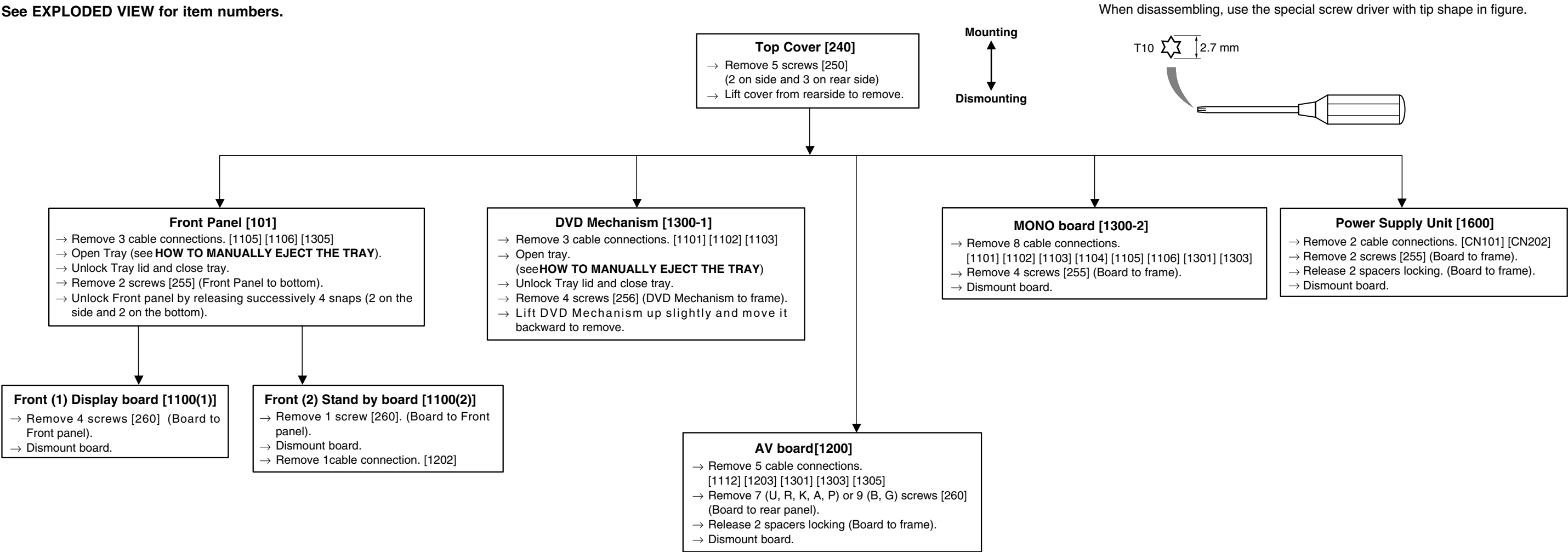
● 電源ユニットについて

電源ユニットに搭載されている可変抵抗 (VR301) は、絶対に触らないでください。



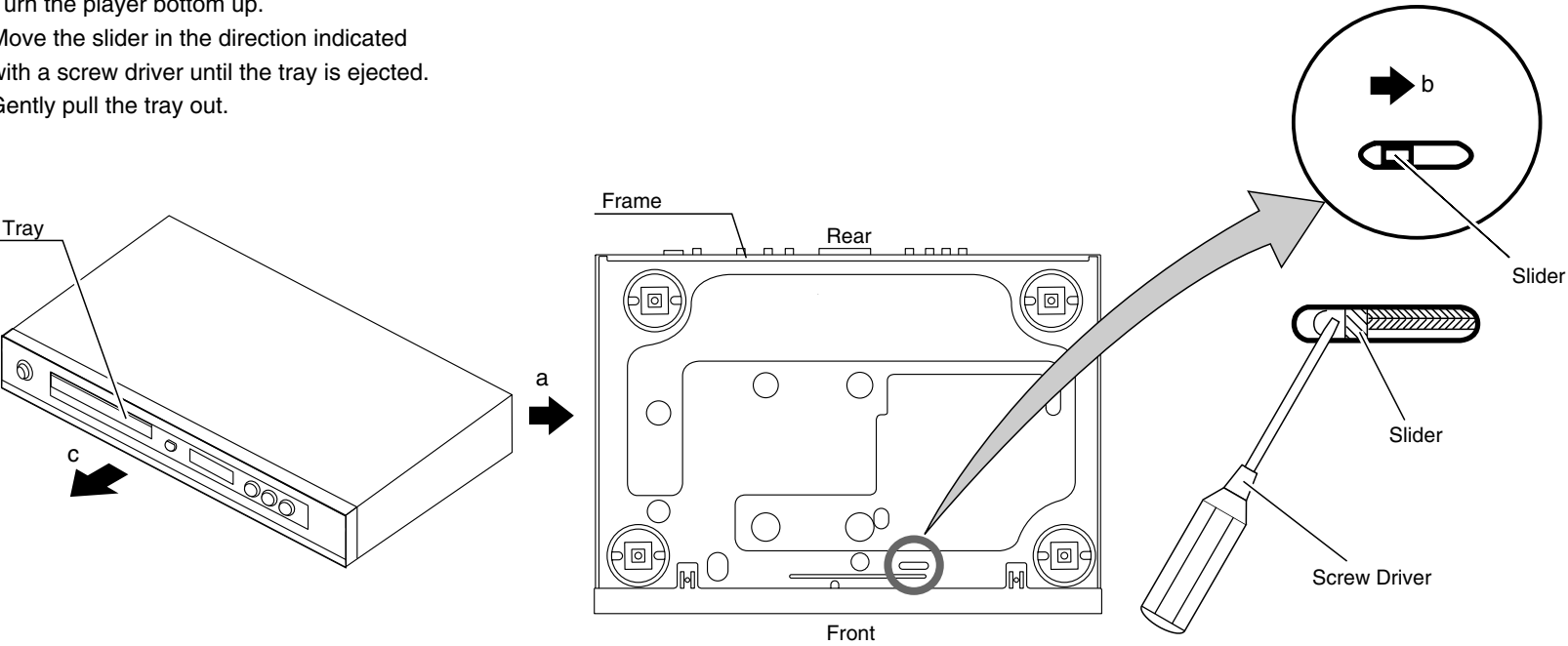
■ DISASSEMBLY PROCEDURES

See EXPLODED VIEW for item numbers.



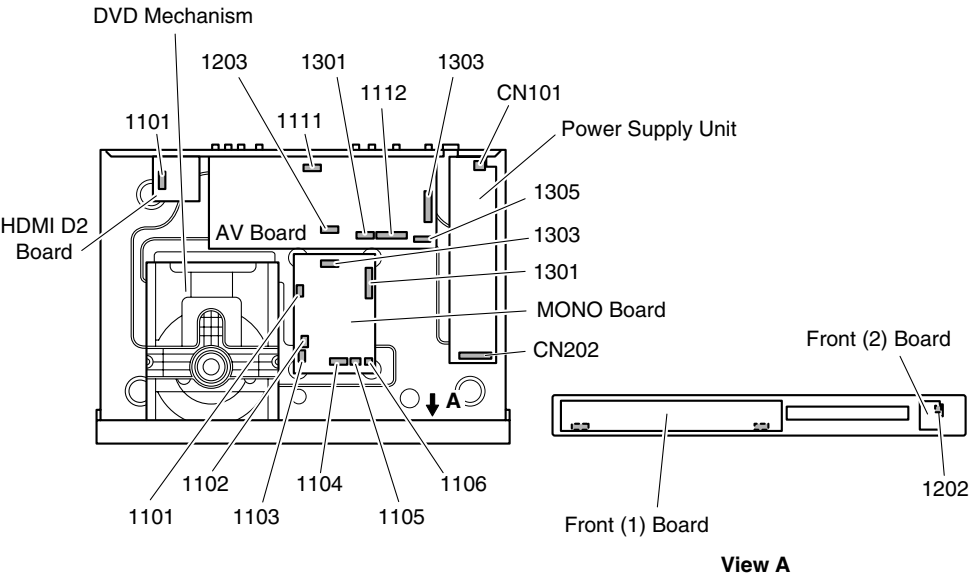
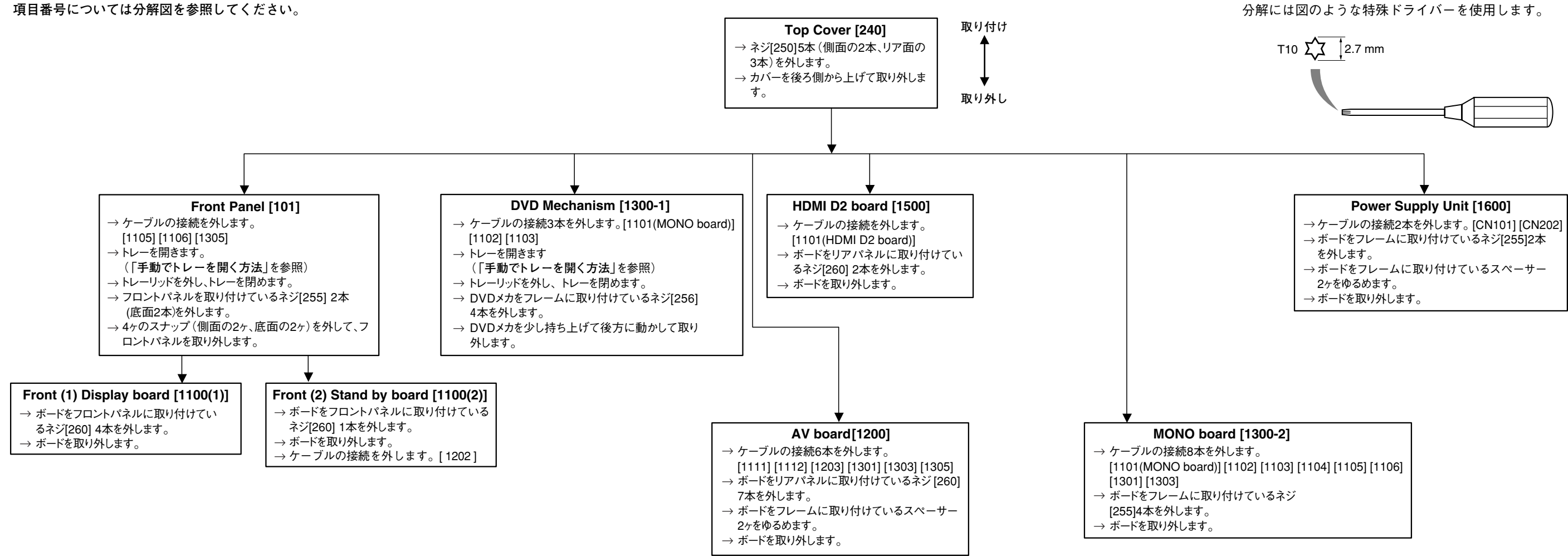
● HOW TO MANUALLY EJECT THE TRAY

- Turn the player bottom up.
- Move the slider in the direction indicated with a screw driver until the tray is ejected.
- Gently pull the tray out.



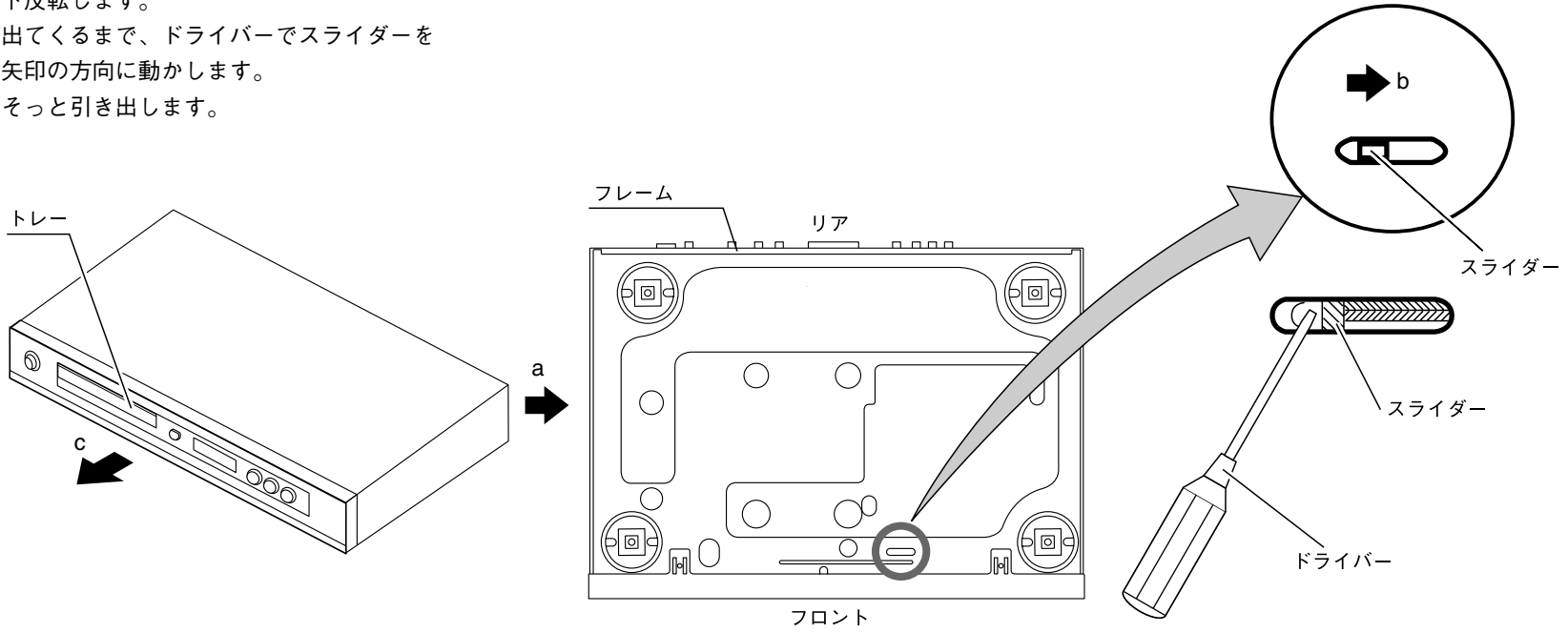
■ 分解手順

項目番号については分解図を参照してください。

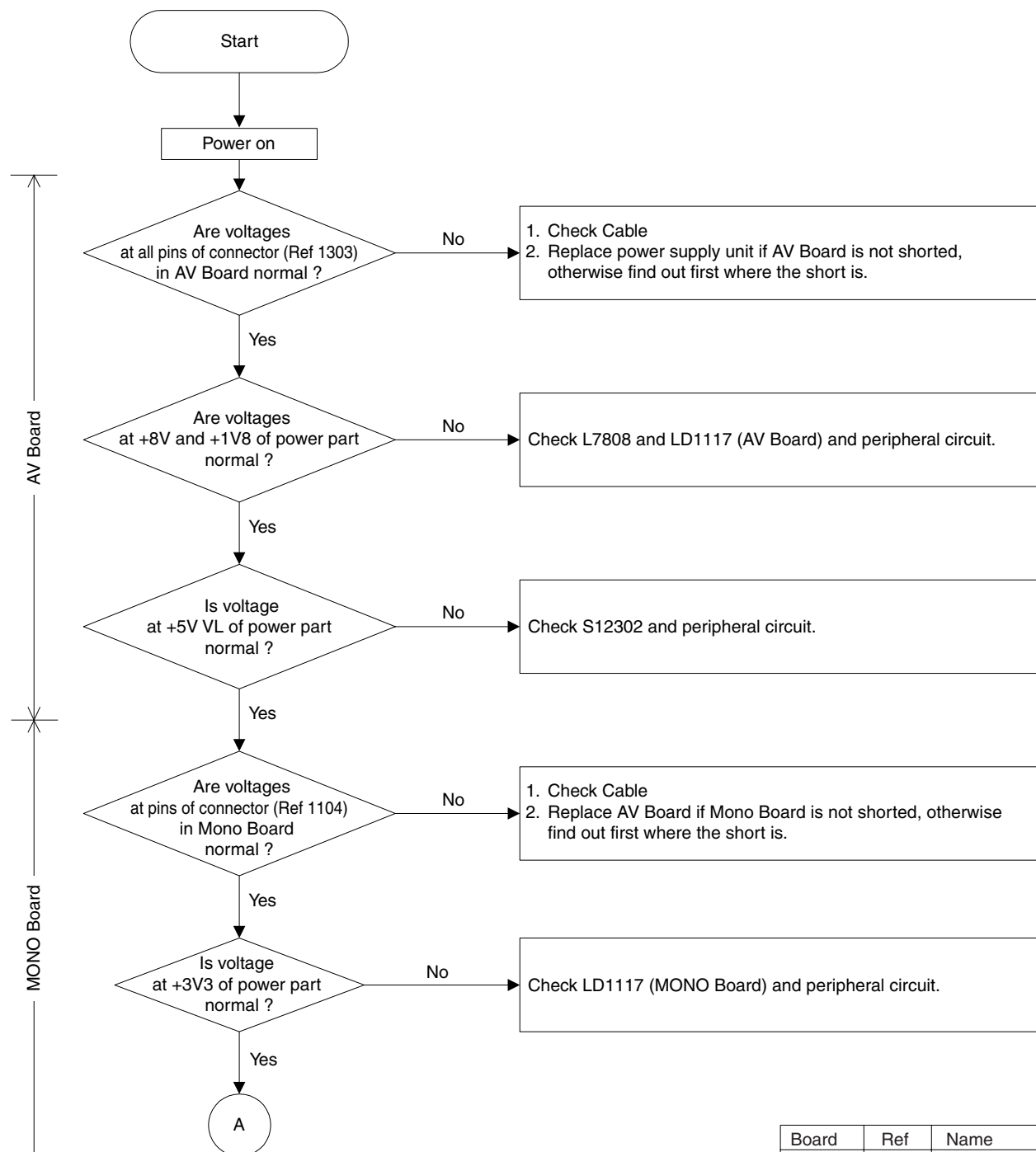


● 手動でトレーを開く方法

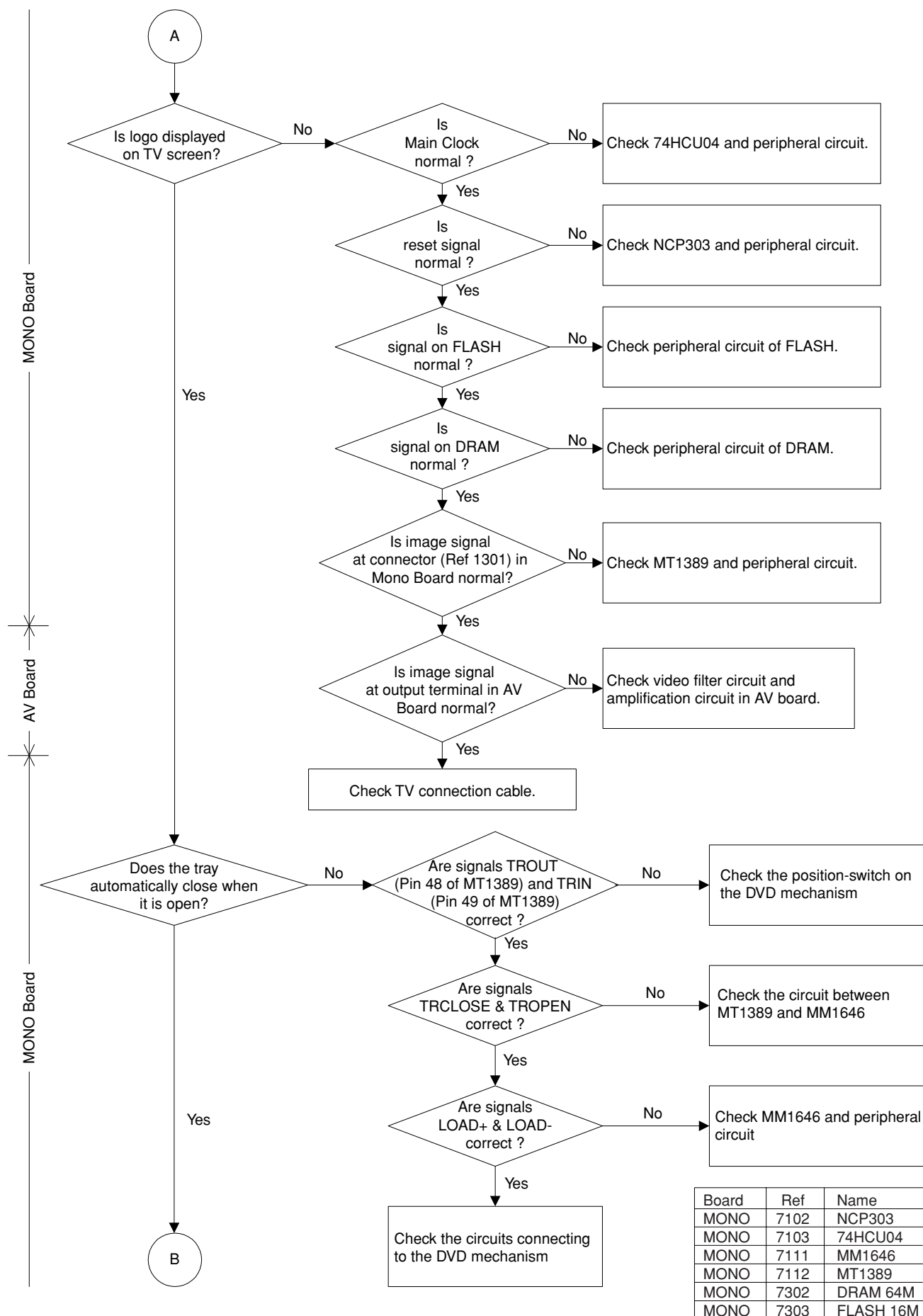
- a. 本体を上下反転します。
- b. トレーが出てくるまで、ドライバーでスライダーを図に示す矢印の方向に動かします。
- c. トレーをそっと引き出します。

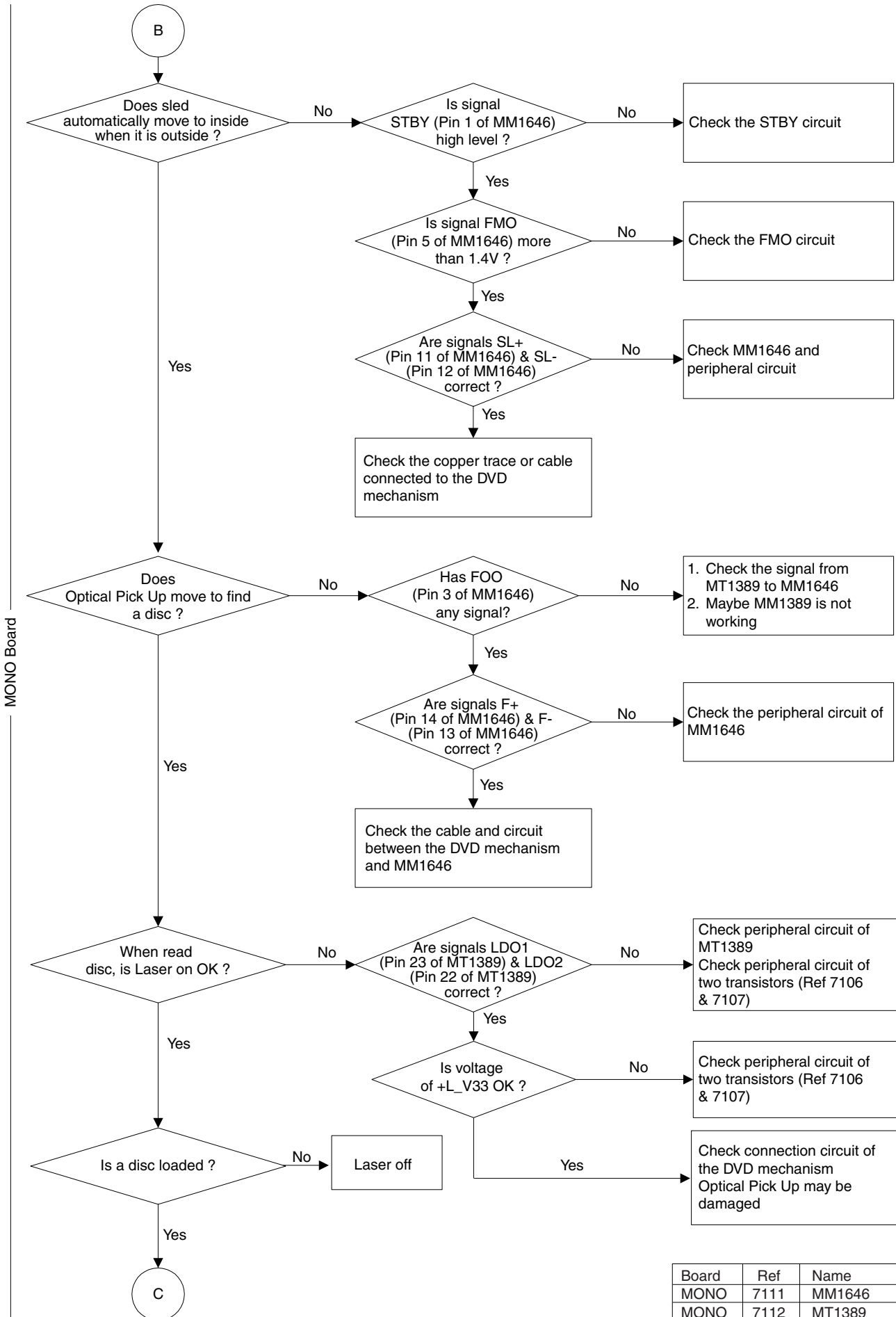


■ MAINTENANCE FLOW CHART

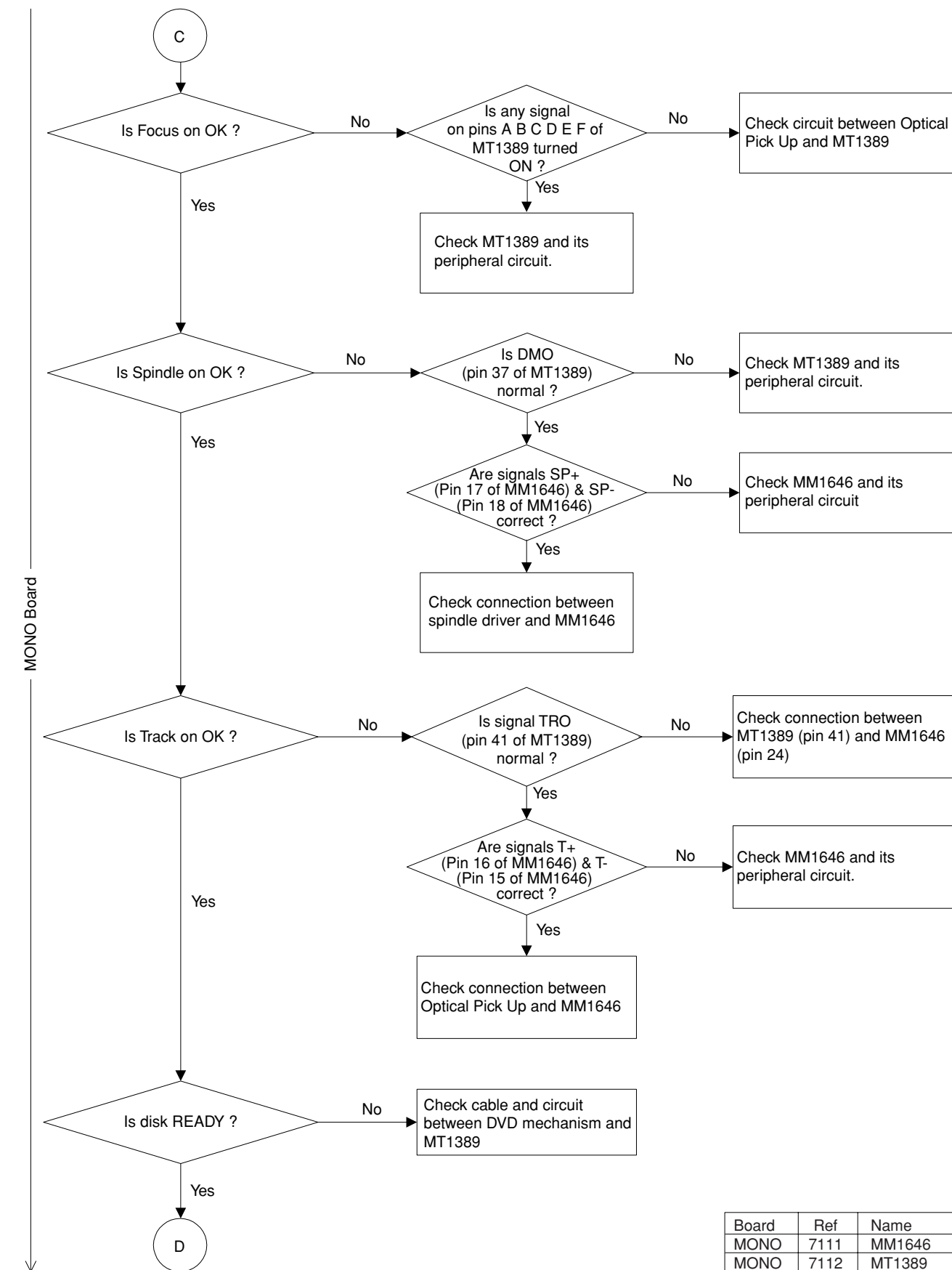


Board	Ref	Name
MONO	7101	LD1117
AV	7301	L7808
AV	7303	LD1117
AV	7306	S12302

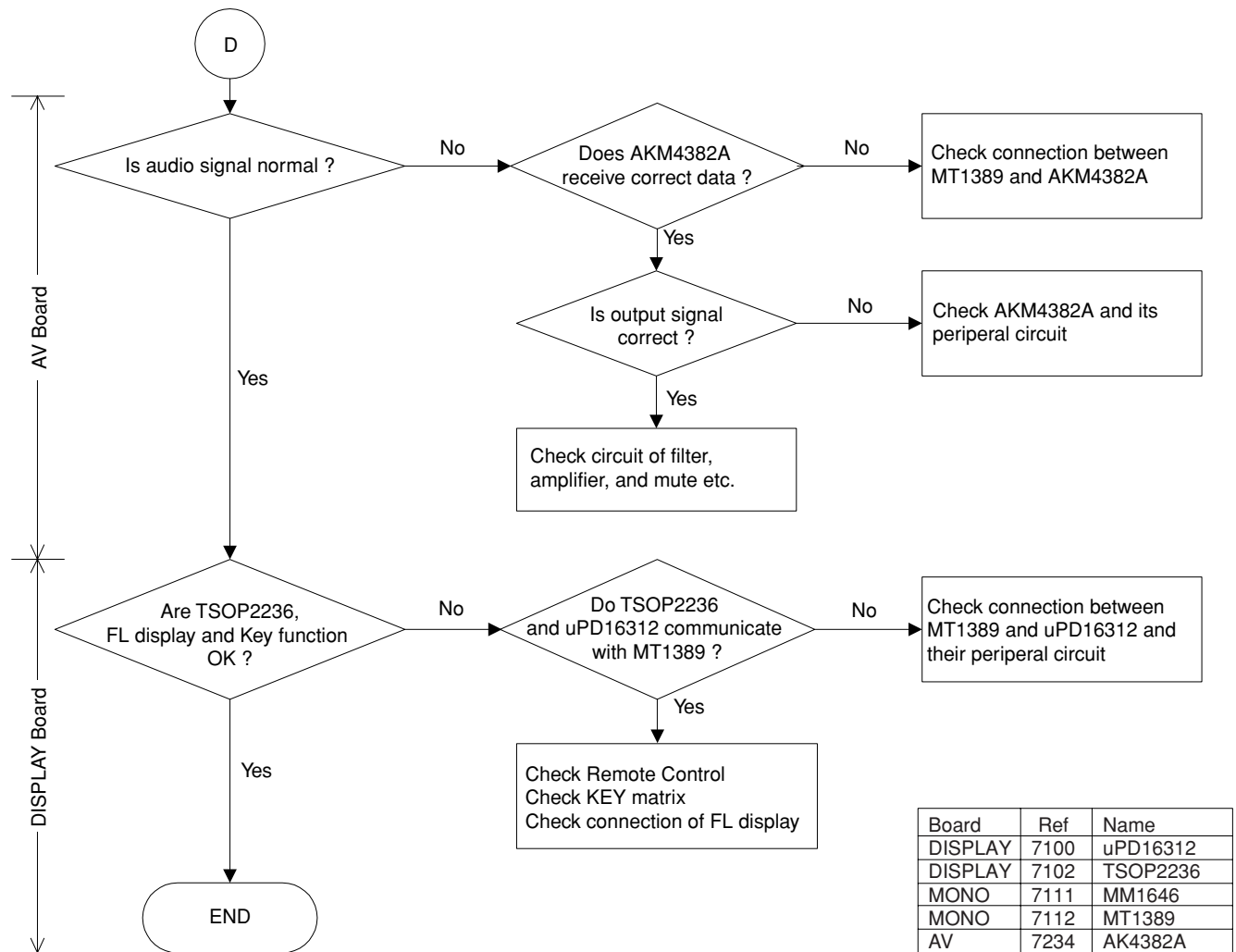




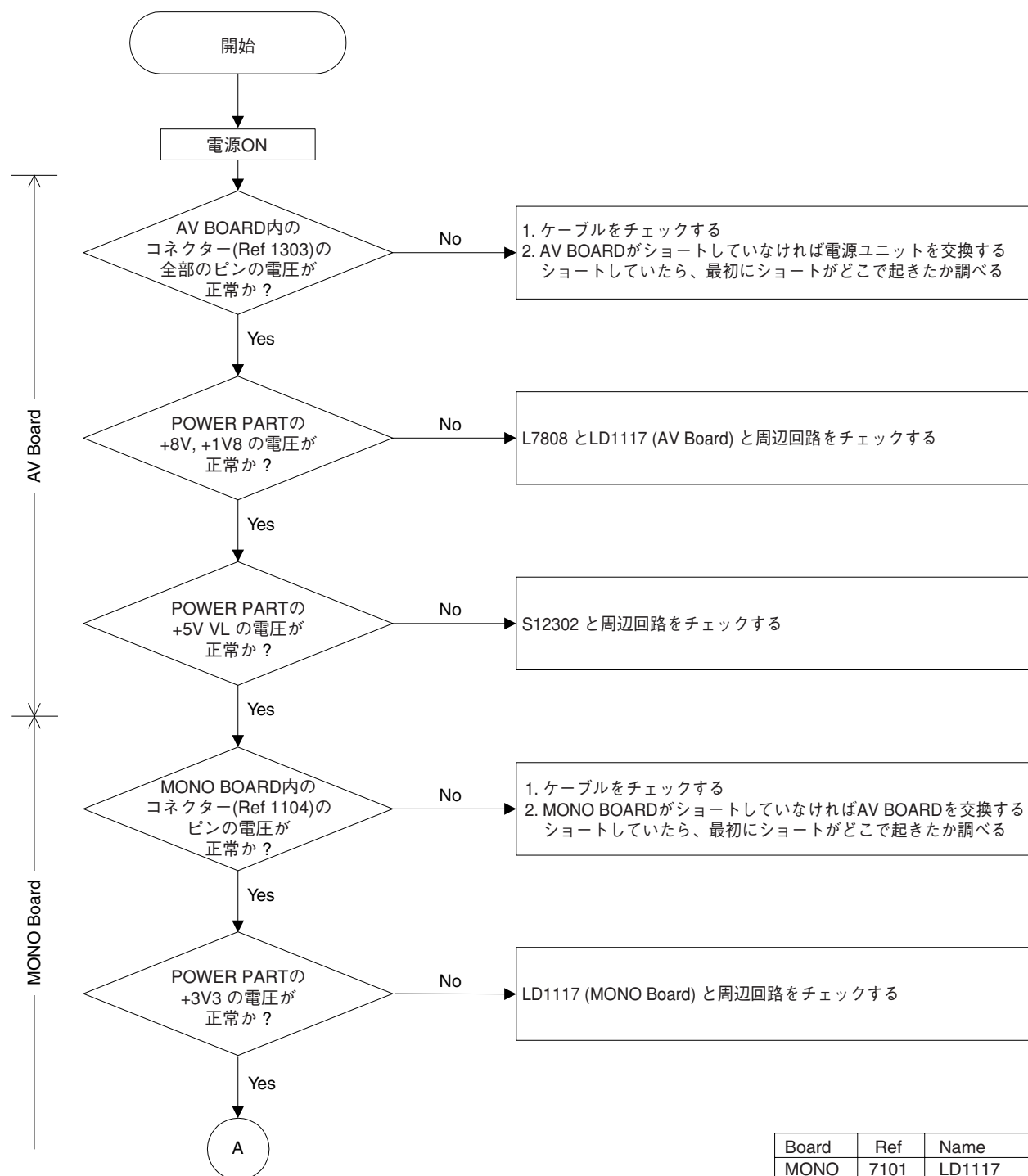
Board	Ref	Name
MONO	7111	MM1646
MONO	7112	MT1389



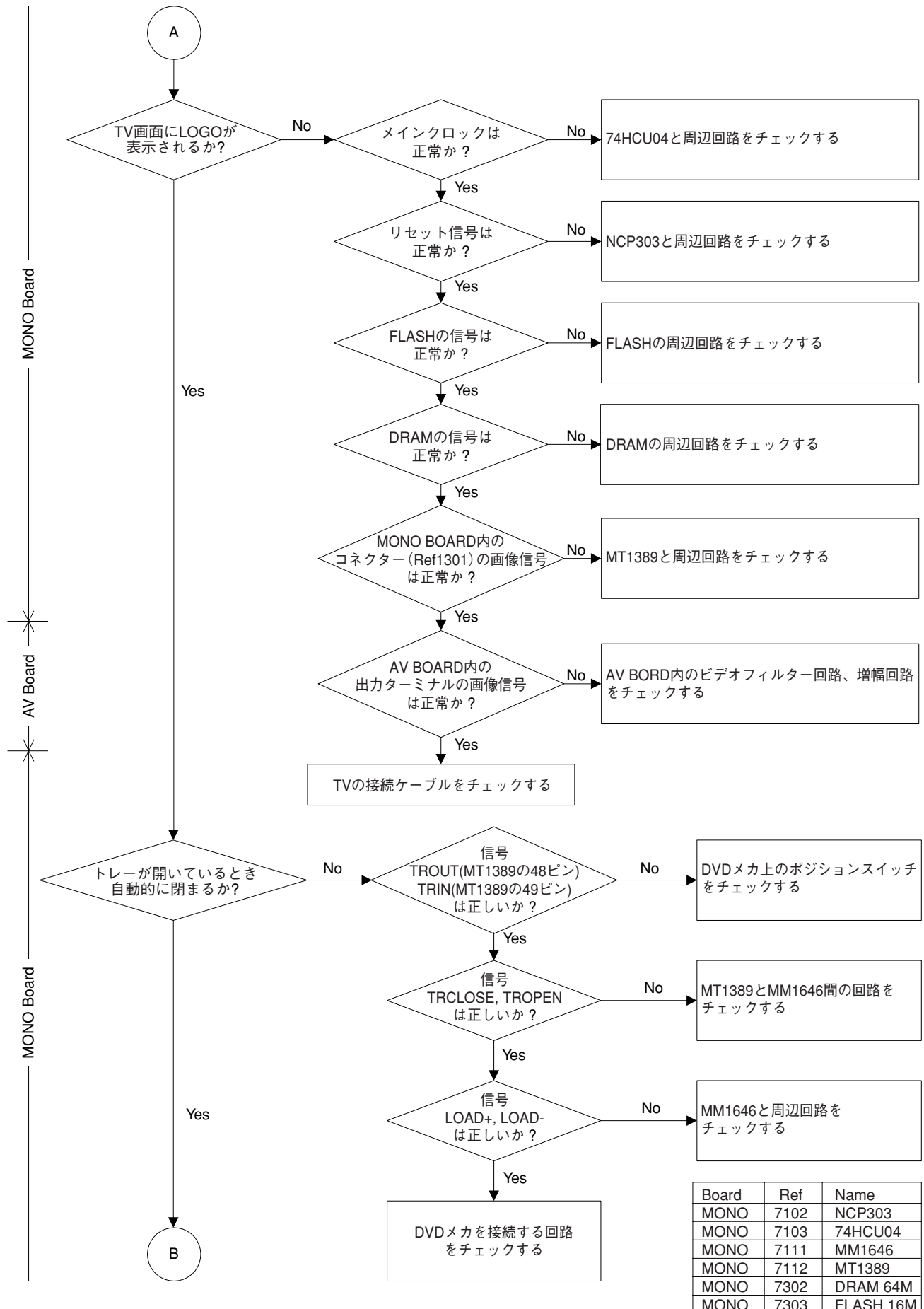
Board	Ref	Name
MONO	7111	MM1646
MONO	7112	MT1389

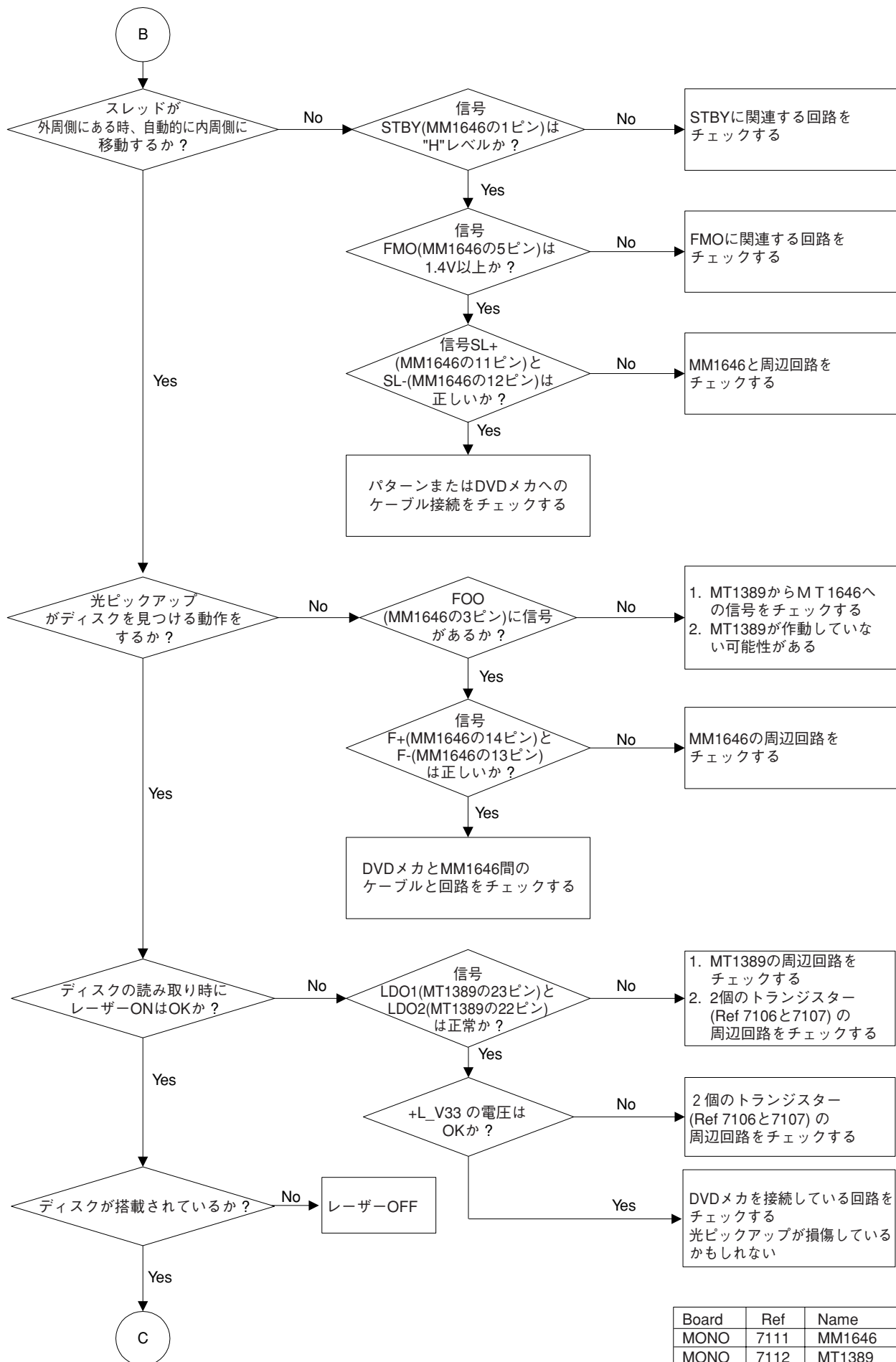


■ メンテナンスフローチャート

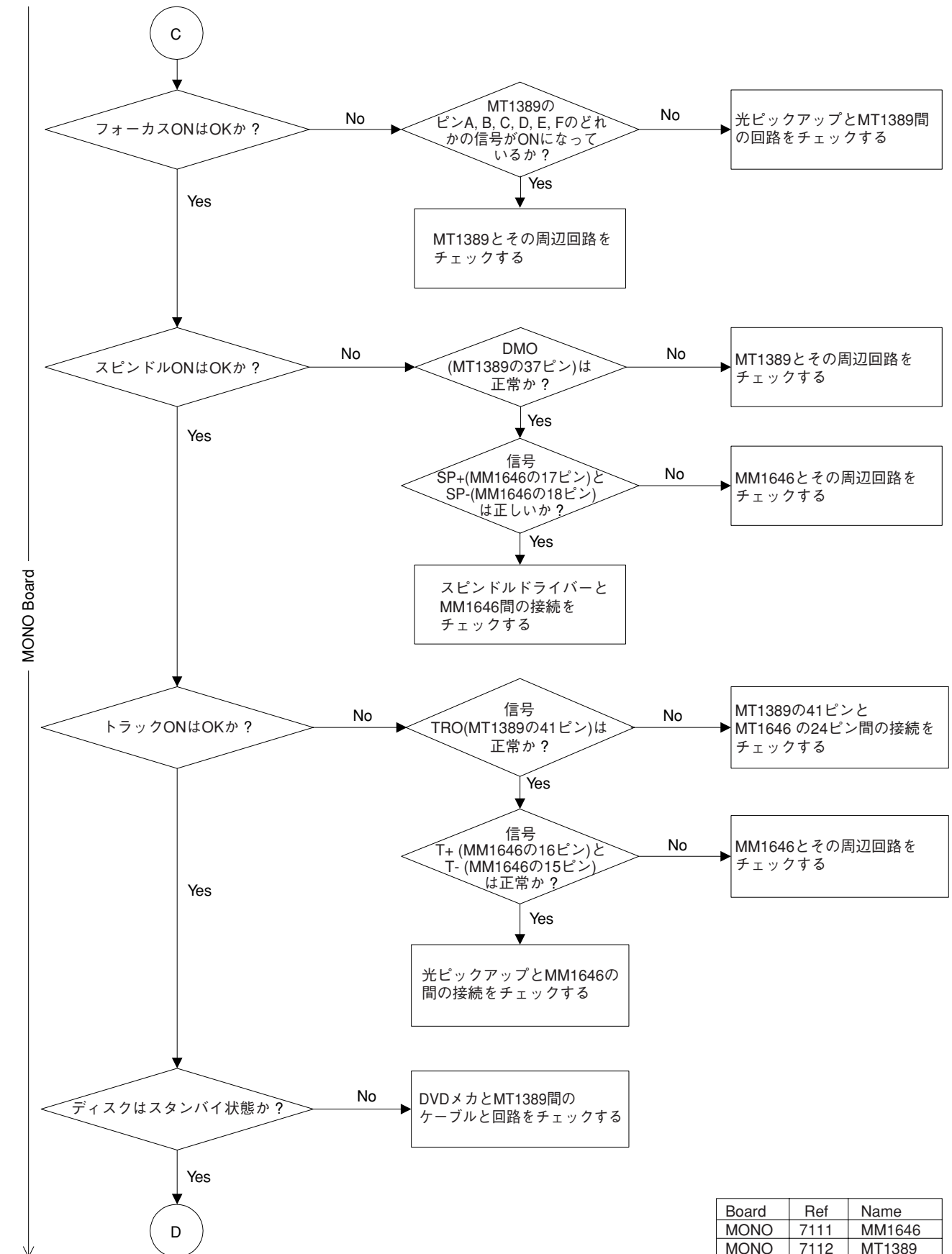


Board	Ref	Name
MONO	7101	LD1117
AV	7301	L7808
AV	7303	LD1117
AV	7306	S12302

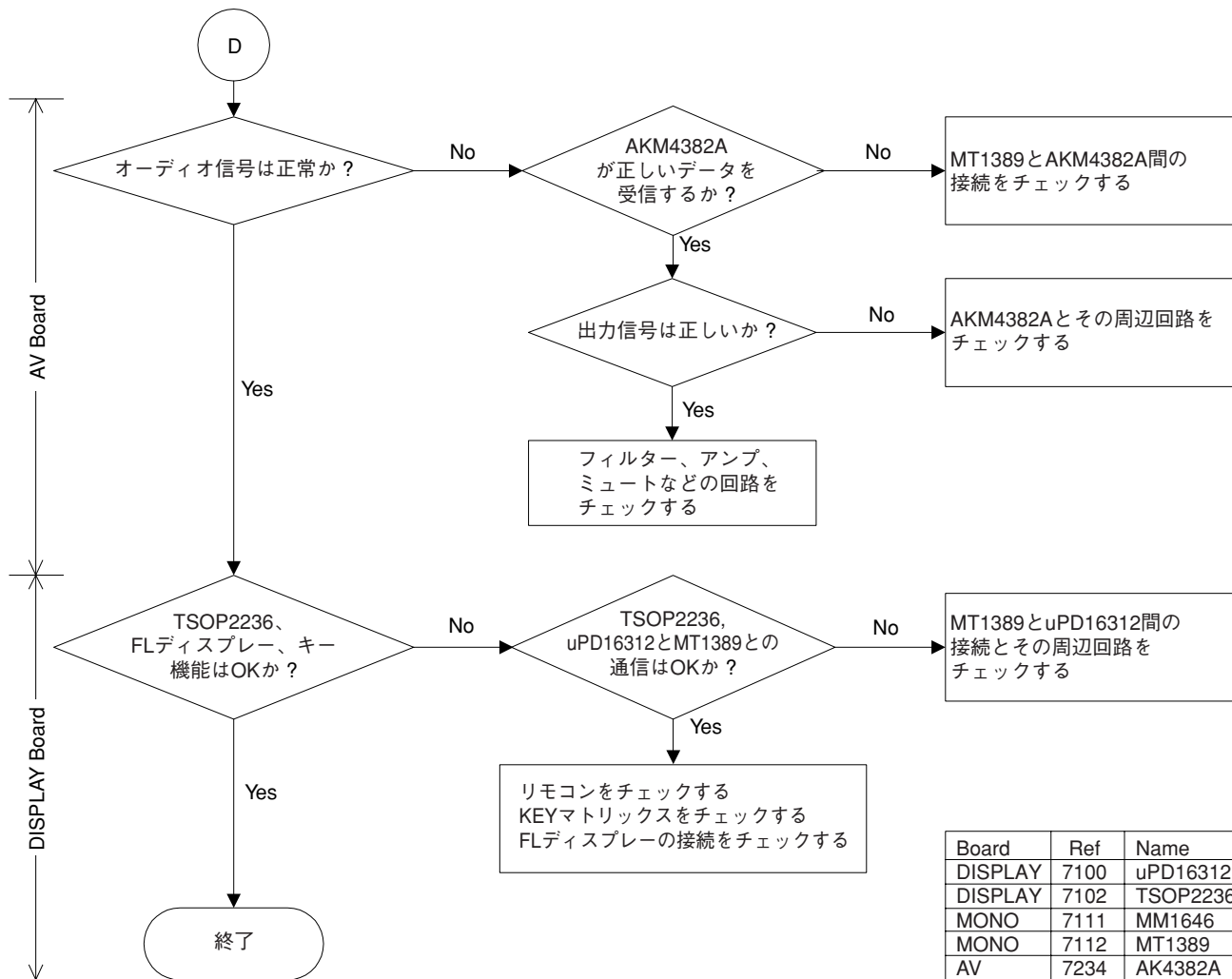




Board	Ref	Name
MONO	7111	MM1646
MONO	7112	MT1389

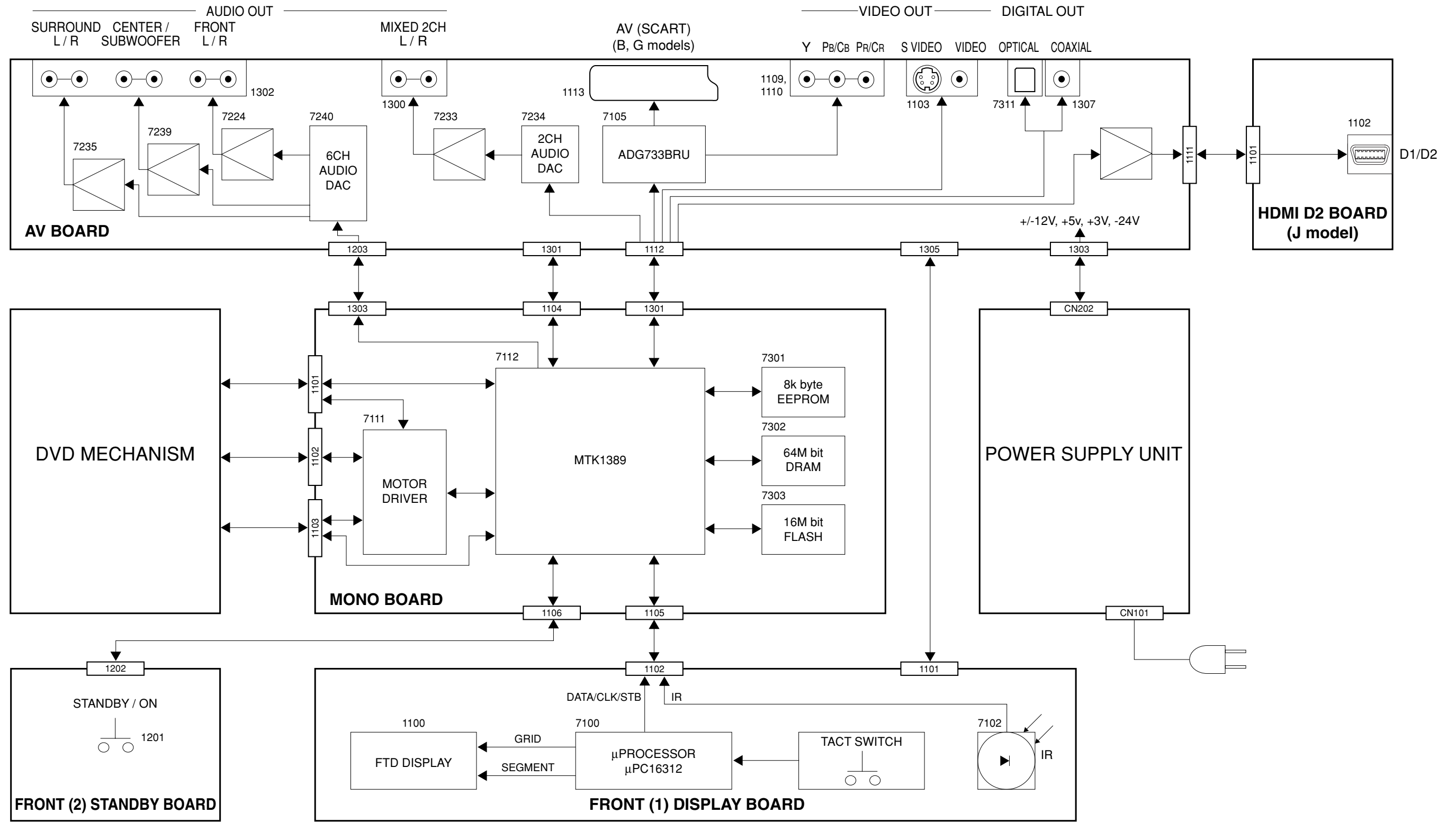


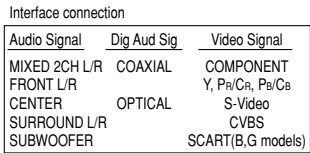
Board	Ref	Name
MONO	7111	MM1646
MONO	7112	MT1389



Board	Ref	Name
DISPLAY	7100	uPD16312
DISPLAY	7102	TSOP2236
MONO	7111	MM1646
MONO	7112	MT1389
AV	7234	AK4382A

■ BLOCK DIAGRAM

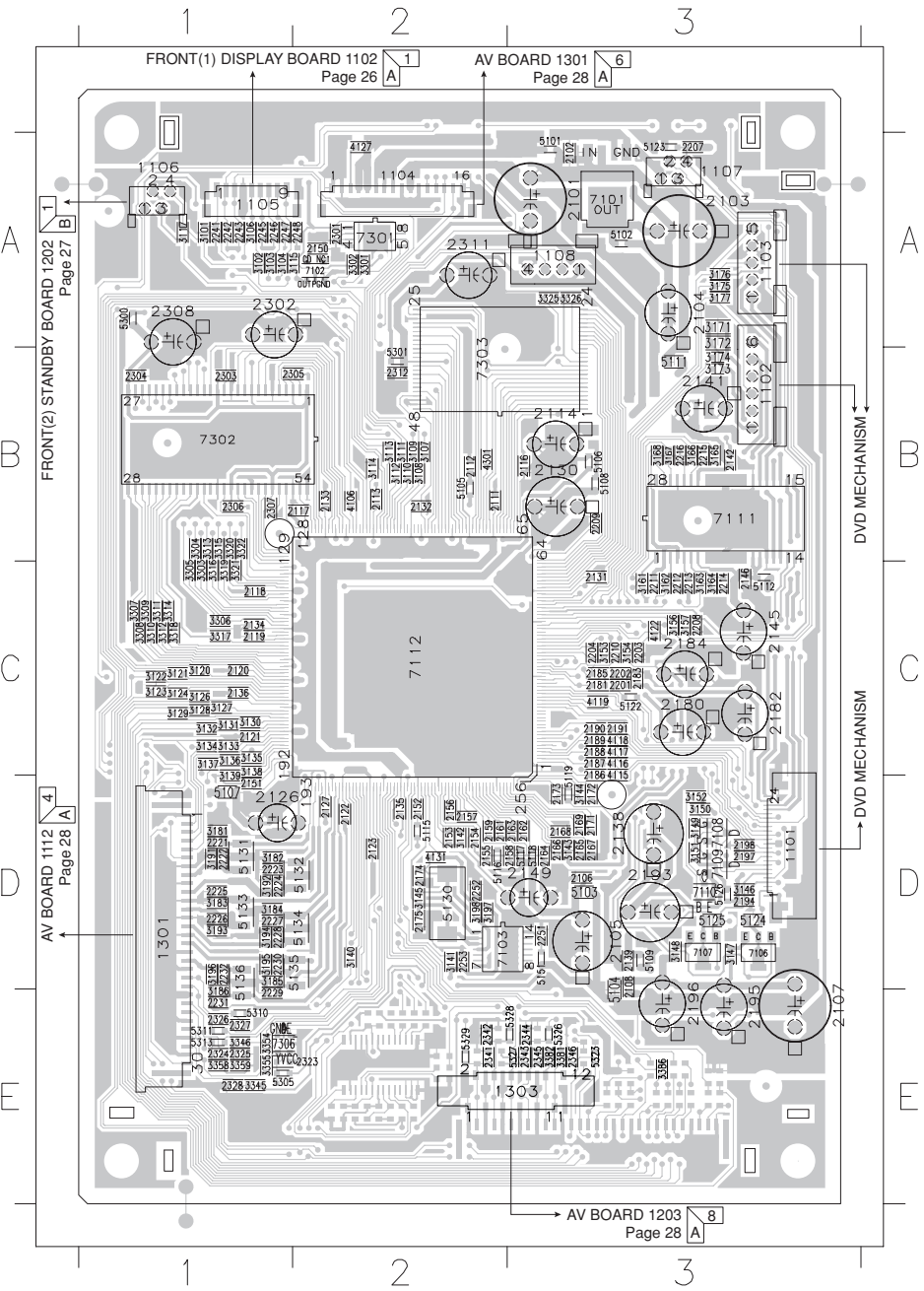




■ PRINTED CIRCUIT BOARD

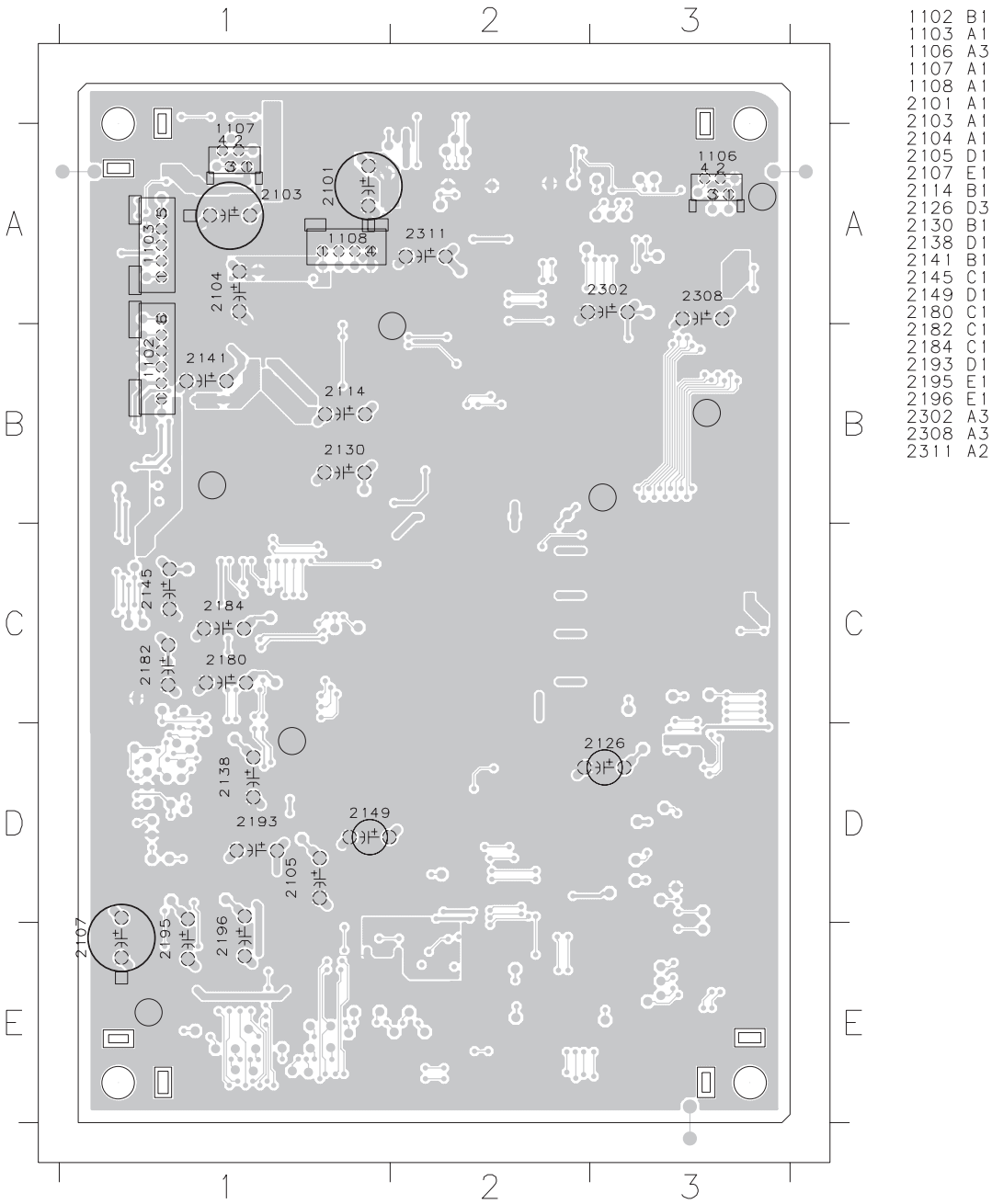
FOR INFORMATION ONLY (NO SERVICE PARTS WILL BE AVAILABLE)

MONO Board-Top View



1101 D3	2172 D3	2311 A2	3162 C3	4119 C3
1102 B3	2173 D3	2312 B2	3163 C3	4122 C3
1103 A3	2174 D2	2323 E1	3164 C3	4127 A2
1104 A2	2175 D2	2324 E1	3165 B3	4131 D2
1105 A1	2180 C3	2325 E1	3166 B3	4301 B2
1106 A1	2181 C3	2326 E1	3167 B3	5101 A3
1107 A3	2182 C3	2327 E1	3168 B3	5102 A3
1108 A3	2183 C3	2328 E1	3171 A3	5103 D3
1301 D1	2184 C3	2341 E3	3172 A3	5104 E3
1303 E3	2185 C3	2342 E2	3173 B3	5105 B2
2101 A3	2186 C3	2343 E3	3174 B3	5106 B3
2102 A3	2187 C3	2344 E3	3175 A3	5107 D1
2103 A3	2188 C3	2345 E3	3176 A3	5108 B3
2104 A3	2189 C3	2346 E3	3177 A3	5109 D3
2105 D3	2190 C3	3101 A1	3181 D1	5111 B3
2106 D3	2191 C3	3102 A1	3182 D1	5112 C3
2107 E3	2193 D3	3103 A1	3183 D1	5115 D2
2108 D3	2194 D3	3104 A1	3184 D1	5116 D2
2111 B2	2195 E3	3106 A1	3185 D1	5117 D3
2112 B2	2196 E3	3107 B2	3186 E1	5118 D3
2113 B2	2197 D3	3108 B2	3191 D1	5119 D3
2114 B3	2198 D3	3109 B2	3192 D1	5122 C3
2116 B3	2201 C3	3110 B2	3193 D1	5123 A3
2117 B2	2202 C3	3111 B2	3194 D1	5124 D3
2118 C1	2203 C3	3112 B2	3195 D1	5125 D3
2119 C1	2204 C3	3113 B2	3196 D1	5126 D3
2120 C1	2207 A3	3114 B2	3197 D2	5130 D2
2121 C1	2208 C3	3115 A2	3198 D2	5131 D1
2122 D2	2209 B3	3117 A1	3301 A2	5132 D2
2123 D2	2210 C3	3120 C1	3302 A2	5133 D1
2126 D1	2211 C3	3121 C1	3303 C1	5134 D2
2127 D2	2212 C3	3122 C1	3304 B1	5135 D2
2130 B3	2213 C3	3123 C1	3305 C1	5136 D1
2131 C3	2214 C3	3124 C1	3306 C1	5151 D3
2132 B2	2215 B3	3126 C1	3307 C1	5300 A1
2133 B2	2216 B3	3127 C1	3308 C1	5301 B2
2134 C1	2221 D1	3128 C1	3309 C1	5305 E1
2135 D2	2222 D1	3129 C1	3310 C1	5310 E1
2136 C1	2223 D1	3130 C1	3311 C1	5311 E1
2138 D3	2224 D1	3131 C1	3312 C1	5313 E1
2139 D3	2225 D1	3132 C1	3313 B1	5323 E3
2141 B3	2226 D1	3133 C1	3314 C1	5326 E3
2142 B3	2227 D1	3134 C1	3315 B1	5327 E3
2145 C3	2228 D1	3135 C1	3316 C1	5328 E3
2146 C3	2229 E1	3136 C1	3317 C1	5329 E3
2149 D3	2230 D1	3137 C1	3318 C1	7101 A3
2150 A2	2231 E1	3138 C1	3319 C1	7102 A2
2151 D1	2232 D1	3139 D1	3320 B1	7103 D2
2152 D2	2241 A1	3140 D2	3321 C1	7106 D3
2153 D2	2242 A1	3141 D2	3322 B1	7107 D3
2154 D2	2243 A1	3142 D2	3325 A3	7108 D3
2155 D2	2245 A1	3143 D3	3326 A3	7109 D3
2156 D2	2246 A1	3144 D3	3345 E1	7110 D3
2157 D2	2247 A1	3145 D2	3346 E1	7111 B3
2158 D3	2248 A2	3146 D3	3354 E1	7112 C2
2159 D2	2251 D3	3147 D3	3355 E1	7301 A2
2161 D2	2252 D2	3148 D3	3358 E1	7302 B1
2162 D3	2253 D2	3149 D3	3359 E1	7303 B2
2163 D3	2301 A2	3150 D3	3381 E3	7306 E1
2164 D3	2302 A1	3151 D3	3382 E3	
2165 D3	2303 B1	3152 D3	3386 E3	
2166 D3	2304 B1	3153 C3	4106 B2	
2167 D3	2305 B2	3154 C3	4115 C3	
2168 D3	2306 B1	3156 C3	4116 C3	
2169 D3	2307 B1	3157 C3	4117 C3	
2171 D3	2308 A1	3161 C3	4118 C3	

MONO Board-Bottom View



The first digit of a component indicates the component type.

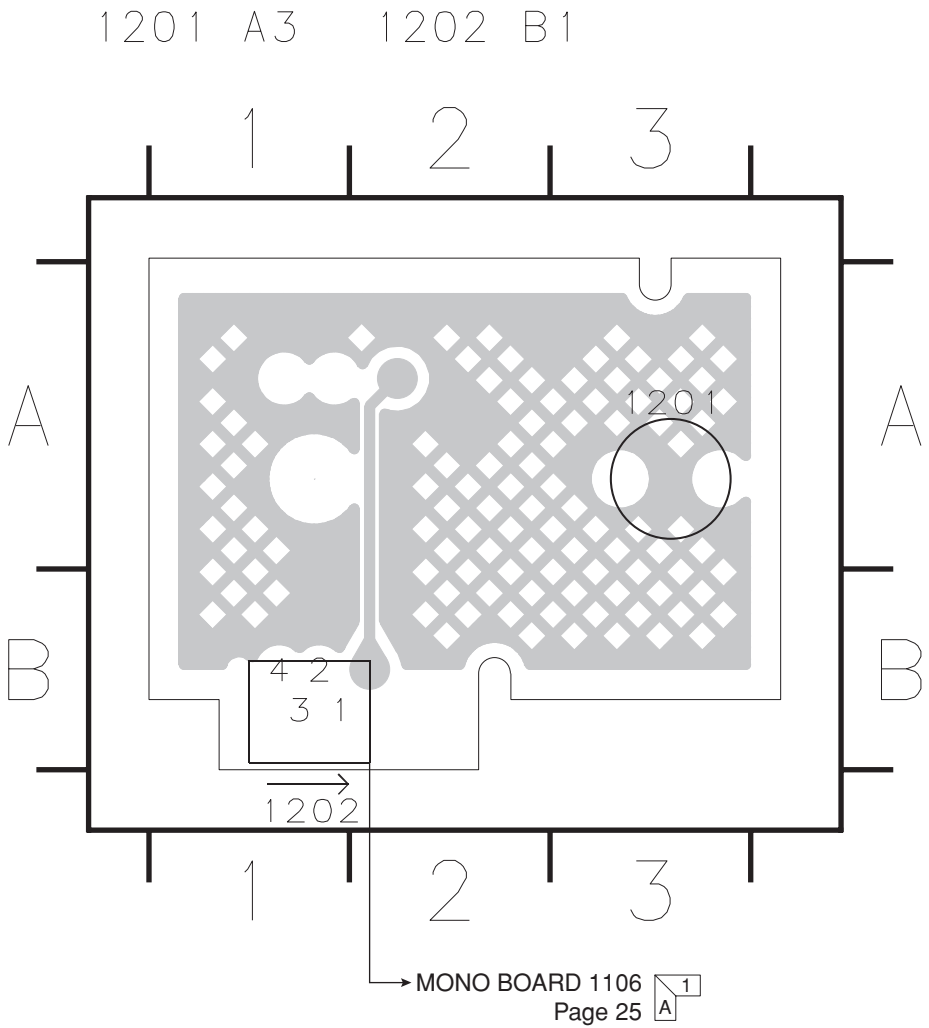
1xxx : Connector 3xxx : Resistor 5xxx : Coil 7xxx : IC, Transistor, FET
2xxx : Capacitor 4xxx : SMD jumper 6xxx : Diode 9xxx : Wire jumper

■ **PRINTED CIRCUIT BOARD**
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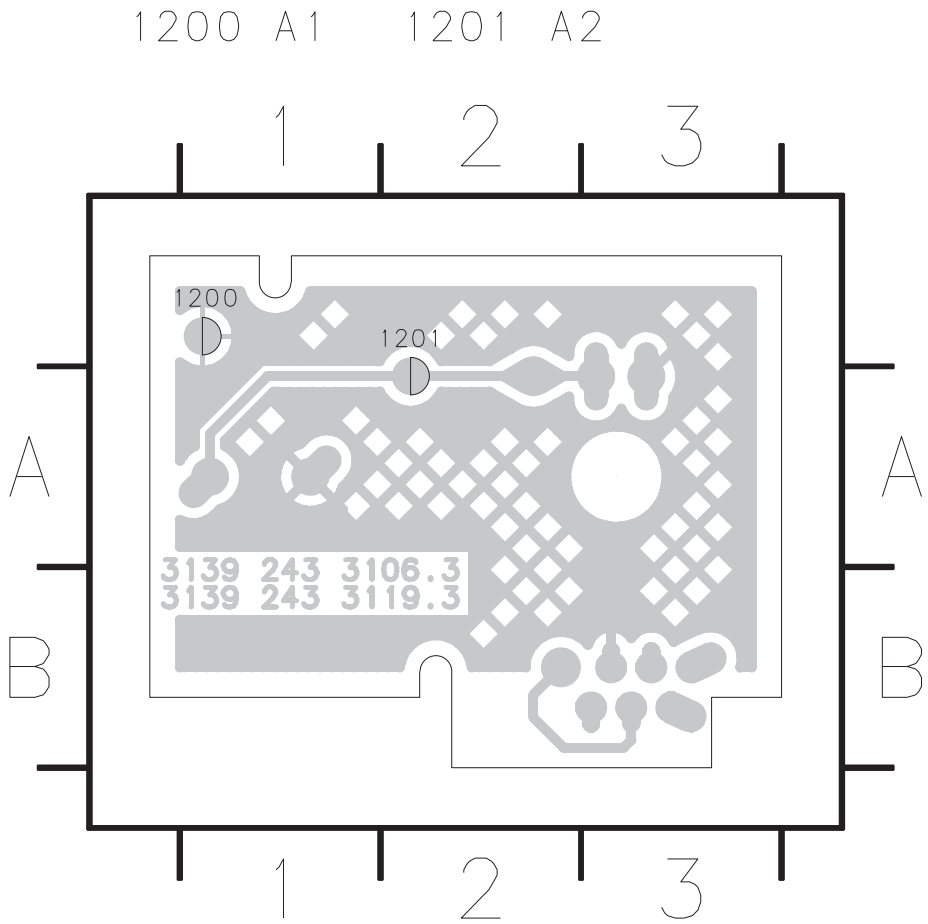
The first digit of a component indicates the component type.

1xxx : Connector	3xxx : Resistor	5xxx : Coil	7xxx : IC, Transistor, FET
2xxx : Capacitor	4xxx : SMD jumper	6xxx : Diode	9xxx : Wire jumper

FRONT (2) Standby Board-Top View



FRONT (2) Standby Board-Bottom View

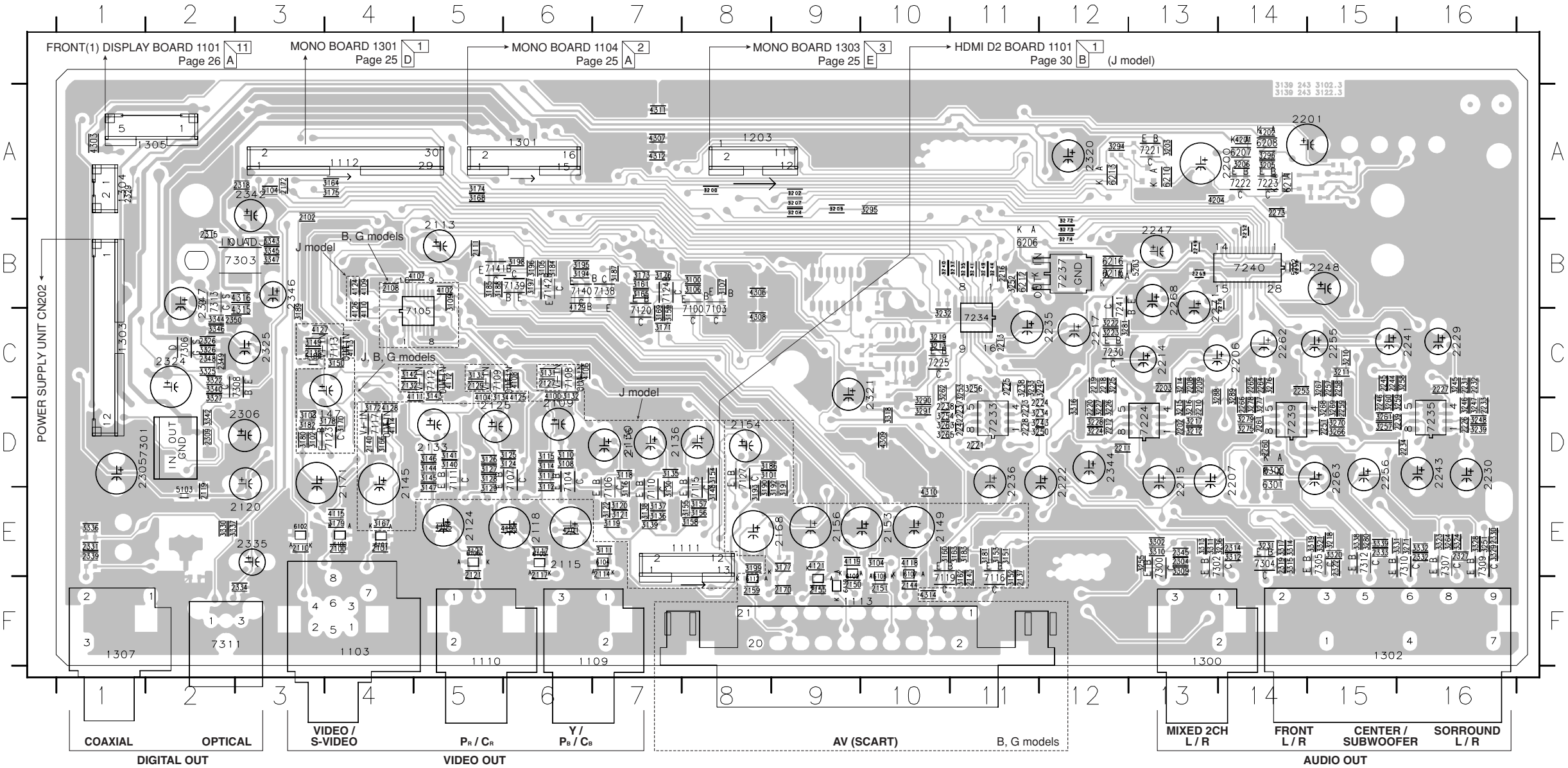


PRINTED CIRCUIT BOARD
FOR INFORMATION ONLY (NO SERVICE PARTS WILL BE AVAILABLE)

AV Board-Top View

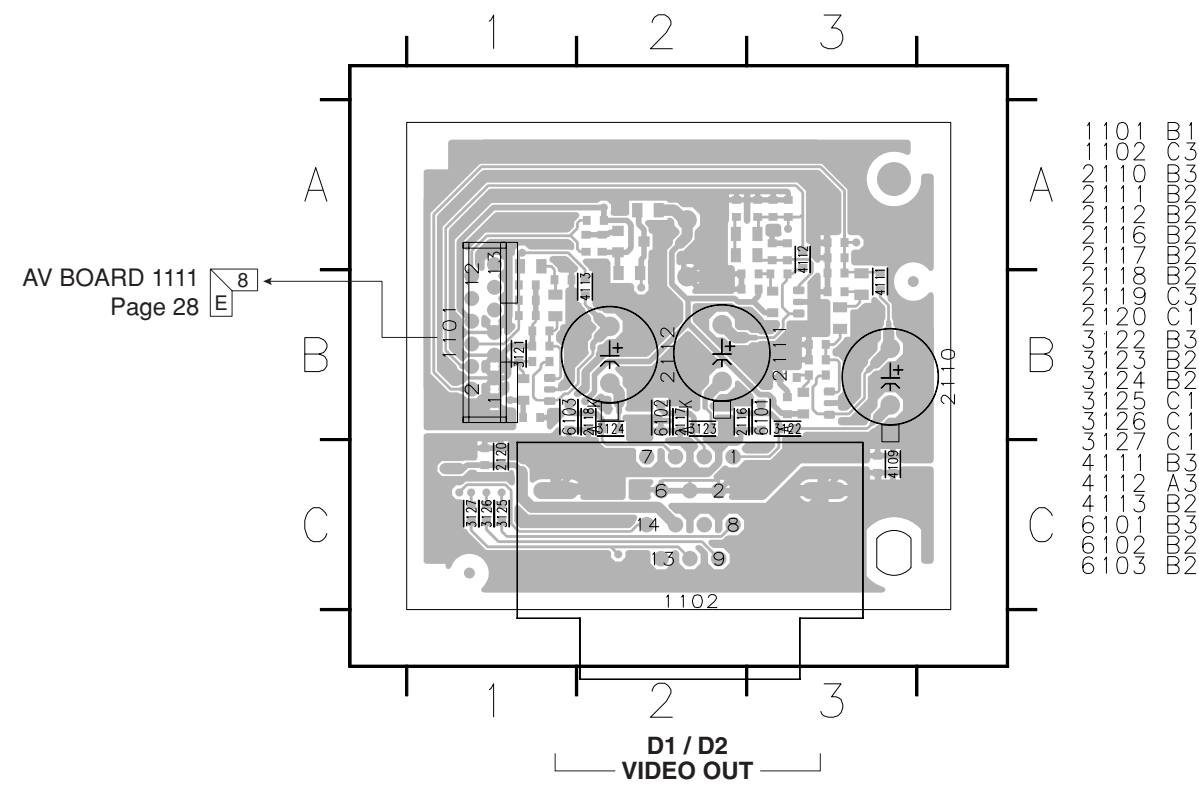
The first digit of a component indicates the component type.
1xxx : Connector 3xxx : Resistor 5xxx : Coil 7xxx : IC, Transistor, FET
2xxx : Capacitor 4xxx : SMD jumper 6xxx : Diode 9xxx : Wire jumper

AV BOARD						
Ref. No.	J	U	R	K	A	P
2101	X					X
2115	O					X
2118	O					X
2124	O					X
2172	X					X
3111	O					O
3117	O					O
3123	O					O
3179	O					O
4100	X					O
4101	X					O
4103	X					O
4104	X					O
4105	X					O
4106	X					O
4107	O					X
4107	O					X
4108	X					O
4110	O					X
4111	X					O
4112	X					O
4113	X					X
4114	X					O
4115	X					X
6100	X					X
6101	X					X
6104	X					X

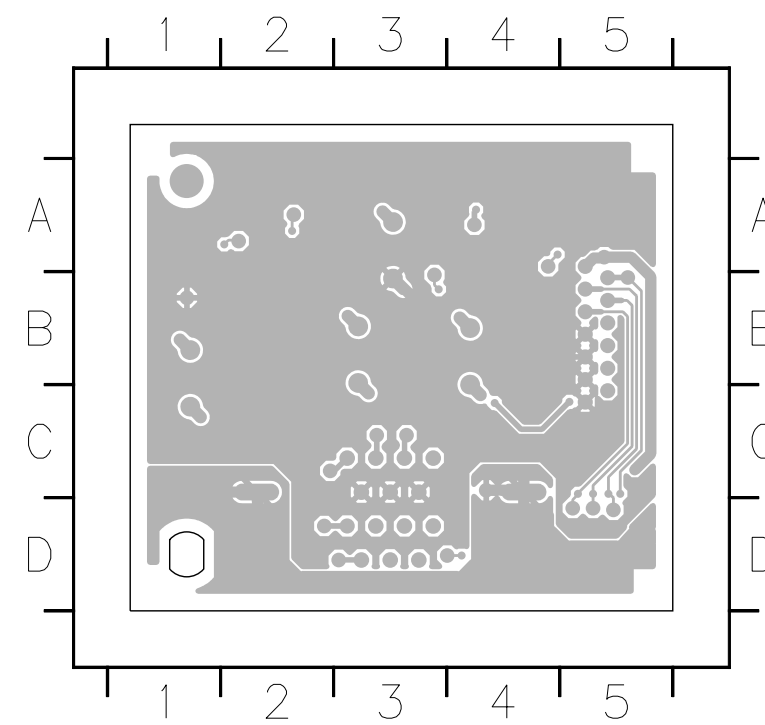


1xxx : Connector	3xxx : Resistor	5xxx : Coil	7xxx : IC, Transistor, FET
2xxx : Capacitor	4xxx : SMD jumper	6xxx : Diode	9xxx : Wire jumper

J model



J model

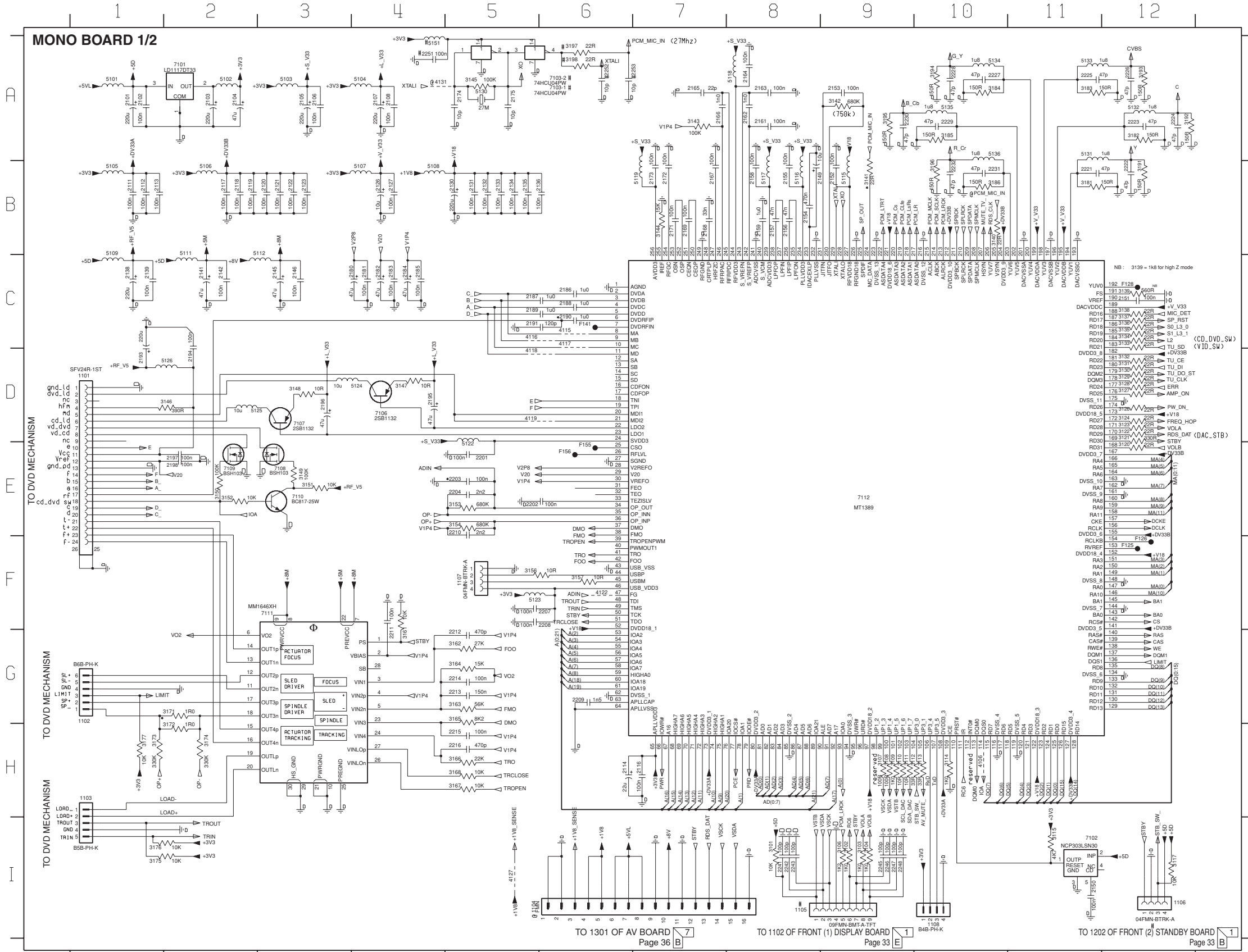


SCHEMATIC DIAGRAM

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2xxx : Capacitor 4xxx : SMD jumper 6xxx : Diode 9xxx : Wire jumper



★ Components having special characteristics are marked  and must be replaced with parts having specifications equal to those originally installed.
★ Schematic diagram is subject to change without notice.

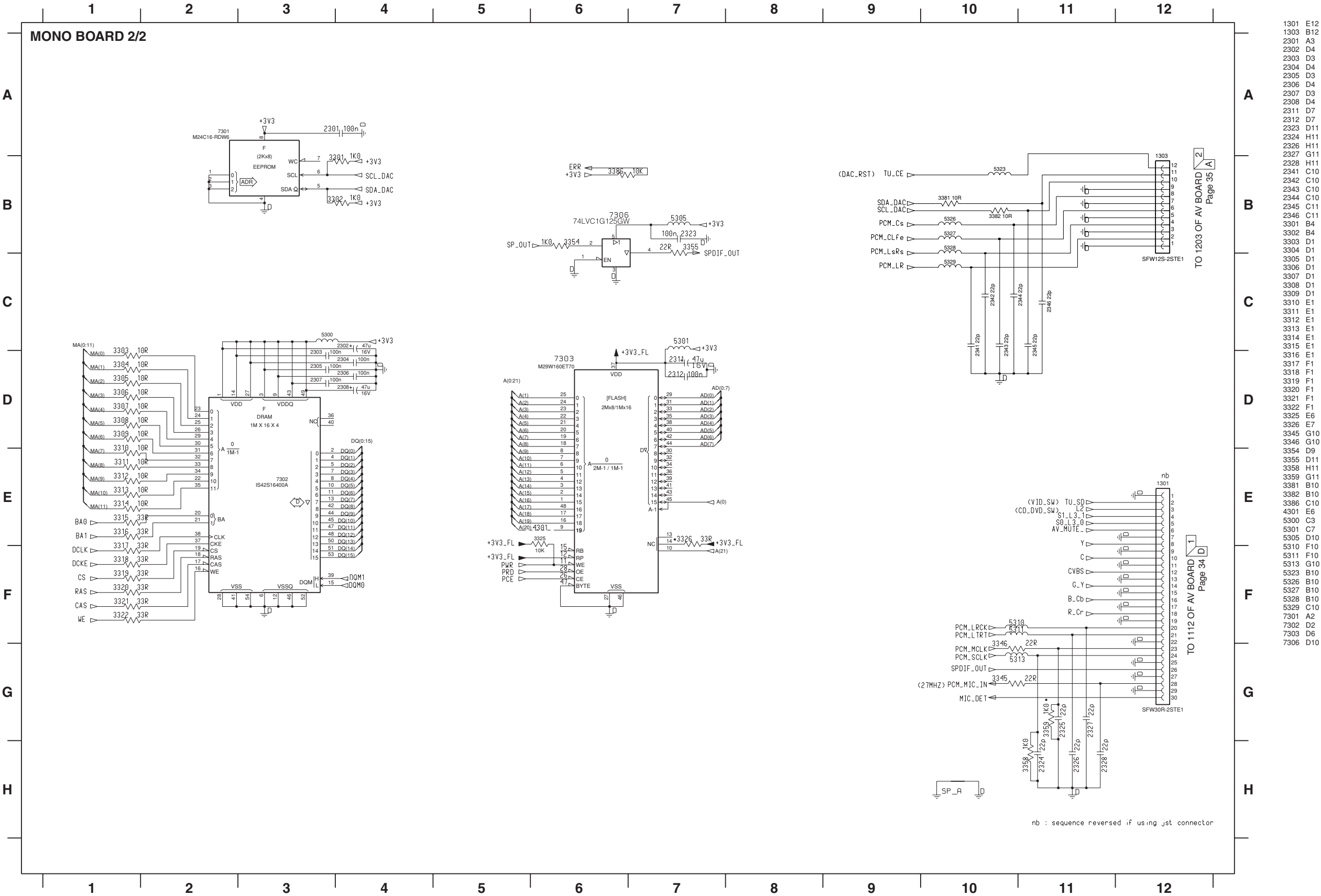
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● 本回路図は標準回路図です。改良のため予告なく変更することがございます。

■ SCHEMATIC DIAGRAM

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- 3xxx : Resistor
- 5xxx : Coil
- 7xxx : IC, Transistor, FET
- 2xxx : Capacitor
- 4xxx : SMD jumper
- 6xxx : Diode
- 9xxx : Wire jumper



★ Components having special characteristics are marked  and must be replaced with parts having specifications equal to those originally installed.
★ Schematic diagram is subject to change without notice.

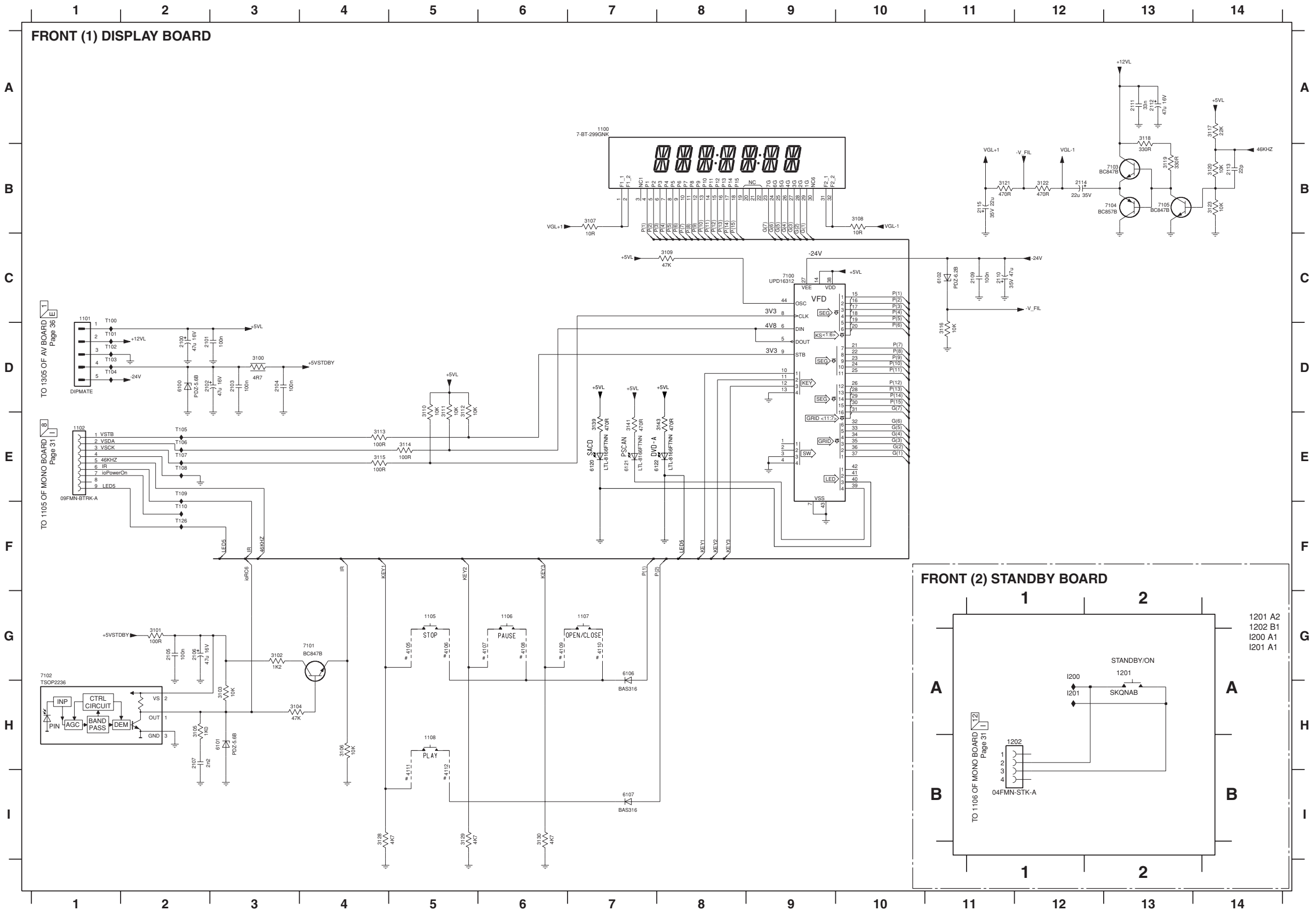
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2xxx : Capacitor 4xxx : SMD jumper 6xxx : Diode 9xxx : Wire jumper



- 1100 A7
1101 C1
1102 E1
1103 A1
1104 C1
1105 G5
1106 G6
1107 G7
1108 H5
2100 D2
2101 D2
2102 D2
2103 D3
2104 D3
2105 G2
2106 G2
2107 H2
2109 C11
2110 C11
2111 A13
2112 A13
2113 B14
2114 B12
2115 B11
3100 D3
3101 G2
3102 G3
3103 H3
3104 H3
3105 H3
3106 H4
3107 B7
3108 B10
3109 C8
3110 D5
3111 D5
3112 D5
3113 E4
3114 E5
3115 E4
3116 D11
3117 A14
3118 A13
3119 B13
3120 B14
3121 B11
3122 B12
3123 B14
3128 I4
3129 I5
3130 I6
3132 G10
3139 E7
3141 E7
3143 E8
4103 H5
4105 G5
4106 G5
4107 G6
4108 G6
4109 G6
4110 G7
4111 H5
4112 H5
6100 D2
6101 H3
6102 C11
6106 G7
6107 I7
6120 E7
6121 E7
6122 E8
7100 C9
7101 G4
7102 G1
7103 B13
7104 B13
7105 B13
7106 G11
T100 C1
T101 D1
T102 D1
T103 D1
T104 D1
T105 E2
T106 E2
T107 E2
T108 E2
T109 E2
T110 F2
T111 A2
T112 A2
T113 A2
T114 A2
T115 A2
T116 A2
T117 A2
T118 A2
T119 B2
T120 B2
T121 B2
T122 B2
T123 B2
T124 B2
T125 B2
T126 F2

★ Components having special characteristics are marked and must be replaced with parts having specifications equal to those originally installed.
★ Schematic diagram is subject to change without notice.

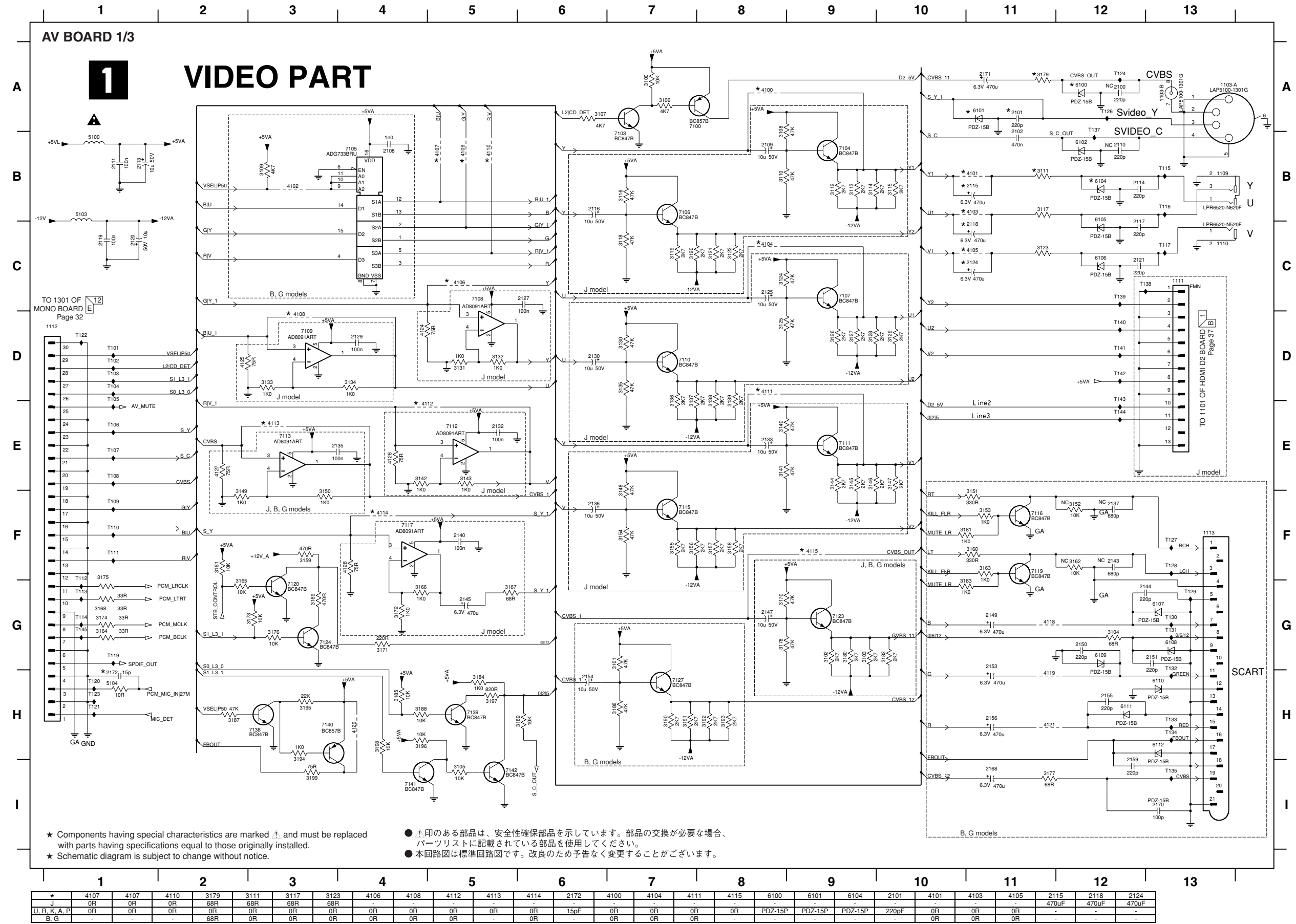
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- 6xxx : Diode
- 9xxx : Wire jumper



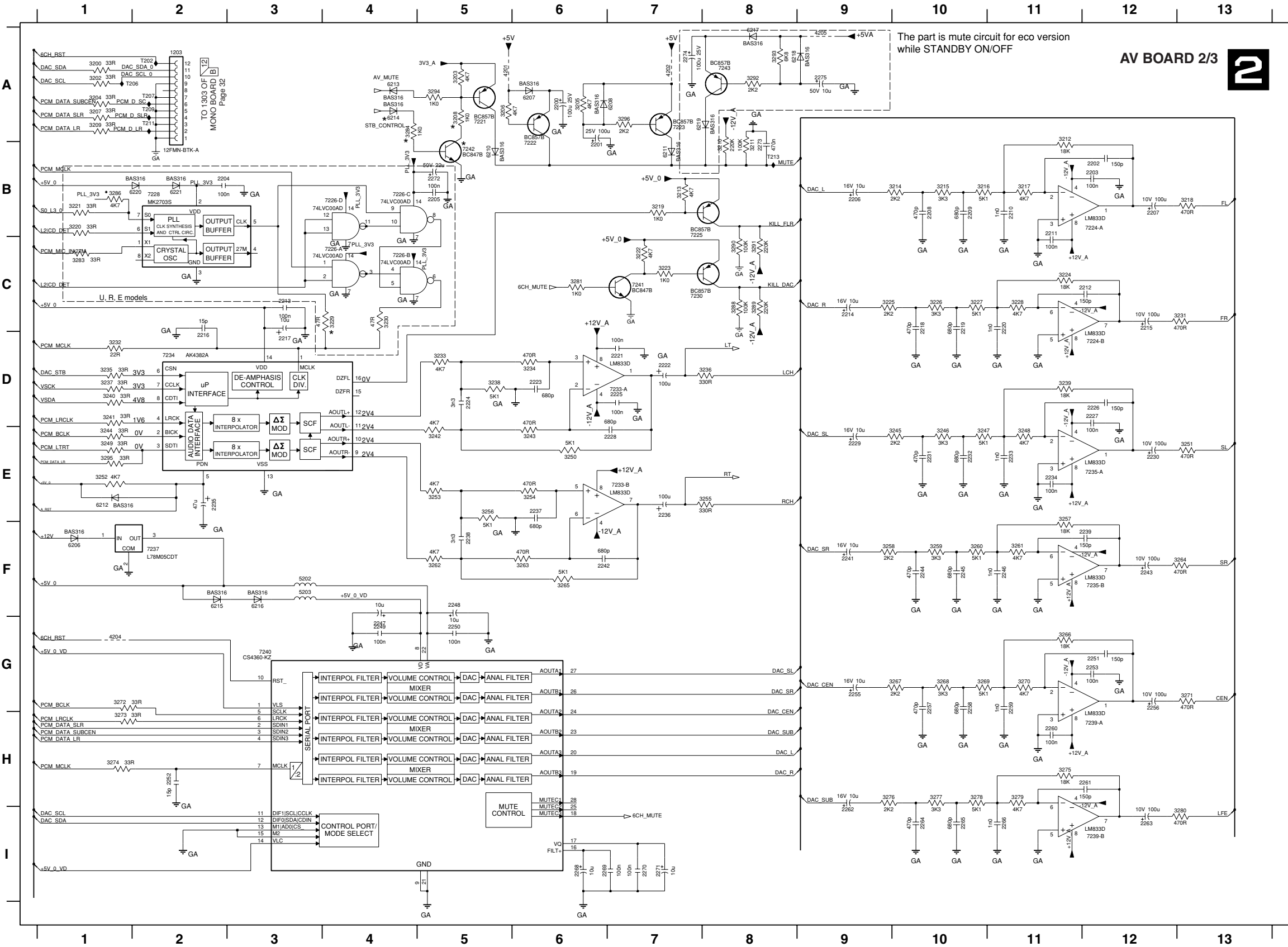
1103-A A13	3162 F12	T107 E1
1103-B A13	3163 F11	T108 E1
1109 B13	3164 G1	T109 F1
1110 C13	3165 G2	T110 F1
1111 C13	3166 G4	T111 F1
1112 D1	3167 G5	T112 F1
1113 F13	3168 G1	T113 G1
2100 A12	3169 G3	T114 G1
2101 A11	3170 G8	T115 B13
2102 B11	3171 G4	T116 B13
2108 B4	3172 G4	T117 C13
2109 B8	3173 G3	T119 G1
2110 B12	3174 G1	T120 H1
2111 B1	3175 F1	T121 H1
2113 B1	3176 G3	T122 H1
2114 B12	3177 H1	T123 H1
2115 B11	3178 G8	T124 A12
2116 B6	3179 A11	T126 A12
2117 C12	3180 G9	T127 F13
2118 C11	3181 F10	T128 F13
2119 C1	3182 G10	T129 G13
2120 C1	3183 G10	T130 G13
2121 C12	3184 H5	T131 G13
2124 C11	3185 H4	T132 G13
2125 C8	3186 H7	T133 H13
2127 C6	3187 H2	T134 H13
2129 D4	3188 H4	T135 H13
2130 D6	3189 H6	T137 A12
2132 E5	3190 H7	T138 C12
2133 E8	3191 H7	T139 H7
2135 E3	3192 H8	T140 D12
2136 F6	3193 H8	T141 D12
2137 F12	3194 H3	T142 D12
2140 F5	3195 H3	T143 D12
2143 F12	3196 H4	T144 E12
2144 G12	3197 H5	T145 G1
2145 G5	3198 H4	
2147 G8	3199 I3	
2149 G11	4100 A8	
2150 G12	4101 B11	
2151 G13	4102 B3	
2153 G11	4103 B11	
2154 H6	4104 C8	
2155 H12	4105 C11	
2156 H11	4106 C5	
2159 I12	4107 B5	
2168 H1	4108 D3	
2170 I13	4109 B5	
2171 A11	4110 B5	
2172 H1	4111 D8	
3100 A7	4112 E4	
3101 G7	4113 E3	
3102 G9	4114 F4	
3103 G9	4115 F9	
3104 G12	4118 G11	
3105 I5	4119 H11	
3106 A7	4121 H11	
3107 A6	4124 D4	
3108 A8	4125 D2	
3109 B3	4126 E4	
3110 B8	4127 E2	
3111 B11	4128 F4	
3112 B9	4129 H4	
3113 B9	5100 B1	
3114 B9	5103 B1	
3115 B10	5104 H1	
3116 B7	6100 A12	
3117 B11	6101 A11	
3118 C7	6102 B12	
3119 C7	6104 B12	
3120 C7	6105 B12	
3121 C8	6106 C12	
3122 C8	6107 G13	
3123 C11	6108 G13	
3124 C8	6109 G12	
3125 D8	6110 H13	
3126 D9	6111 H12	
3127 D9	6112 H13	
3128 D9	7100 A8	
3129 D10	7103 B7	
3130 D7	7104 B9	
3131 D5	7105 B4	
3132 D5	7106 B7	
3133 D3	7107 C9	
3134 D4	7108 C5	
3135 D7	7109 D3	
3136 D7	7110 D7	
3137 D7	7111 E9	
3138 D8	7112 E5	
3139 D8	7113 E3	
3140 E8	7115 F7	
3141 E8	7116 F11	
3142 E4	7117 F4	
3143 E5	7119 F11	
3144 E9	7120 G3	
3145 E9	7123 G9	
3146 E9	7124 G3	
3147 E10	7127 H7	
3148 E7	7138 H3	
3149 F2	7139 H5	
3150 F3	7140 H3	
3151 F11	7141 I4	
3152 F12	7142 I5	
3153 F11	T101 D1	
3154 F7	T102 D1	
3155 F7	T103 D1	
3156 F7	T104 D1	
3157 F8	T105 D1	
3158 F8	T106 E1	
3159 F3		
3160 F11		
3161 F2		

SCHEMATIC DIAGRAM

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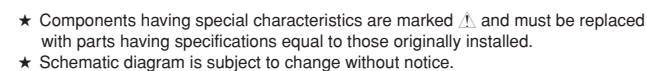


1203 A2	3239 D11
2200 A6	3240 D1
2201 B6	3241 D1
2202 B12	3242 E5
2203 B12	3243 E6
2204 B2	3244 E1
2205 B5	3245 E10
2206 B9	3246 E10
2207 B12	3247 E10
2208 B10	3248 E11
2209 B10	3249 E1
2210 B11	3250 E6
2211 B11	3251 E13
2212 C12	3252 E1
2213 C3	3253 E5
2214 C9	3254 E6
2215 C12	3255 E8
2216 D2	3256 E5
2217 D3	3257 E11
2218 D10	3258 F9
2219 C10	3259 F10
2220 C11	3260 F10
2221 D7	3261 F11
2222 D7	3262 F5
2223 D6	3263 F6
2224 D5	3264 F13
2225 D7	3265 F6
2226 D12	3266 G11
2227 D12	3267 G10
2228 E7	3268 G10
2229 E9	3269 G10
2230 E12	3270 G11
2231 E10	3271 G13
2232 E10	3272 G1
2233 E11	3273 H1
2234 E11	3274 H1
2235 E2	3275 H11
2236 E7	3276 H9
2237 E6	3277 H10
2238 F5	3278 H10
2239 F12	3279 H11
2241 F9	3280 I13
2242 F6	3281 C6
2243 F12	3283 C1
2244 F10	3284 A4
2245 F10	3286 B1
2246 F11	3288 C8
2247 G4	3289 C8
2248 F5	3290 C8
2249 G4	3291 C8
2250 G5	3292 A8
2251 G12	3293 A8
2252 H2	3294 A5
2253 G12	3295 E1
2255 G9	3296 A7
2256 G12	4201 A5
2257 G10	4202 A7
2258 G10	4204 G1
2259 G11	4205 A9
2260 H11	5202 F3
2261 H12	5203 F3
2262 I9	6206 F1
2263 I12	6207 A6
2264 I10	6208 A7
2265 I10	6210 B5
2266 I11	6211 B7
2268 I6	6212 E1
2269 I6	6213 A4
2270 I7	6214 A4
2271 I7	6215 F2
2272 B5	6216 F3
2273 B8	6217 A8
2274 A7	6218 A8
2275 A9	6219 A7
3200 A1	6220 B2
3202 A1	6221 B2
3203 A5	7221 A5
3204 A1	7222 A6
3205 A6	7223 A7
3206 A5	7224-A B12
3207 A1	7224-B D12
3208 A5	7225 B7
3209 A1	7226-A C4
3210 B8	7226-B C4
3211 B8	7226-C B4
3212 A11	7226-D B4
3213 B7	7228 B2
3214 B10	7230 C7
3215 B10	7233-A D7
3216 B10	7233-B E7
3217 B11	7234 D2
3218 B13	7235-A E12
3219 B7	7235-B F12
3220 B1	7237 F2
3221 B1	7239-A H12
3222 C7	7239-B I12
3223 C7	7240 G3
3224 C11	7241 C7
3225 C9	7242 B5
3226 C10	7243 A8
3227 C10	T202 A2
3228 C11	T202 A1
3229 C4	T207 A2
3230 C4	T209 A2
3231 C13	T211 A2
3232 D1	T213 B8
3233 D5	
3234 D6	
3235 D1	
3236 D8	
3237 D1	
3238 D5	

★ Components having special characteristics are marked  and must be replaced with parts having specifications equal to those originally installed.
★ Schematic diagram is subject to change without notice.

● 印のある部品は、安全性確保部品を示しています。部品の交換が必要な場合、パーツリストに記載されている部品を使用してください。
● 本回路図は標準回路図です。改良のため予告なく変更することがございます。

2xxx : Capacitor 4xxx : SMD jumper 6xxx : Diode 9xxx : Wire jumper

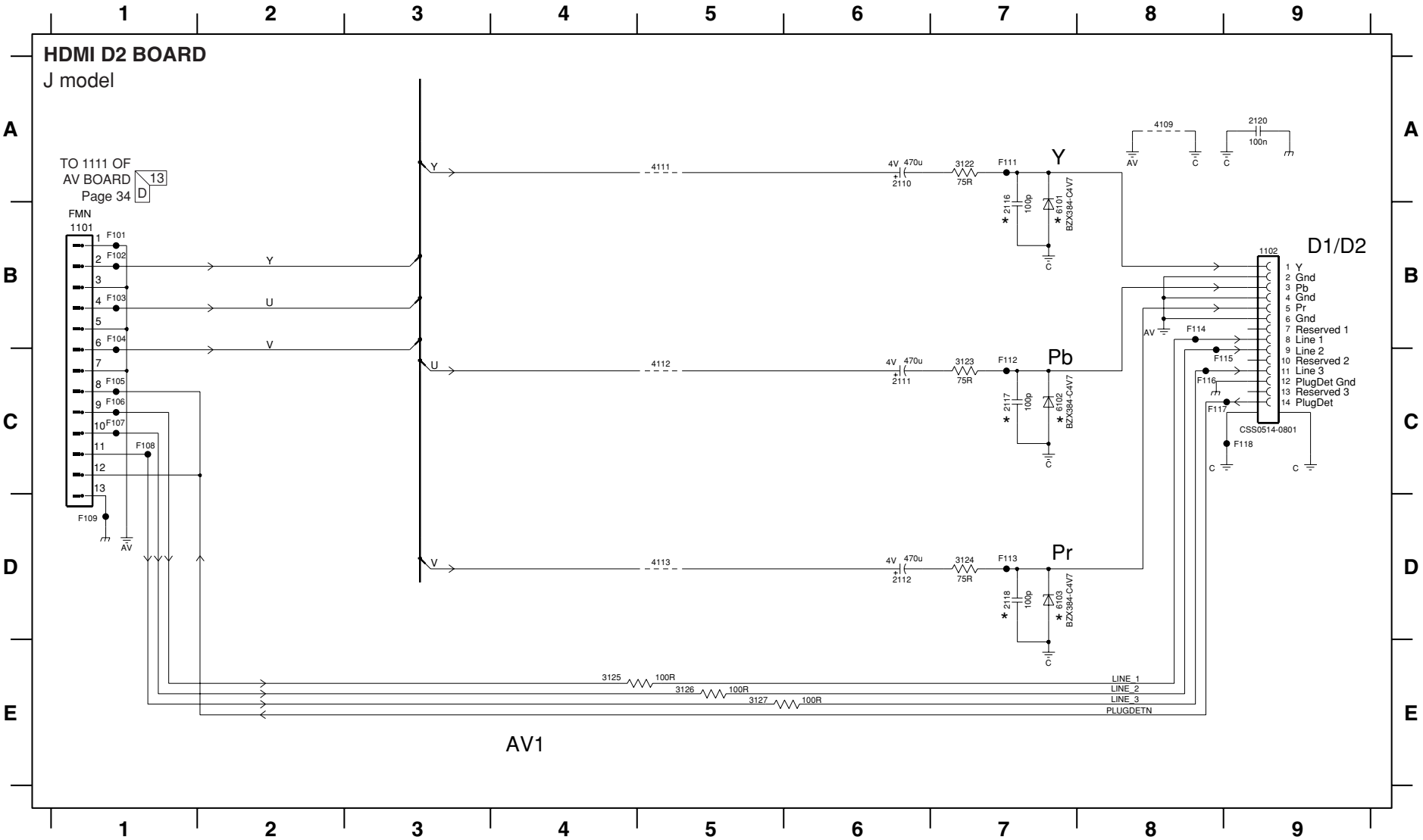


36

■ SCHEMATIC DIAGRAM
FOR INFORMATION ONLY (NO SERVICE PARTS WILL BE AVAILABLE)

The first digit of a component indicates the component type.
1xxx : Connector 3xxx : Resistor 5xxx : Coil 7xxx : IC, Transistor, FET
2xxx : Capacitor 4xxx : SMD jumper 6xxx : Diode 9xxx : Wire jumper

1101 B1	2120 A9	4112 B5	F105 C1	F114 B8
1102 B9	3122 A7	4113 C5	F106 C1	F115 C8
2110 A6	3123 C7	6101 B7	F107 C1	F116 C8
2111 C6	3124 D7	6102 C7	F108 C1	F117 C8
2112 D6	3125 E4	6103 D7	F109 D1	F118 C9
2116 B7	3126 E5	F101 B1	F110 C2	
2117 C7	3127 E5	F102 B1	F111 A7	
2118 D7	4109 A8	F103 B1	F112 C7	
2119 A8	4111 A5	F104 B1	F113 D7	



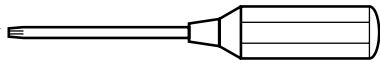
★ Components having special characteristics are marked  and must be replaced with parts having specifications equal to those originally installed.
★ Schematic diagram is subject to change without notice.

● 印のある部品は、安全性確保部品を示しています。部品の交換が必要な場合、パーツリストに記載されている部品を使用してください。
● 本回路図は標準回路図です。改良のため予告なく変更することがございます。

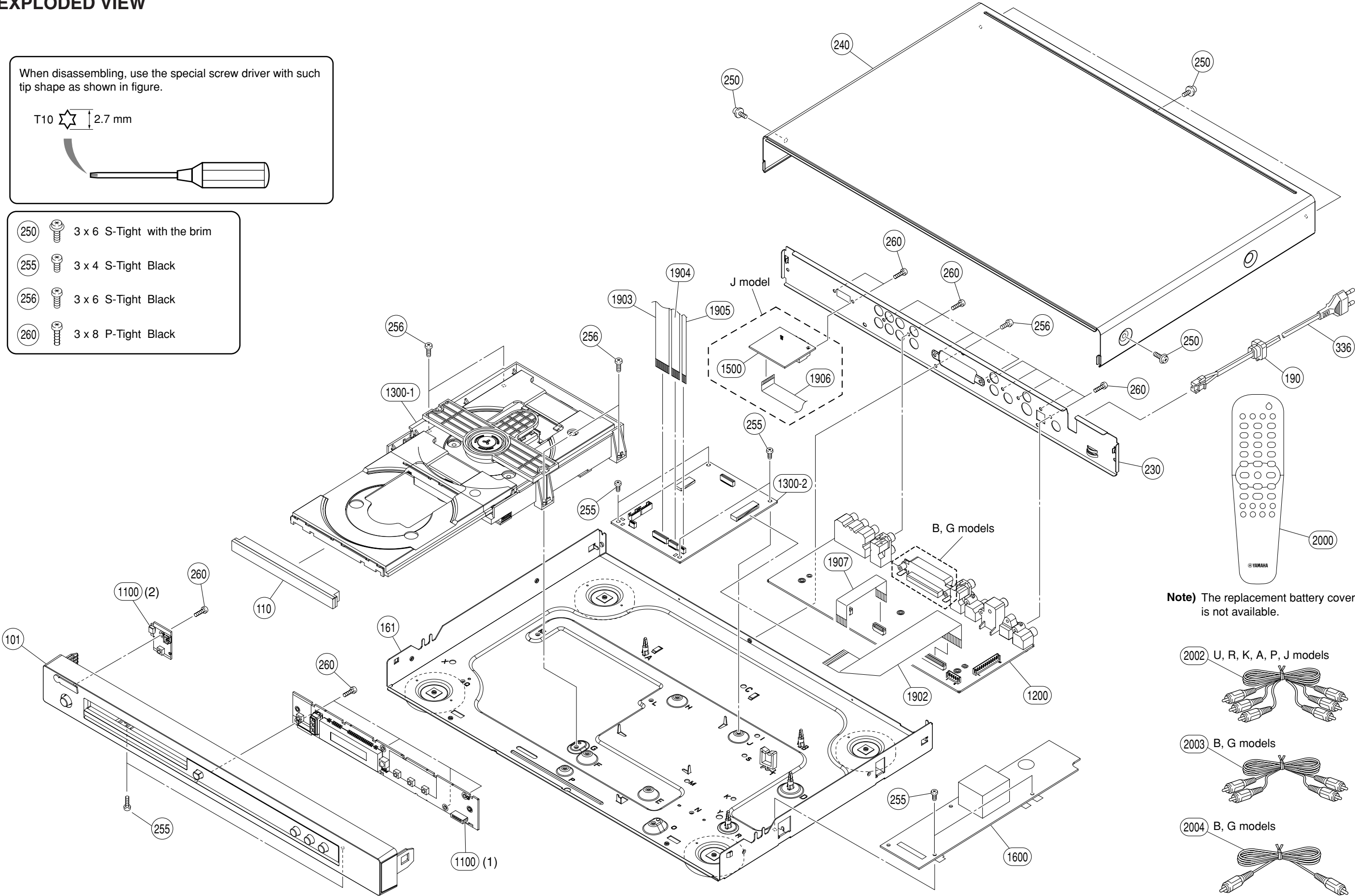
EXPLODED VIEW

When disassembling, use the special screw driver with such tip shape as shown in figure.

T10 2.7 mm

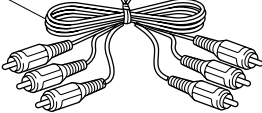


- 250 3 x 6 S-Tight with the brim
- 255 3 x 4 S-Tight Black
- 256 3 x 6 S-Tight Black
- 260 3 x 8 P-Tight Black

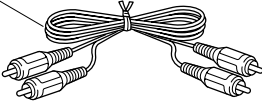


Note) The replacement battery cover is not available.

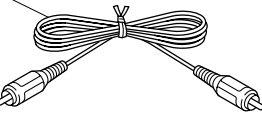
2002 U, R, K, A, P, J models



2003 B, G models



2004 B, G models



■ WARNING

- Components having special characteristics are marked △ and must be replaced with parts having specifications equal to those originally installed.
- △印のある部分は、安全確保部品を示しています。部品の交換が必要な場合、パーツリストに記載されている部品を使用してください。

■ MECHANICAL PARTS

	Ref. No.	Part No.	Description	Remarks	Markets	部 品 名	Rank	
*	101	AAX69710	FRONT PANEL ASS'Y	S657GD	3141 079 32751	JRK	フロントパネル A S S Y	
	101	AAX69700	FRONT PANEL ASS'Y	S657BL	3141 079 32741	UAP	フロントパネル A S S Y	
	101	AAX69770	FRONT PANEL ASS'Y	S657BL	3143 027 62081	G	フロントパネル A S S Y	
	101	AAX69760	FRONT PANEL ASS'Y	S657TI	3141 079 32941	U	フロントパネル A S S Y	
	101	AAX69790	FRONT PANEL ASS'Y	S657TI	3143 027 62141	BG	フロントパネル A S S Y	
	101	AAX69750	FRONT PANEL ASS'Y	S657SI	3141 079 32931	J	フロントパネル A S S Y	
	101	AAX69740	FRONT PANEL ASS'Y	S657SI	3141 079 32921	R	フロントパネル A S S Y	
	101	AAX69780	FRONT PANEL ASS'Y	S657SI	3143 027 62101	G	フロントパネル A S S Y	
	101	AAX69720	FRONT PANEL ASS'Y	S5860BL	3141 079 32761	U	フロントパネル A S S Y	
	101	AAX69730	FRONT PANEL ASS'Y	S5860SI	3141 079 32771	UA	フロントパネル A S S Y	
*	110	AAX69670	TRAY COVER ASS'Y	S657, S5860SI	3141 079 32781	JURKAP	トレイカバー A S S Y	
	110	AAX69690	TRAY COVER ASS'Y	S657	3143 027 62091	BG	トレイカバー A S S Y	
	110	AAX69680	TRAY COVER ASS'Y	S5860BL	3141 079 32811	U	トレイカバー A S S Y	
	161	AAX67050	FRAME ASS'Y	GD	3141 079 03091	JRK	フレーム A S S Y	
	161	AAX67030	FRAME ASS'Y	BL, TI, SI	3141 079 02961	JURKAP	フレーム A S S Y	
	161	AAX67060	FRAME ASS'Y	BL, TI, SI	3143 027 60891	BG	フレーム A S S Y	
	190	AAX53540	BUSH	450H259010	3139 114 26671		ブッシュ	
	230	AAX69830	REAR PANEL	S657	3139 241 22591	J	リアパネル	
	230	AAX69860	REAR PANEL	S657	3139 241 22621	U	リアパネル	
	230	AAX69820	REAR PANEL	S657	3139 241 22571	RK	リアパネル	
*	230	AAX69840	REAR PANEL	S657	3139 241 22601	A	リアパネル	
	230	AAX69870	REAR PANEL	S657	3139 241 22631	BG	リアパネル	
	230	AAX69850	REAR PANEL	S657	3139 241 22611	P	リアパネル	
	230	AAX69810	REAR PANEL	S5860	3139 241 22561	U	リアパネル	
	230	AAX69800	REAR PANEL	S5860	3139 241 22551	A	リアパネル	
	240	AAX59020	TOP COVER	GD	3139 241 22391		トップカバー	09
	240	AAX58270	TOP COVER	BL	3139 247 59051		トップカバー	
	240	AAX58290	TOP COVER	TI, SI	3139 241 22191		トップカバー	09
	250	AAX57730	PW HEAD TORX S-TIGHT SCREW	GD 3x6 MFN133	3103 301 45951		PWヘッド S タイトネジ	
	250	AAX55450	PW HEAD TORX S-TIGHT SCREW	BL 3x6 MFZN2BL	3139 110 40611		PWヘッド S タイトネジ	
△	250	AAX53440	PW HEAD TORX S-TIGHT SCREW	TI, SI 3x6 MFN133	3104 120 40081		PWヘッド S タイトネジ	
	255	AAX55930	PAN HEAD TORX S-TIGHT SCREW	3x4 MFZN2BL	3141 010 40591		ナベトルクス S タイトネジ	
	256	AAX23640	PAN HEAD TORX S-TIGHT SCREW	3x6 MFZN2BL	2511 077 00039		ナベトルクス S タイトネジ	
	260	AAX53520	PAN HEAD TORX P-TIGHT SCREW	3x8 MFZN2BL	2511 076 50012		ナベトルクス P タイトネジ	
	336	AAX53650	POWER CABLE	1.8m	2422 070 98255	J	電源コード	05
	336	AAX47750	POWER CABLE	1.8m	2422 070 98235	U	電源コード	
	336	AAX53630	POWER CABLE	1.8m	2422 070 98231	RGP	電源コード	
	336	AAX59130	POWER CABLE	1.8m	2422 070 98222	K	電源コード	
	336	AAX47740	POWER CABLE	1.8m	2422 070 98233	A	電源コード	
	336	AAX58470	POWER CABLE	1.8m	3103 140 25882	B	電源コード	
*	1100	AAX69640	P.C.B. ASS'Y	FRONT	3139 248 85041		P C B フロント	
	1200	AAX69610	P.C.B. ASS'Y	A/V	3139 248 84991	J	P C B A V	
	1200	AAX69620	P.C.B. ASS'Y	A/V	3139 248 85001	URKAP	P C B A V	
	1200	AAX69630	P.C.B. ASS'Y	A/V	3139 248 85011	BG	P C B A V	
	1300-1	AAX70750	DVD MECHANISM	WXD8136 (012B)	3139 248 72251		D V D メカニズム	
	1300-2	AAX70760	P.C.B. ASS'Y	MONO SD6.1 PL 6CH	3139 118 58082		D V D M O N O	
	1500	AAX57680	P.C.B. ASS'Y	HDMI D2 CONNECTOR	3139 248 82751	J	P C B H D M I	06
	1600	AAX58480	POWER SUPPLY UNIT	HE 2004 MIT	3139 248 72062		電源ユニット	14
	1902	AAX58250	FLEXIBLE FLAT CABLE	30P 120mm P=1mm	3139 241 00541		カード電線 C & C	02
	1903	AAX58220	FLEXIBLE FLAT CABLE	16P 220mm P=1mm	3139 111 02421		カード電線 C & C	03
*	1904	AAX58230	FLEXIBLE FLAT CABLE	9P 140mm P=1mm	3139 241 00521		カード電線 C & C	01
	1905	AAX58240	FLEXIBLE FLAT CABLE	4P 400mm P=1mm	3139 241 00531		カード電線 C & C	02
	1906	AAX64670	FLEXIBLE FLAT CABLE	13P 220mm P=1mm	3139 111 02411	J	カード電線 C & C	
	1907	AAX69650	FLEXIBLE FLAT CABLE	12P 80mm P=1mm	3139 241 00511		カード電線 C & C	
			ACCESSORIES				付属品	
	2000	AAX69880	REMOTE CONTROL	RC19237011/00H	3139 238 10511		リモコン	
	2002	AAX23450	AUDIO/VIDEO CABLE	YE/RD/WH 1.5m 1pc	2422 076 00304	JURKAP	音声/映像ピンケーブル	10
	2003	AAX21980	AUDIO PIN CABLE	RD/WH 1.5m 1pc	3103 308 92611	BG	ステレオピンケーブル	05
	2004	AAX22970	VIDEO PIN CABLE	YE 1.5m 1pc	3104 108 45432	BG	ビデオ用ピンケーブル	08
			BATTERY	UM-3 (2pcs)			乾電池 2 P C S	

* New Parts * 新規部品

DVD-S657/DV-S5860

