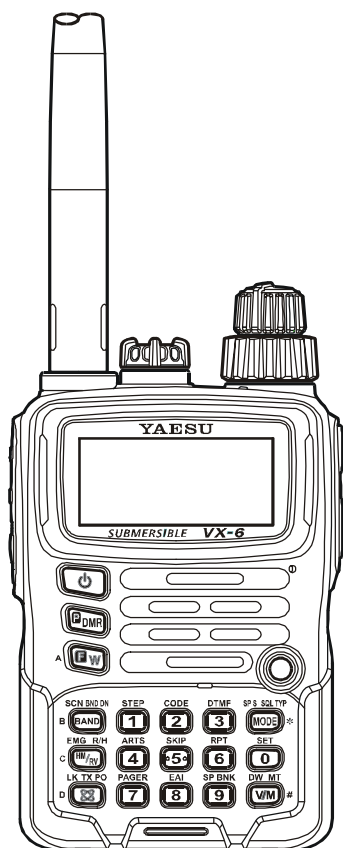


Dual-Band  
Heavy Duty Submersible Transceiver  
**VX-6R**  
Technical Supplement

©2005 VERTEX STANDARD CO., LTD. EH021M90A

**VERTEX STANDARD CO., LTD.**  
4-8-8 Nakameguro, Meguro-Ku, Tokyo 153-8644, Japan  
**VERTEX STANDARD**  
**US Headquarters**  
10900 Walker Street, Cypress, CA 90630, U.S.A.  
**YAESU EUROPE B.V.**  
P.O. Box 75525, 1118 ZN Schiphol, The Netherlands  
**YAESU UK LTD.**  
Unit 12, Sun Valley Business Park, Winnall Close  
Winchester, Hampshire, SO23 0LB, U.K.  
**VERTEX STANDARD HK LTD.**  
Unit 5, 20/F., Seaview Centre, 139-141 Hoi Bun Road,  
Kwun Tong, Kowloon, Hong Kong



## Introduction

This manual provides the technical information necessary for servicing the VX-6R Dual-Band Heavy Duty Submersible Transceiver.

Servicing this equipment requires expertise in handling surface-mount chip components. Attempts by non-qualified persons to service this equipment may result in permanent damage not covered by the warranty, and may be illegal in some countries.

Two PCB layout diagrams provided for each double-sided board in this transceiver. Each side of the board is referred to by the type of the majority of components installed on that side ("Side A" or "Side B"). In most cases one side has only chip components, and the other has either a mixture of both chip and leaded components (trimmers, coils, electrolytic capacitors, ICs, etc.), or leaded components only.

While we believe the information in this manual to be correct, VERTEX STANDARD assumes no liability for damage that may occur as a result of typographical or other errors that may be present. Your cooperation in pointing out any inconsistencies in the technical information would be appreciated.

## Contents

|                                           |    |
|-------------------------------------------|----|
| Specification .....                       | 2  |
| Exploded View & Miscellaneous Parts ..... | 4  |
| Block Diagram .....                       | 5  |
| Interconnection Diagram .....             | 6  |
| Circuit Description .....                 | 7  |
| Alignment .....                           | 11 |
| Board Unit (Schematics, Layouts & Parts)  |    |
| CNTL Unit .....                           | 17 |
| AF Unit .....                             | 27 |
| RF Unit .....                             | 37 |
| VCO Unit .....                            | 53 |

# Specifications

## General

### Frequency Ranges:

Rx 0.5 - 1.8 MHz (BC Band)  
1.8 - 30 MHz (SW Band)  
30-76 (59) MHz (50 MHz HAM: USA version)  
76 (59)-108 MHz (FM: USA version)  
108-137 MHz (Air Band)  
137-174 MHz (144 MHz HAM Band)  
174-222 MHz (VHF-TV Band)  
222-420 MHz (ACT1: Action Band 1: USA version)  
420-470 MHz (430 MHz HAM Band)  
470-800 (729) MHz (UHF-TV: EXP version)  
(758-774) MHz (ACT2: Action Band 2, cellular Blocked)  
Tx: 144 - 146 (148) MHz  
222-225 MHz (USA only)  
430 - 440 (450) MHz

### Channel Steps:

5/9/10/12.5/15/20/25/50/100 kHz

### Frequency Stability:

±5 ppm @ 14 °F to +122 °F (−10 °C to +50 °C)

### Emission Type:

F2D, F3E

### Antenna Impedance:

50-ohm

### Supply Voltage:

Nominal: 7.4 V DC

(Negative Ground)

Operating: 5 - 16.0 V DC (EXT DC jack)

11.0 - 16.0 V DC (EXT DC jack with Charging)

### Current Consumption:

150 mA (Receive)

(Approx. @7.4 V)

60 mA (Standby, Saver Off)

30 mA (Standby, Saver On)

900 µA (ON Timer Activated)

200 µA (Auto Power Off)

1.6 A (5 W TX, 144MHz)

1.5 A (1.5 W TX, 222 MHz: USA only)

1.8 A (5 W TX, 430 MHz)

### Operating Temperature:

−4 °F to +140 °F (−20°C to +60°C)

### Case Size:

2.3" (W) x 3.5" (H) x 1.1" (D) (58 x 89 x 28.5 mm)

(w/o knob, antenna, and beltclip)

### Weight (Approx.):

9.5 Oz (270 g) with FNB-80LI, and antenna

# Specifications

## Transmitter

|                              |                                     |       |       |       |       |
|------------------------------|-------------------------------------|-------|-------|-------|-------|
| <b>RF Power Output:</b>      |                                     | High  | Low 3 | Low 2 | Low 1 |
|                              | 144 MHz/430 MHz                     | 5.0 W | 2.5 W | 1.0 W | 0.3 W |
|                              | 220 MHz                             | 1.5 W | 1.0 W | 0.5 W | 0.2 W |
| <b>Modulation Type:</b>      | Variable Reactance F2D, F3E         |       |       |       |       |
| <b>Maximum Deviation:</b>    | ±5.0 kHz (F2D, F3E)                 |       |       |       |       |
| <b>Spurious Emission:</b>    | At least 60 dB below (@ High power) |       |       |       |       |
| <b>Microphone Impedance:</b> | 2 k-ohm                             |       |       |       |       |

## Receiver

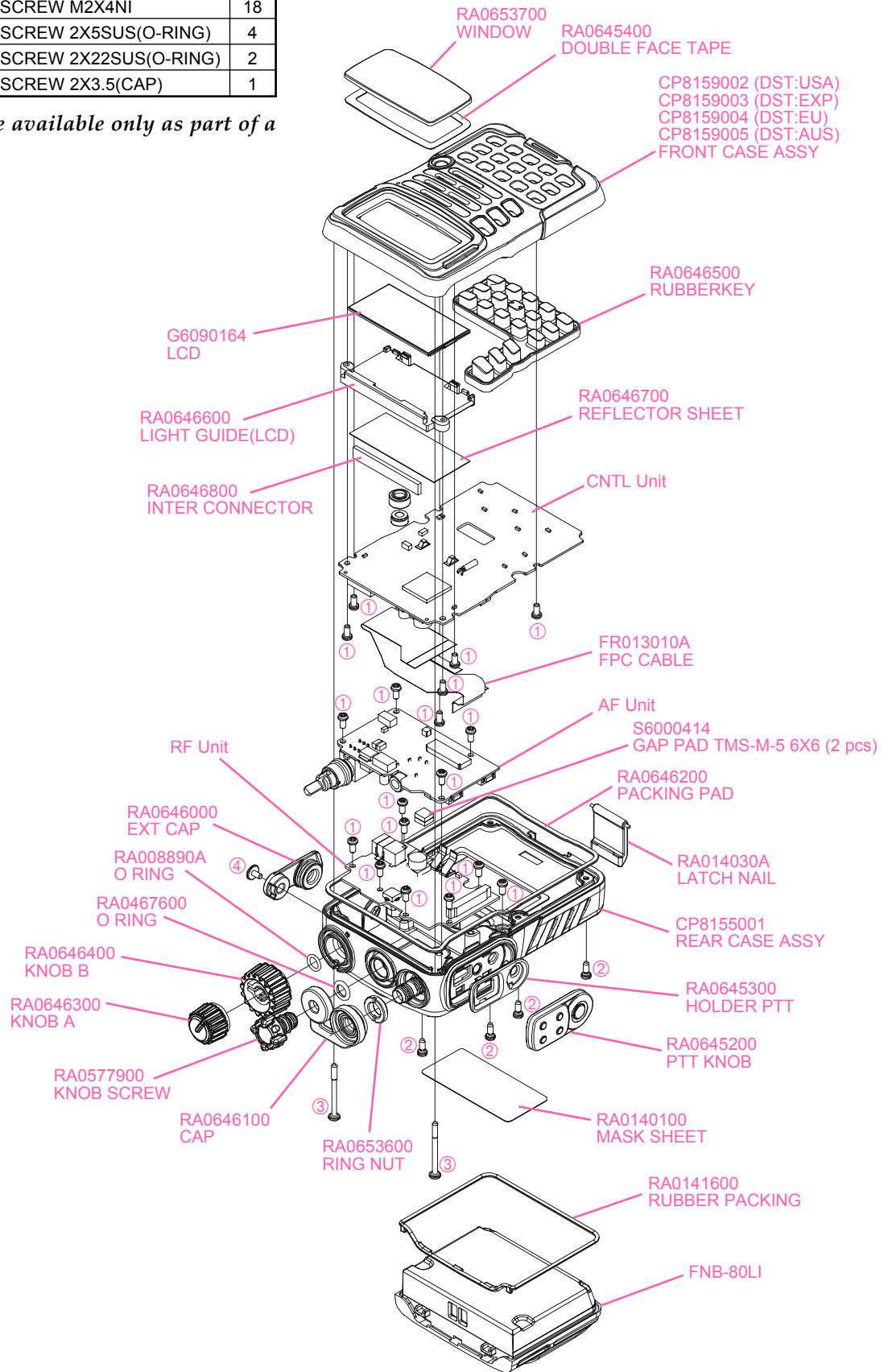
|                                           |                                                                                      |          |       |
|-------------------------------------------|--------------------------------------------------------------------------------------|----------|-------|
| <b>Circuit Type:</b>                      | AM, NFM: Double-Conversion Superheterodyne<br>WFM: Triple-Conversion Superheterodyne |          |       |
| <b>Intermediate Frequencies:</b>          | 1st                                                                                  | 2nd      | 3rd   |
|                                           | AM, NFM: 47.25 MHz                                                                   | 450 kHz  |       |
|                                           | WFM: 45.8 MHz                                                                        | 10.7 MHz | 1 MHz |
| <b>Sensitivity:</b><br>(Cellular Blocked) | 1.5 µV for 10 dB SN (0.5 - 1.8 MHz, AM)                                              |          |       |
|                                           | 1 µV for 10 dB SN (1.8 - 30 MHz, AM)                                                 |          |       |
|                                           | 0.35 µV TYP for 12 dB SINAD (30 - 54 MHz, NFM)                                       |          |       |
|                                           | 0.5 µV TYP for 12 dB SINAD (54 - 76 MHz, NFM)                                        |          |       |
|                                           | 0.5 µV TYP for 12 dB SINAD (54 - 59 MHz, NFM:USA)                                    |          |       |
|                                           | 1 µV TYP for 12 dB SINAD (76 - 108 MHz, WFM)                                         |          |       |
|                                           | 1 µV TYP for 12 dB SINAD (59 - 108 MHz, WFM:USA)                                     |          |       |
|                                           | 1.5 µV TYP for 10 dB SN (108 - 137 MHz, AM)                                          |          |       |
|                                           | 0.2 µV for 12 dB SINAD (137 - 140 MHz, FM)                                           |          |       |
|                                           | 0.16 µV for 12 dB SINAD (140 - 150 MHz, FM)                                          |          |       |
|                                           | 0.2 µV for 12 dB SINAD (150 - 174 MHz, FM)                                           |          |       |
|                                           | 0.5 µV TYP for 12 dB SINAD (174 - 250 MHz, WFM)                                      |          |       |
|                                           | 0.5 µV for 12 dB SINAD (300 - 350 MHz, NFM)                                          |          |       |
|                                           | 0.2 µV for 12 dB SINAD (350 - 420 MHz, NFM)                                          |          |       |
|                                           | 0.18 µV for 12 dB SINAD (420 - 470 MHz, NFM)                                         |          |       |
|                                           | 1 µV for 12 dB SINAD (470 - 540 MHz, WFM)                                            |          |       |
|                                           | 1 µV TYP for 12 dB SINAD (580 - 800 MHz, WFM)                                        |          |       |
| <b>Selectivity:</b>                       | 0.5 µV TYP for 12 dB SINAD (800 - 999 MHz, NFM)                                      |          |       |
|                                           | AM, NFM: 12 kHz/35 kHz (-6 dB/-60 dB)                                                |          |       |
| <b>AF Output:</b>                         | WFM: 200 kHz/500 kHz (-6 dB/-20 dB)                                                  |          |       |
|                                           | 200 mW @ 8 ohm for 10 % THD (@ 7.4V DC)                                              |          |       |
|                                           | 400 mW @ 8 ohm for 10 % THD (@ 13.8V DC)                                             |          |       |

*Specifications are subject to change without notice, and are guaranteed within amateur bands only.*

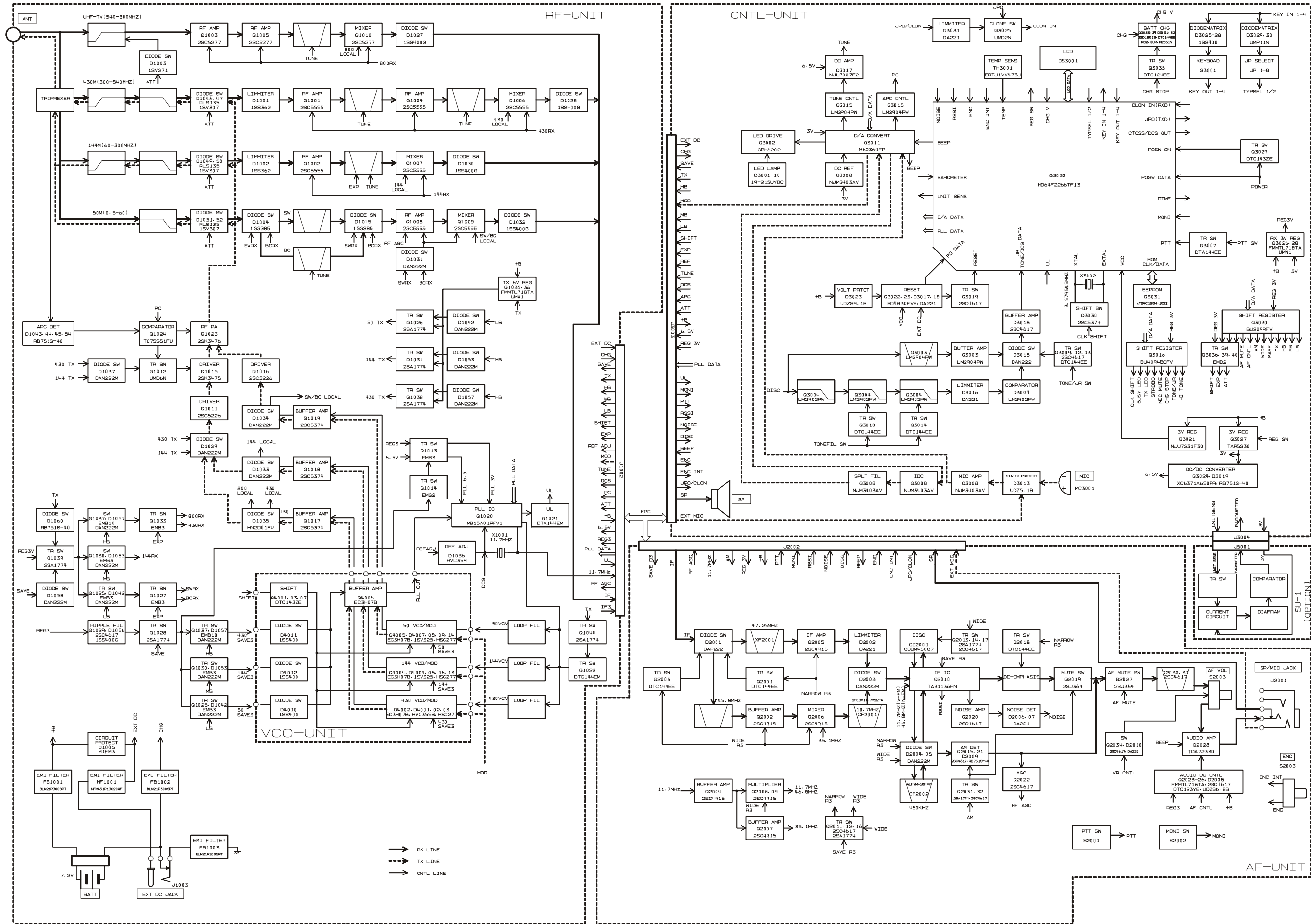
# Exploded View & Miscellaneous Parts

| No. | VXSTD P/N | Description                   | Qty. |
|-----|-----------|-------------------------------|------|
| ①   | U44104002 | TAPTITE SCREW M2X4NI          | 18   |
| ②   | U9900180  | TAPTITE SCREW 2X5SUS(O-RING)  | 4    |
| ③   | U9900179  | TAPTITE SCREW 2X22SUS(O-RING) | 2    |
| ④   | U9900181  | TAPTITE SCREW 2X3.5(CAP)      | 1    |

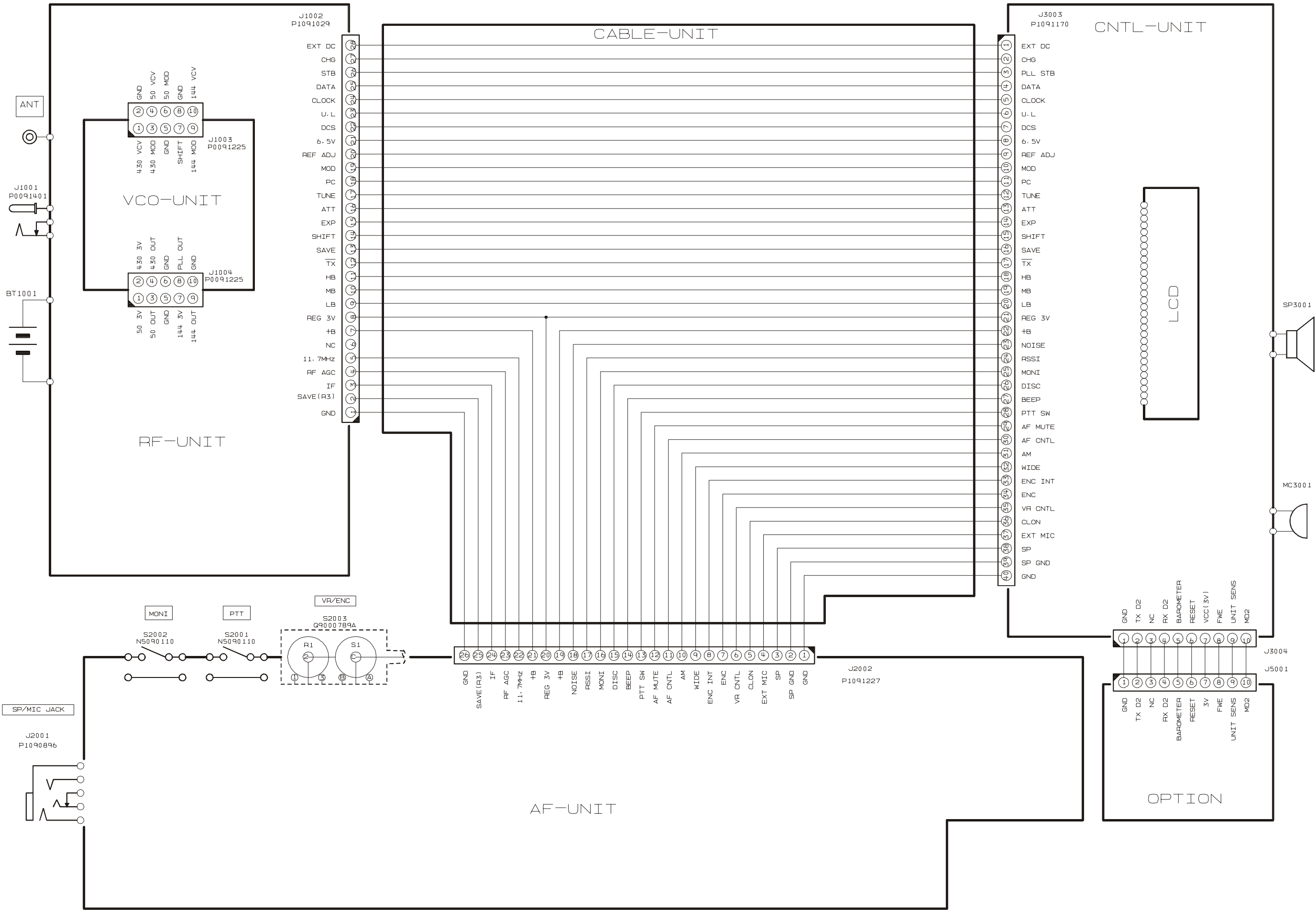
Non-designated parts are available only as part of a designated assembly.



# Block Diagram



Interconnection Diagram



The VX-6R consists of a RF-UNIT, a CNTL-UNIT and an AF-UNIT. The RF-UNIT contains the receiver front end, PLL IC, power and switching circuits, and the VCO-UNIT for transmit and receive local signal oscillation. The CNTL-UNIT contains the CPU, and audio ICs, and the power circuitry for the LCD. The AF-UNIT contains the IF, and audio ICs.

## Receiver Signal Flow

The VX-6R includes four receiver front ends, each optimized for a particular frequency range and mode combination.

### (1) Triplexer

Signals between 0.5 and 580 MHz received at the antenna terminal pass through a first low-pass filter.

Received 430 MHz band signals, after passing through a low-pass filter to the UHF T/R switch circuit composed of diode switch D1046, D1047.

Received 145 MHz band signals, after passing through a low-pass filter to the VHF T/R switch circuit composed of diode switch D1049, D1050.

Received 50 MHz band signals, after passing through a low-pass filter to the 50MHz T/R switch circuit composed of diode switch D1051, D1052.

### (2) 0.50-60 MHz Reception

Received signals between 0.5 and 60 MHz pass through the Triplexer circuit, low-pass filter circuit, T/R switch diode D1051 and D1052 before additional filtering by a band-pass filter prior to application to RF amplifier Q1008 (**2SC5555ZD-TR**). The amplified RF signal is pass through the band-pass filter to first mixer Q1009 (**2SC5555ZD-TR**). Meanwhile, 50MHz output from the VCO-UNIT is amplified by Q1019 (**2SC5374-TL**) and applied through diode switch D1034 (**DAN222M-T2L**) to mixer Q1009 (**2SC5555ZD-TR**) as the first local signal. The 47.25 MHz (Narrow, 45.8 MHz: Wide) intermediate frequency product of the mixer is delivered to the AF-UNIT. The TUNE voltage from the CPU on the CNTL-UNIT is amplified by DC amplifier Q3017 (**NJU7007F2-TE1**) and applied to varactor D1014 in the variable frequency band-pass filters. By changing the electrostatic capacitance of the varactors, optimum filter characteristics are provided for each specific operating frequency.

### (3) 60-300MHz Reception

Received signals between 60 and 300 MHz pass through the Triplexer circuit, low-pass filter/high-pass filter circuit, VHF T/R switch circuit and protector diode D1002 (**1SS362-TE85R**) before additional filtering by a band-pass filter prior to application to RF amplifier Q1002 (**2SC5555ZD-TR**). The amplified RF signal is pass through the band-pass filter to first mixer Q1007 (**2SC5555ZD-TR**). Meanwhile, VHF output from the VCO-UNIT is amplified by Q1018 (**2SC5374-TL**) and applied through diode T/R switch D1033 (**DAN222M-T2L**) to mixer Q1007 (**2SC5555ZD-TR**) as the first local signal. The 47.25 MHz (Narrow, 45.8 MHz: Wide) intermediate frequency product of the mixer is delivered to the AF-UNIT. The TUNE voltage from the CPU on the CNTL-UNIT is amplified by DC amplifier Q3017 (**NJU7007F2-TE1**) and applied to varactors D1008 and D1009, D1011, D1012, D1020, D1021, D1022, D1023, D1025 and D1026 in the variable frequency band-pass filters. By changing the electrostatic capacitance of the varactors, optimum filter characteristics are provided for each specific operating frequency.

### (4) 300-580MHz Reception

Received signals between 300 and 580 MHz pass through the Triplexer circuit, low-pass filter/high-pass filter circuit, UHF T/R switch circuit and protector diode D1001 before additional filtering by a band-pass filter prior to application to RF amplifier Q1001 (**2SC5555ZD-TR**). The amplified RF signal is pass through the band-pass filter, RF amplifier Q1004 (**2SC5555ZD-TR**) and band-pass filter to first mixer Q1006 (**2SC5555ZD-TR**). Meanwhile, UHF output from the VCO-UNIT is amplified by Q1017 (**2SC5374-TL**) and applied through diode T/R switch D1035 (**HN2D01FUTE85R**) to mixer Q1006 as the first local signal. The 47.25 MHz (Narrow, 45.8 MHz: Wide) intermediate frequency product of the mixer is delivered to the AF-UNIT. The TUNE voltage from the CPU on the CNTL-UNIT is amplified by DC amplifier Q3017 (**NJU7007F2-TE1**) and applied to varactors D1006, D1007, D1018 and D1019 in the variable frequency band-pass filters. By changing the electrostatic capacitance of the varactors, optimum filter characteristics are provided for each specific operating frequency.

### (5) 580 - 999 MHz Reception

Received signals between 580 and 999 MHz pass through the high-pass filter circuit, switch D1003 to ap-

# Circuit Description

plication to RF amplifier Q1003 (**2SC5277-D2-TL**) and Q1005 (**2SC5277-D2-TL**). The amplified RF signal is pass through the band-pass filter to first mixer Q1010 (**2SC5277-D2-TL**). Meanwhile, UHF output from the VCO-UNIT is amplified by Q1017 (**2SC5374-TL**) and applied through diode T/R switch D1035 (**HN2D01FUTE85R**) to mixer Q1010 (**2SC5277-D2-TL**) as the first local signal. The (Narrow, 45.8 MHz: Wide) intermediate frequency product of the mixer is delivered to the AF-UNIT. The TUNE voltage from the CPU on the CNTL-UNIT is amplified by DC amplifier Q3017 (**NJU7007F2-TE1**) and applied to varactors D1016 and D1017 in the variable frequency band-pass filters. By changing the electrostatic capacitance of the varactors, optimum filter characteristics are provided for each specific operating frequency.

## (6) 47.25 MHz First Intermediate Frequency

The 47.25 MHz first intermediate frequency from first mixers is delivered from the RF-UNIT to the AF-UNIT through jacks J1002 and J2002. On the AF-UNIT, the IF for AM and FM-narrow signals is passed through NAR/WIDE switch D2001 (**DAP222-TL**) and D2003 (**DAN222M-T2L**), and 47.25 MHz monolithic crystal filter (MCF) XF2001 to narrow IF amplifier Q2005 (**2SC4915**) for input to pin 16 of Narrow IF IC Q2010 (**TA31136FN**) after amplitude limiting by D2002 (**DA221-TL**). Meanwhile, a portion of the output of 11.7 MHz crystal X1001 on RF-UNIT is multiplied fourfold by Q2008 (**2SC4915**) and Q2009 (**2SC4915**) to provide the 46.8 MHz second local signal, applied to the Narrow IF IC. Within the IC, this signal is mixed with the 47.25 MHz first intermediate frequency signal to produce the 450 kHz second intermediate frequency.

This second IF is filtered by ceramic filter CF2002 and amplified by the limiting amplifier within the Narrow IF IC before quadrature detection by ceramic discriminator CD2001. Demodulated audio is output from pin 9 of the Narrow IF IC through narrow mute analog switch Q2019 (**2SJ364-R**) and squelch gate Q2020 (**2SC4617 TL R**) before de-emphasis.

The resulting audio is amplified by AF amplifier Q2028 (**TDA7233D-TR**) and output through MIC/EAR jack J2001 to internal speaker SP3001 or an external earphone.

## (7) Squelch Control

Signal components in the neighborhood of 15 kHz contained in the discriminator output pass through an active band-pass filter composed of R2041, R2043, R2044, C2049, C2055 and the operational amplifier between pins 7 and 8 within Narrow IF IC Q2010 (**TA31136FN**). They are then rectified by D2006 and D2007 (both **DA221-TL**) to obtain a DC voltage corresponding to the level of noise. This voltage is input to pin 51 of CPU Q3032 (**HD64F2266TF13**), which compares the input voltage with a previously set threshold. When the input voltage drops below the threshold, normally due to the presence of a carrier, turning on squelch gate Q2027 (**2SJ364-R**) and allowing any demodulated audio to pass. At the same time, Q3001 (**DTC144EE TL**) and/or Q3005 (**DTC144EE TL**) and/or Q3006 (**DTC144EE TL**) goes on, causing the BUSY/TX lamp D3001 and D3012 to light.

## Transmitter Signal Flow

### (1) Transmit/Receive Switching

Closing PTT switch S2001 on the AF-UNIT pulls the base of Q3007 (**DTA144EE TL**) low, causing the collector to go high. This signal is input to pin 45 (PTT) of CPU Q3032 (**HD64F2266TF13**), allowing the CPU to recognize that the PTT switch has been pushed. When the CPU detects closure of the PTT switch, pin 9 of Q3020 (TX) (**BU2099FV-E2**) goes high. This control signal is delivered to the RF-UNIT, where it switches Q1039 (**2SA1774 TL R**) and Q1040 (**2SA1774 TL R**) to produce the TX control signal that activates Q1031 (**2SA1774 TL R**). At the same time, PLL division data is input to PLL IC Q1020 (**MB15A01PFV1-G-BND-EF**) from the CPU, to disable the receiver power saver. Also, switching Q1030 (**EMB3 T2R**) to disable the receiver circuits. Then causing the red side of BUSY/TX lamp D3011 to light.

### (2) Modulation

Voice signal input from either built-in microphone MC3001 on CNTL-UNIT or external jack J2001 on the AF-UNIT is pre-emphasized by C3014 and R3031, and processed by microphone amplifier and IDC (instantaneous deviation control) circuit Q3008 (**NJM3403AV-TE1**) to prevent overmodulation, and active low-pass filter section of Q3008 (**NJM3403AV-TE1**).

During CTCSS operation, the voice signal is mixed with the TONE ENC subaudible tone signal from pin 43 of the CPU and delivered to the RF-UNIT through jacks J3003 and J1002. During DTMF operation, the DTMF tones from pin 55 of the CPU are input to the IDC stage.

### (3) VHF Band (145/220 MHz) Transmission

Modulating audio from the CNTL-UNIT passes through deviation setting D/A converter Q3011 (**M62364FP 600D**) to VHF MOD of the VCO-UNIT mounted on the RF-UNIT. This signal is applied to varactor D4005 in the tank circuit of VHF VCO Q4004 (**EC3H07B-TL**), which oscillates at the desired VHF transmitting frequency. The modulated VCO signal is buffered by amplifier Q4006 (**EC3H07B-TL**) and Q1018 (**2SC5555ZD-TR**) and delivered through VHF T/R diode switch D1033 (**DAN222M-T2L**) to the RF-UNIT. The modulated low-level VHF transmit signal from the VCO is passed through diode switch D1029 (**DAN222M-T2L**) to amplifier Q1011 (**2SC5226-5-TL**). The modulated VHF transmit signal from the VCO is amplified by Q1015 (**2SK3475**) and RF power amplifier Q1023 (**2SK3476**) up to 5 W (depending on the power source). The RF output passes through TX diode switch D1049. RF output is passed by T/R switch and low-pass filter to suppress harmonics and spurious products before output to the antenna at the antenna terminal.

### (4) UHF Band Transmission

Modulating audio from the CNTL-UNIT passes through deviation setting D/A converter Q3011 (**M62364FP 600D**) to UHF MOD of the VCO-UNIT mounted on the RF-UNIT. This signal is applied to varactor D4002 in the tank circuit of UHF VCO Q4002 (**EC3H07B-TL**), which oscillates at the desired UHF transmitting frequency. The modulated VCO signal is buffered by amplifier Q4006 (**EC3H07B-TL**) and Q1017 (**2SC5555ZD-TR**) and delivered through UHF T/R diode switch D1035 (**HN2D01FUTE85R**) to the RF-UNIT. The modulated low-level UHF transmit signal from the VCO is passed through diode switch D1029 (**DAN222M-T2L**) to amplifier Q1011 (**2SC5226-5-TL**). The modulated UHF transmit signal from the VCO is amplified by Q1015 (**2SK3475**) and RF power amplifier Q1023 (**2SK3476**) up to 5 W (depending on the power source). The RF output

passes through TX diode switch D1046. RF output is passed by T/R switch and low-pass filter to suppress harmonics and spurious products before output to the antenna at the antenna terminal.

### PLL Frequency Synthesizer

PLL IC Q1020 (**MB15A01PFV1-G-BND-EF**) on the RF-UNIT consists of a data shift register, reference frequency divider, phase comparator, charge pump, intermittent operation circuit, and band selector switch. Serial PLL data from the CPU is converted into parallel data by the shift register in the PLL IC and is latched into the comparative frequency divider and reference frequency divider to set a frequency dividing ratio for each. An 11.7 MHz reference signal produced by X1001 is input to REF pin 1 of the PLL IC. The internal reference frequency divider divides the 11.7 MHz reference by 2,050 (or 1,640) to obtain a reference frequency of 5 kHz (or 6.25 kHz), which is applied to the phase comparator. Meanwhile, a sample of the output of VHF VCO Q4004 (**EC3H07B-TL**) or UHF VCO Q4002 (**EC3H07B-TL**) on the VCO-UNIT, buffered by Q4006 (**EC3H07B-TL**), is input to the PLL IC, where it is frequency-divided by the internal comparative frequency divider to produce a comparative frequency also applied to the phase comparator. The phase comparator compares the phase between the reference frequency and comparative frequency to output a pulse corresponding to the phase difference between them. This pulse is input to the charge pump, and the output from the charge pump passes through a loop filter composed of L1043, C1121, R1080, R1079, and either R1082, C1139, R1093 and C1145 for VHF, or R1081, C1138, R1092 and C1140 for UHF, which convert the pulse into a corresponding smoothed varactor control voltage (VCV). The VCV is applied to varactor D4004 and D4013 in the VHF VCO tank circuit, or to varactor D4001 in the UHF VCO tank circuit, to eliminate phase difference between the reference frequency and comparative frequency, and so locking the VCO oscillation frequency to the reference crystal. The VCO frequency is determined by the frequency-dividing ratio sent from the CPU to the PLL IC. During receiver power save operation, the PLL circuit operates intermittently to reduce current consumption, for which the intermittent operation control circuit reduces the lock-up time.

*Circuit Description*

*Note:*

## Introduction

The **VX-6R** is carefully aligned at the factory for the specified performance across the amateur band. Realignment should therefore not be necessary except in the event of a component failure. Only an authorized VERTEX STANDARD representative should perform all component replacement and service, or the warranty policy may be void. The following procedures cover the adjustments that are not normally required once the transceiver has left the factory. However, if damage occurs and some parts subsequently are replaced, realignment may be required. If a sudden problem occurs during normal operation, it is likely due to component failure; realignment should not be done until after the faulty component has been replaced. We recommend that servicing be performed only by authorized VERTEX STANDARD service technicians who are experienced with the circuitry and fully equipped for repair and alignment. If a fault is suspected, contact the dealer from whom the transceiver was purchased for instructions regarding repair. Authorized VERTEX STANDARD service technicians realign all circuits and make complete performance checks to ensure compliance with factory specifications after replacing any faulty components. Those who do undertake any of the following alignments are cautioned to proceed at their own risk. Problems caused by unauthorized attempts at realignment are not covered by the warranty policy. Also, VERTEX STANDARD reserves the right to change circuits and alignment procedures in the interest of improved performance, without notifying owners.

Under no circumstances should any alignment be attempted unless the normal function and operation of the transceiver are clearly understood, the cause of the malfunction has been clearly pinpointed and any faulty components replaced, and realignment determined to be absolutely necessary.

The following test equipment (and familiarity with its use) is necessary for complete realignment. Correction of problems caused by misalignment resulting from use of improper test equipment is not covered under the warranty policy. While most steps do not require all of the equipment listed, the interactions of some adjustments may require that more complex adjustments be performed afterwards. Do not attempt to perform only a single step unless it is clearly isolated electrically from all other steps. Have all test equipment ready before beginning and, follow all of the steps in a section in the order presented.

## Required Test Equipment

- RF Signal Generator with calibrated output level at 500 MHz
- Deviation Meter (linear detector)
- In-line Wattmeter with 5% accuracy at 500 MHz
- 50-ohm, 10-W RF Dummy Load
- 8-ohm AF Dummy Load
- Regulated DC Power Supply adjustable from 3 to 15 VDC, 3A
- Frequency Counter: 0.2-ppm accuracy at 500 MHz
- AF Signal Generator
- AC Voltmeter
- DC Voltmeter: high impedance
- UHF Sampling Coupler
- SINAD Meter

## Alignment Preparation & Precautions

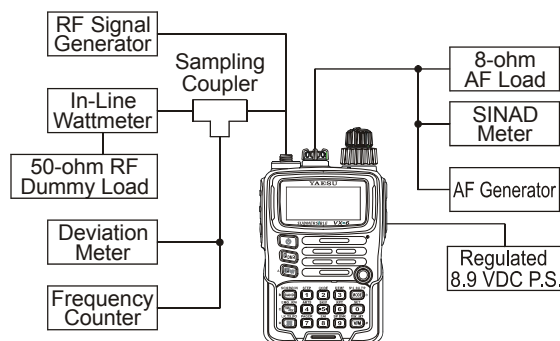
A 10 W RF dummy load and in-line wattmeter must be connected to the main antenna jack in all procedures that call for transmission, alignment is not possible with an antenna. After completing one step, read the next step to see if the same test equipment is required. If not, remove the test equipment (except dummy load and wattmeter, if connected) before proceeding.

Correct alignment requires that the ambient temperature be the same as that of the transceiver and test equipment, and that this temperature be held constant between 68 ~ 86 °F (20 ~ 30 °C). When the transceiver is brought into the shop from hot or cold air, it should be allowed some time to come to room temperature before alignment. Whenever possible, alignments should be made with oscillator shields and circuit boards firmly affixed in place. Also, the test equipment must be thoroughly warmed up before beginning.

*Note: Signal levels in dB referred to in the alignment procedure are based on 0 dBμ=0.5 μV (closed circuit).*

## Test Setup

Set up the test equipment as shown below for transceiver alignment, and apply 8.9 V DC power to the transceiver. Refer to the drawings for Alignment Points.



Alignment Setup

# Alignment

## Internal System Alignment Routine

This uses a programmed routine in the transceiver which simplifies many previously complex discrete component settings and adjustments with digitally-controlled settings via front panel buttons and LCD indications.

To begin, set the transceiver to the center of the 144 MHz, 220 MHz and 430 MHz bands. Next, select the 430 MHz band, then turn the transceiver off.

Now, press and hold the **[BAND]**, **[X]** and **[0]** buttons (at the same time) while powering the radio on again. The display will show the first setting.

Note: that the first few settings are not adjustable and are left as set from the factory.

In the alignment process, each adjustment is selected by rotating the **DIAL**. Alignment is performed by:

- Pressing the **[V/M]** button;
- Injecting a signal of the required frequency and level; then
- Pressing the **[V/M]** button after a level setting or adjustment is made. This second pressing of the **[V/M]** button stores the entry.

To exit the alignment routine, press the **[HOME]** button. After performing the system alignment in its entirety, individual settings can be returned to and adjust should the need arise

In the section to follow, typical default values (as set at the factory) are shown in brackets (e.g. [119]), to serve as a general guideline. As each transceiver is individually optimized at the factory, the precise settings for the transceiver on your bench may be slightly different.

## PLL Reference Frequency (REF)

Press the **[V/M]** button, then transmit and adjust the counter frequency to 440.000 ( $\pm 300$  Hz) by rotating the **DIAL**, then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

## 430 MHz band Alignment

*Squelch Preset Threshold (THL)* [167]

- Press the **[V/M]** button, then inject a  $-12.0$  dB $\mu$  RF signal (1 kHz tone @  $\pm 3.5$  kHz deviation), then rotate the **DIAL** for minimum squelch hysteresis, then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

*Squelch Preset Tight (TLG)* [136]

- Press the **[V/M]** button, then adjust the generator level to  $-4.0$  dB $\mu$ , then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

*S-Meter S-1 Adjustment (S1)* [27]

- Press the **[V/M]** button, then adjust the generator level to  $-8.0$  dB $\mu$  (1 kHz tone @  $\pm 3.5$  kHz deviation), then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

*S-Meter Full-Scale Adjustment (S9)* [66]

- Press the **[V/M]** button, then adjust the generator level to  $+20$  dB $\mu$  (1 kHz tone @  $\pm 3.5$  kHz deviation), then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

*Wide-FM S-Meter S-1 Adjustment (S1)* [53]

- Press the **[V/M]** button, then adjust the generator level to 0 dB $\mu$  (1 kHz tone @  $\pm 20$  kHz deviation), then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

*Wide-FM S-Meter Full-Scale Adjustment (S9)* [77]

- Press the **[V/M]** button, then adjust the generator level to  $+20$  dB $\mu$  (1 kHz tone @  $\pm 20$  kHz deviation), then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

*High TX Power Adjustment (HP)* [220]

- Press the **[V/M]** button, then transmit, and adjust the output power level for 5.0 W  $\pm 0.3$  W by rotating the **DIAL**, then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

*LOW3 Tx Power Adjustment (LP3)* [166]

- Press the **[V/M]** button, then transmit, and adjust the output power level for 2.5 W  $\pm 0.2$  W by rotating the **DIAL**, then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

*L2 Tx Power Adjustment (LP2)* [125]

- Press the **[V/M]** button, then transmit, and adjust the output power level for 1.0 W  $\pm 0.1$  W by rotating the **DIAL**, then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

*L1 Tx Power Adjustment (LP1)* [95]

- Press the **[V/M]** button, then transmit, and adjust the output power level for 0.3 W  $\pm 0.1$  W by rotating the **DIAL**, then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

## *TX Deviation Adjustment (DEU) [65]*

- Inject a 1 kHz audio tone at a level of 50mV (rms) to the MIC jack. Press the **[V/M]** button, then transmit and adjust the deviation for 4.2 kHz  $\pm 0.2$  kHz by rotating **DIAL**, then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

## *CTCSS Tx Deviation Adjustment (100) [15]*

- Press the **[V/M]** button, then transmit and adjust the deviation for 0.6 kHz  $\pm 0.05$  kHz by rotating **DIAL**, then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

## *DCS Tx Deviation Adjustment (DCS) [15]*

- Press the **[V/M]** button, then transmit and adjust the deviation for 0.6 kHz  $\pm 0.05$  kHz by rotating **DIAL**, then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

This completes the 430 MHz band internal alignment routine; press the **[BAND]** button to activate the 50 MHz band internal alignment routine.

## **50 MHz band Alignment**

### *Squelch Preset Threshold (THL) [156]*

- Press the **[V/M]** button, then inject a  $-8.0$  dB $\mu$  RF signal (1 kHz tone @  $\pm 3.5$  kHz deviation), then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

### *Squelch Preset Tight (TLG) [124]*

- Press the **[V/M]** button, then adjust the generator level to 0 dB $\mu$ , then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

### *S-Meter S-1 Adjustment (S1) [40]*

- Press the **[V/M]** button, then adjust the generator level to  $-3.0$  dB $\mu$  (1 kHz tone @  $\pm 3.5$  kHz deviation), then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

### *S-Meter Full-Scale Adjustment (S9) [71]*

- Press the **[V/M]** button, then adjust the generator level to +20 dB $\mu$  (1 kHz tone @  $\pm 3.5$  kHz deviation), then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

### *Wide-FM S-Meter S-1 Adjustment (S1) [62]*

- Press the **[V/M]** button, then adjust the generator level to +8 dB $\mu$  (1 kHz tone @  $\pm 20$  kHz deviation), then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

## *Wide-FM S-Meter Full-Scale Adjustment (S9) [83]*

- Press the **[V/M]** button, then adjust the generator level to +25 dB $\mu$  (1 kHz tone @  $\pm 20$  kHz deviation), then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

This completes the 50 MHz band internal alignment routine; press the **[BAND]** button to activate the 145 MHz band internal alignment routine.

## **144 MHz Band Alignment**

### *Squelch Preset Threshold (THL) [171]*

- Press the **[V/M]** button, then inject a  $-12.0$  dB $\mu$  RF signal (1 kHz tone @  $\pm 3.5$  kHz deviation), then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

### *Squelch Preset Tight (TLG) [142]*

- Press the **[V/M]** button, then adjust the generator level to  $-4.0$  dB $\mu$ , then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

### *S-Meter S-1 Adjustment (S1) [27]*

- Press the **[V/M]** button, then adjust the generator level to  $-8.0$  dB $\mu$  (1 kHz tone @  $\pm 3.5$  kHz deviation), then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

### *S-Meter Full-Scale Adjustment (S9) [65]*

- Press the **[V/M]** button, then adjust the generator level to +20 dB $\mu$  (1 kHz tone @  $\pm 3.5$  kHz deviation), then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

### *Wide-FM S-Meter S-1 Adjustment (S1) [55]*

- Press the **[V/M]** button, then adjust the generator level to 0 dB $\mu$  (1 kHz tone @  $\pm 20$  kHz deviation), then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

### *Wide-FM S-Meter Full-Scale Adjustment (S9) [79]*

- Press the **[V/M]** button, then adjust the generator level to +20 dB $\mu$  (1 kHz tone @  $\pm 20$  kHz deviation), then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

### *High TX Power Adjustment (HP) [198]*

- Press the **[V/M]** button, then transmit, and adjust the output power level for 5.0 W  $\pm 0.3$  W by rotating the **DIAL**, then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

# Alignment

## *L3 Tx Power Adjustment (LP3) [159]*

- Press the **[V/M]** button, then transmit, and adjust the output power level for 2.5 W  $\pm$ 0.2 W by rotating the **DIAL**, then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

## *L2 Tx Power Adjustment (LP2) [124]*

- Press the **[V/M]** button, then transmit, and adjust the output power level for 1.0 W  $\pm$ 0.1 W by rotating the **DIAL**, then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

## *L1 Tx Power Adjustment (LP1) [96]*

- Press the **[V/M]** button, then transmit, and adjust the output power level for 0.3 W  $\pm$ 0.1 W by rotating the **DIAL**, then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

## *TX Deviation Adjustment (DEU) [100]*

- Inject a 1 kHz audio tone at a level of 50mV (rms) to the MIC jack. Press the **[V/M]** button, then transmit and adjust the deviation for 4.2 kHz  $\pm$ 0.2 kHz by rotating **DIAL**, then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

## *CTCSS Tx Deviation Adjustment (100) [18]*

- Press the **[V/M]** button, then transmit and adjust the deviation for 0.6 kHz  $\pm$ 0.05 kHz by rotating **DIAL**, then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

## *DCS Tx Deviation Adjustment (DCS) [56]*

- Press the **[V/M]** button, then transmit and adjust the deviation for 0.6 kHz  $\pm$ 0.05 kHz by rotating **DIAL**, then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

This completes the 144 MHz band internal alignment routine; press the **[BAND]** button to activate the 220 MHz band internal alignment routine.

## 220 MHz Band Alignment

### *Squelch Preset Threshold (THL) [167]*

- Press the **[V/M]** button, then inject a  $-12.0$  dB $\mu$  RF signal (1 kHz tone @  $\pm 3.5$  kHz deviation). Press the **[V/M]** button, then rotate the **DIAL** to select the next setting.

### *Squelch Preset Tight (TLG) [136]*

- Press the **[V/M]** button, then adjust the generator level to  $-4.0$  dB $\mu$ , then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

## *S-Meter S-1 Adjustment (S1) [27]*

- Press the **[V/M]** button, then adjust the generator level to  $-8.0$  dB $\mu$  (1 kHz tone @  $\pm 3.5$  kHz deviation), then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

## *S-Meter Full-Scale Adjustment (S9) [66]*

- Press the **[V/M]** button, then adjust the generator level to  $+20$  dB $\mu$  (1 kHz tone @  $\pm 3.5$  kHz deviation), then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

## *Wide-FM S-Meter S-1 Adjustment (S1) [53]*

- Press the **[V/M]** button, then adjust the generator level to 0 dB $\mu$  (1 kHz tone @  $\pm 20$  kHz deviation), then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

## *Wide-FM S-Meter Full-Scale Adjustment (S9) [77]*

- Press the **[V/M]** button, then adjust the generator level to  $+20$  dB $\mu$  (1 kHz tone @  $\pm 20$  kHz deviation), then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

## *High TX Power Adjustment (HP) [132] (USA version only)*

- Press the **[V/M]** button, then transmit, and adjust the output power level for 1.5 W  $\pm$ 0.3 W by rotating the **DIAL**, then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

## *LOW3 Tx Power Adjustment (LP3) [120] (USA version only)*

- Press the **[V/M]** button, then transmit, and adjust the output power level for 1.0 W  $\pm$ 0.2 W by rotating the **DIAL**, then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

## *L2 Tx Power Adjustment (LP2) [103] (USA version only)*

- Press the **[V/M]** button, then transmit, and adjust the output power level for 0.5 W  $\pm$ 0.1 W by rotating the **DIAL**, then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

## *L1 Tx Power Adjustment (LP1) [89] (USA version only)*

- Press the **[V/M]** button, then transmit, and adjust the output power level for 0.2 W  $\pm$ 0.1 W by rotating the **DIAL**, then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

## *TX Deviation Adjustment (DEU) [62] (USA version only)*

- Press the **[V/M]** button, then inject a 1 kHz audio tone at a level of 50mV (rms) to the MIC jack. Press the **[V/M]** button, then transmit and adjust the deviation for 4.2 kHz  $\pm 0.2$  kHz by rotating **DIAL**, then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

## *CTCSS Tx Deviation Adjustment (100) [29] (USA version only)*

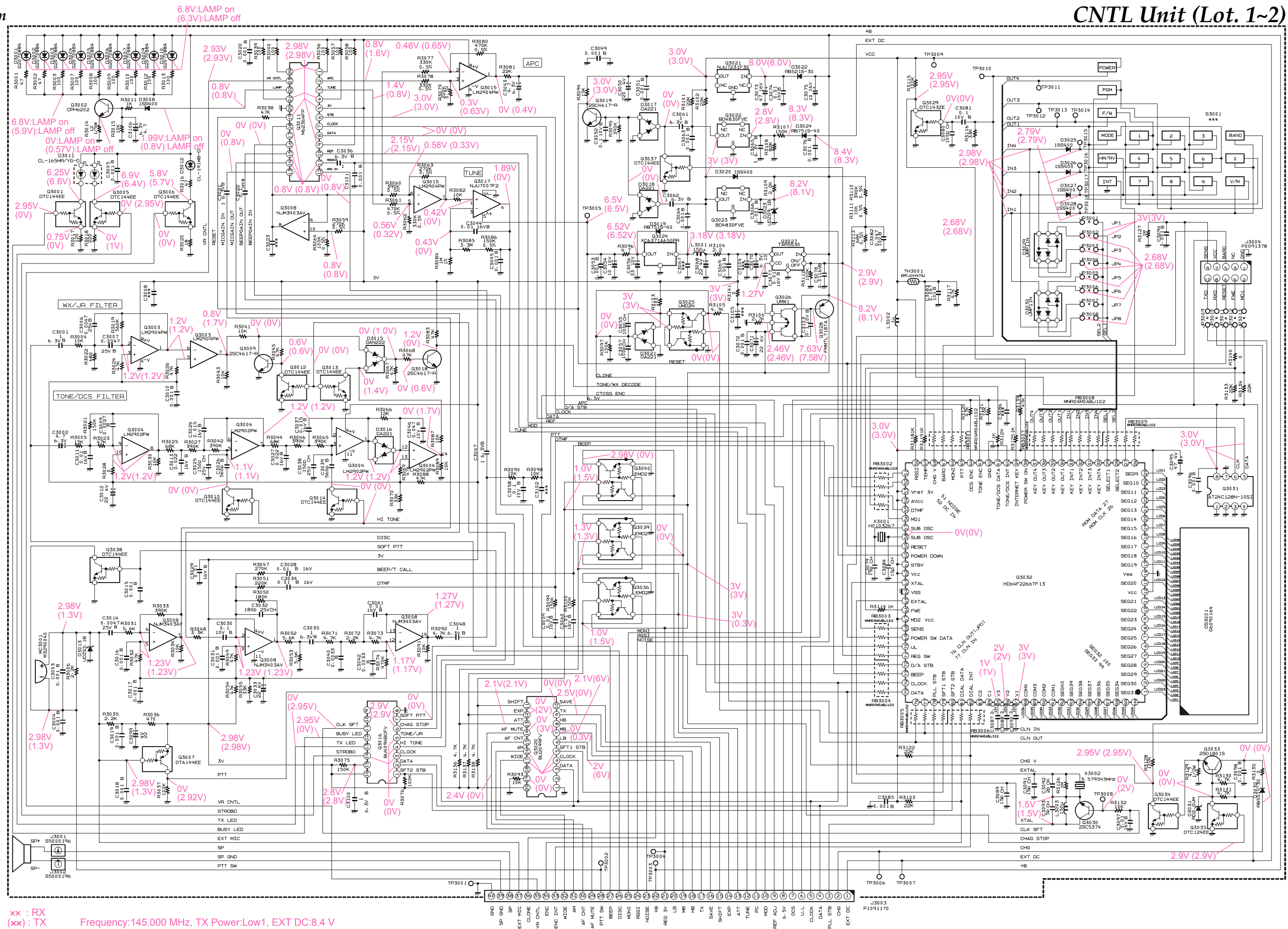
- Press the **[V/M]** button, then transmit and adjust the deviation for 0.6 kHz  $\pm 0.05$  kHz by rotating **DIAL**, then press the **[V/M]** button. Rotate the **DIAL** to select the next setting.

## *DCS Tx Deviation Adjustment (DCS) [30] (USA version only)*

- Press the **[V/M]** button, then transmit and adjust the deviation for 0.8 kHz  $\pm 0.05$  kHz by rotating **DIAL**, then press the **[V/M]** button.

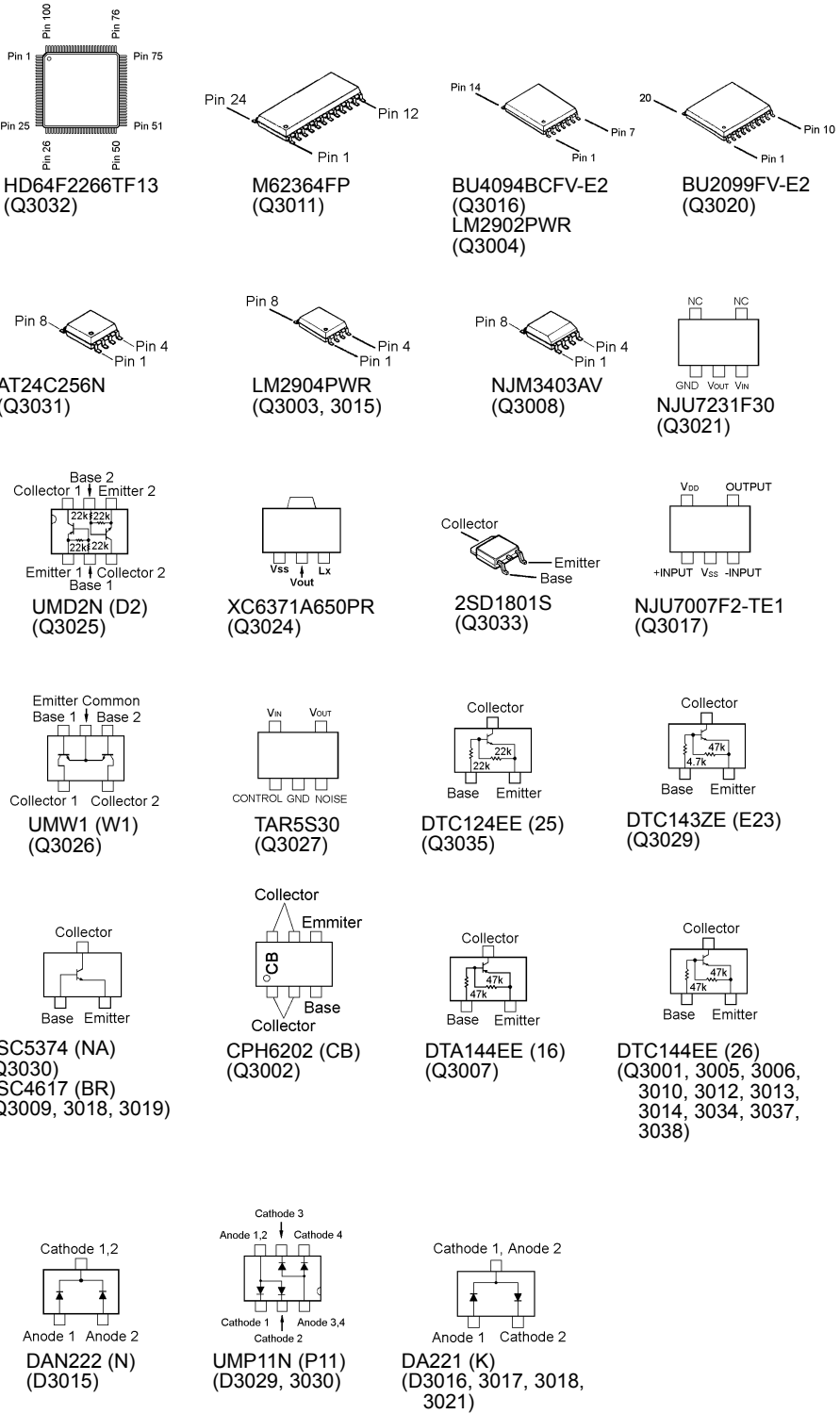
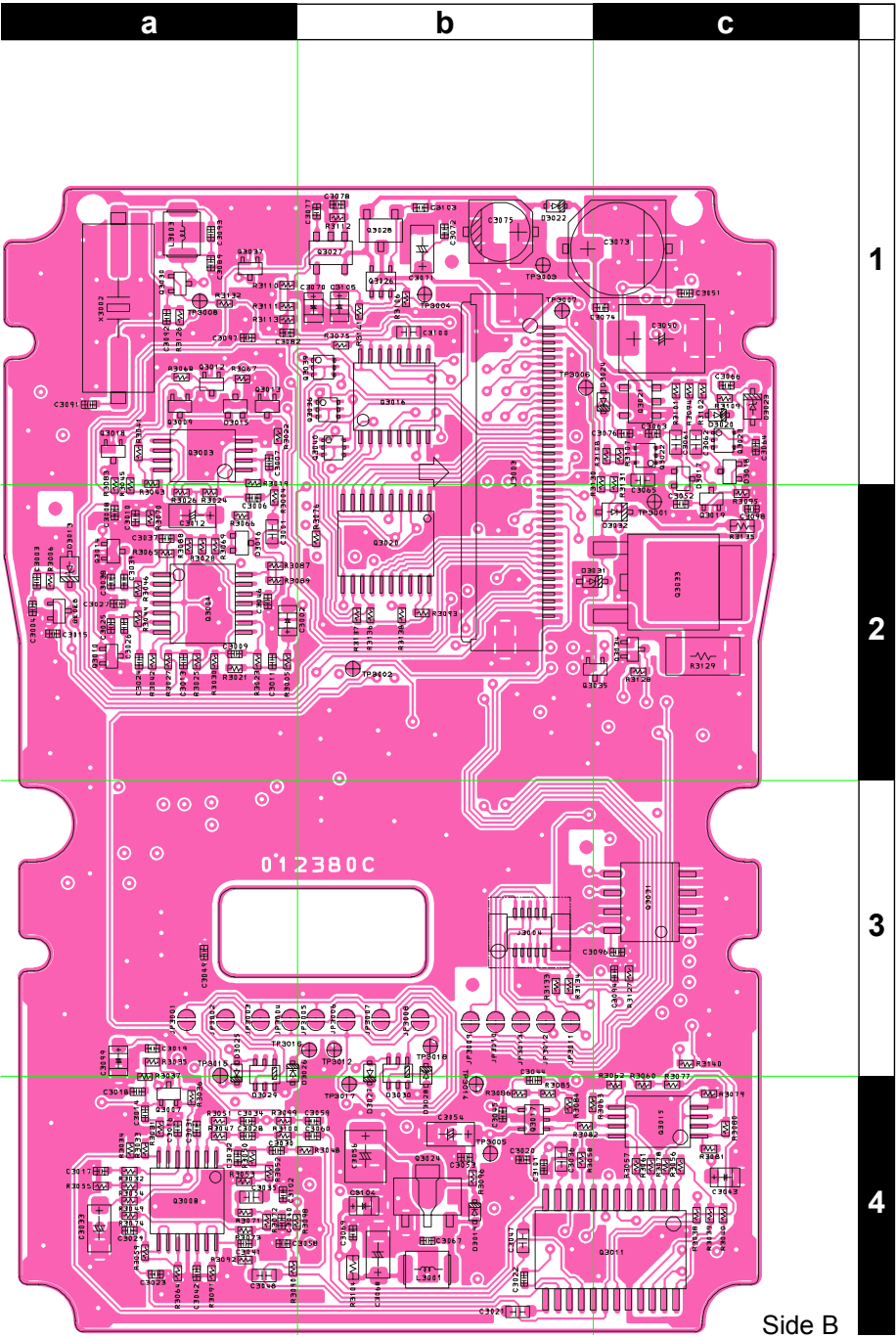
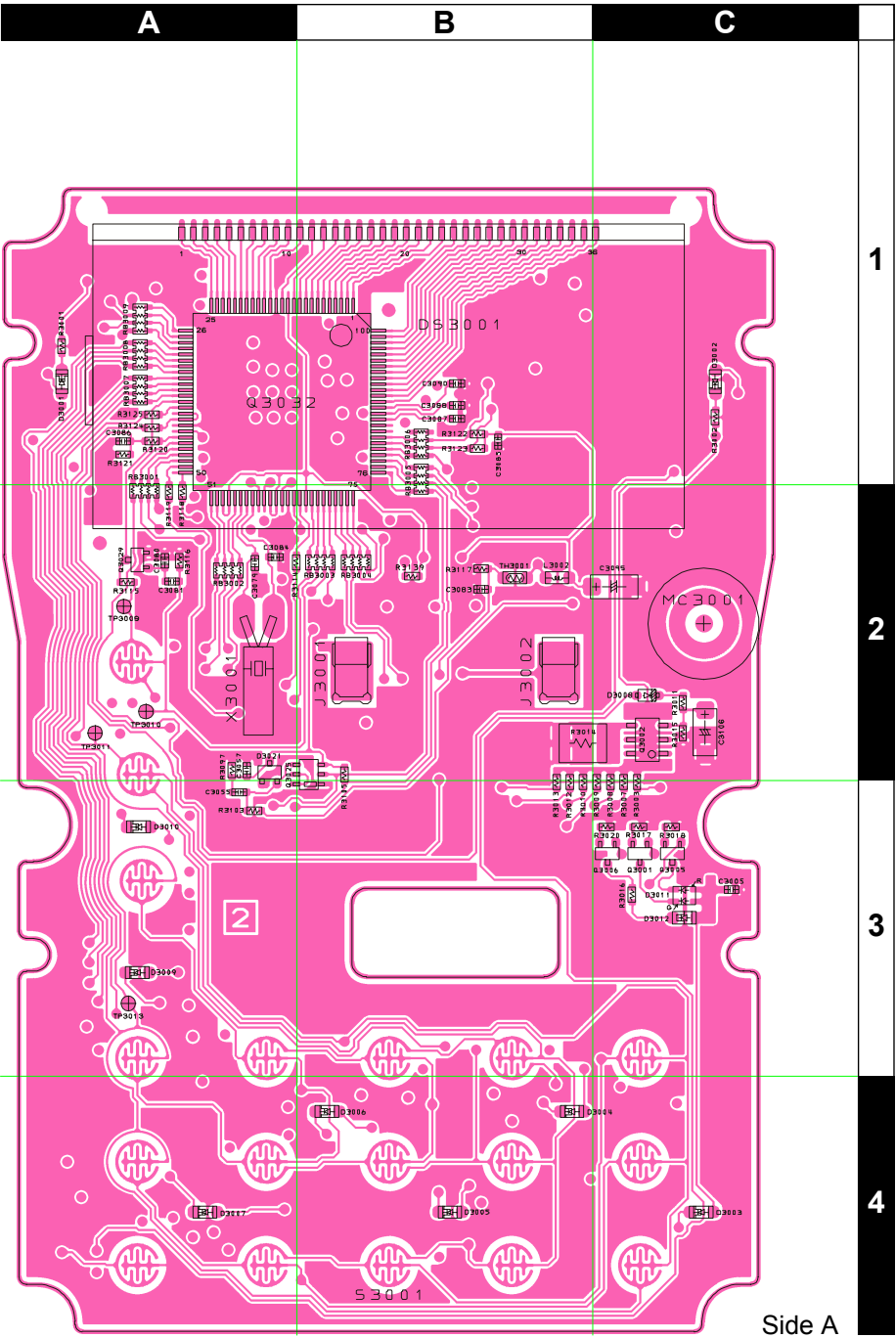
This completes the internal alignment routine for all bands.  
To save all settings and exit, press the **[HM/RV]** button.

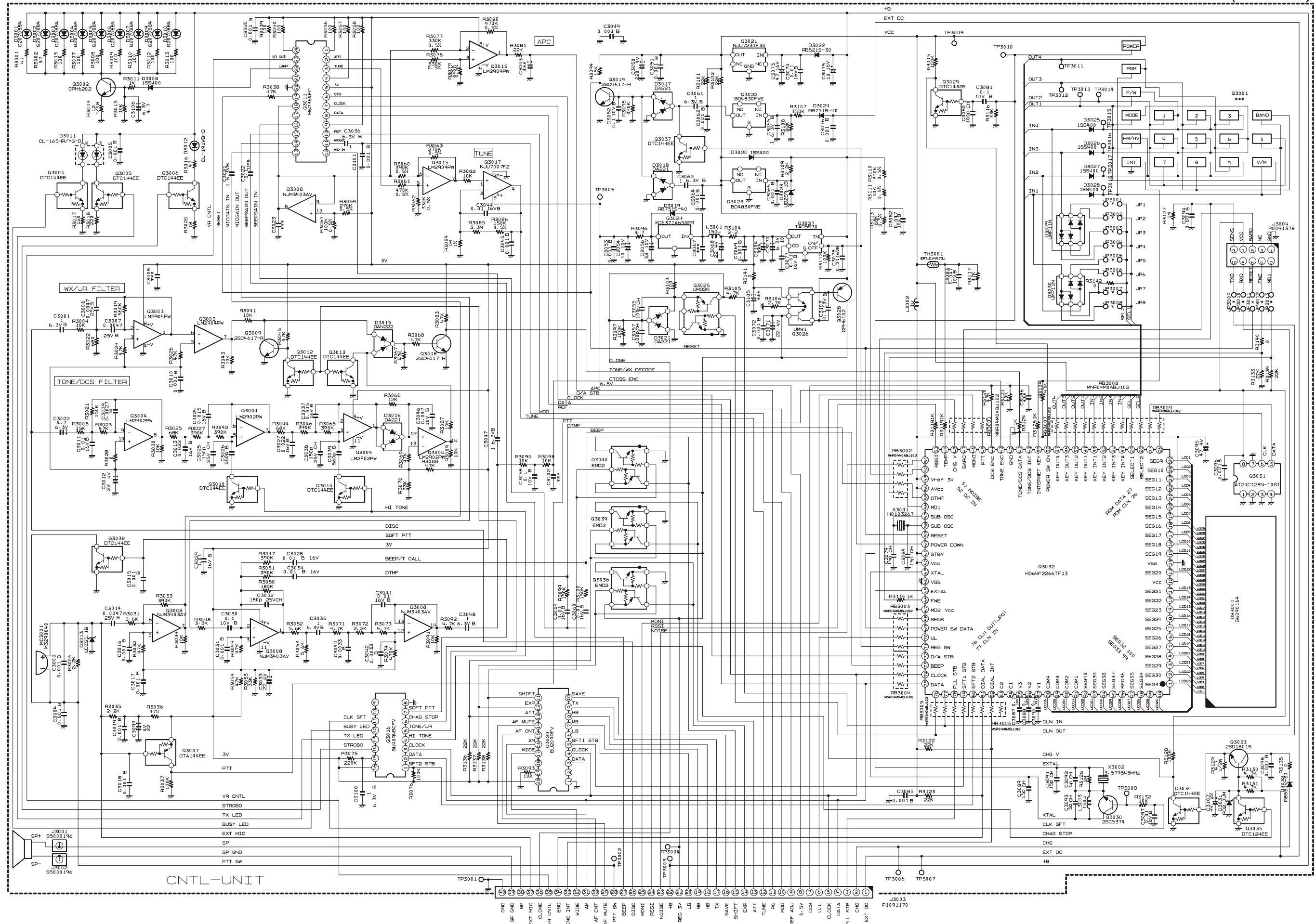
*Alignment*  
*Note:*



CNTL Unit (Lot. 1~2)

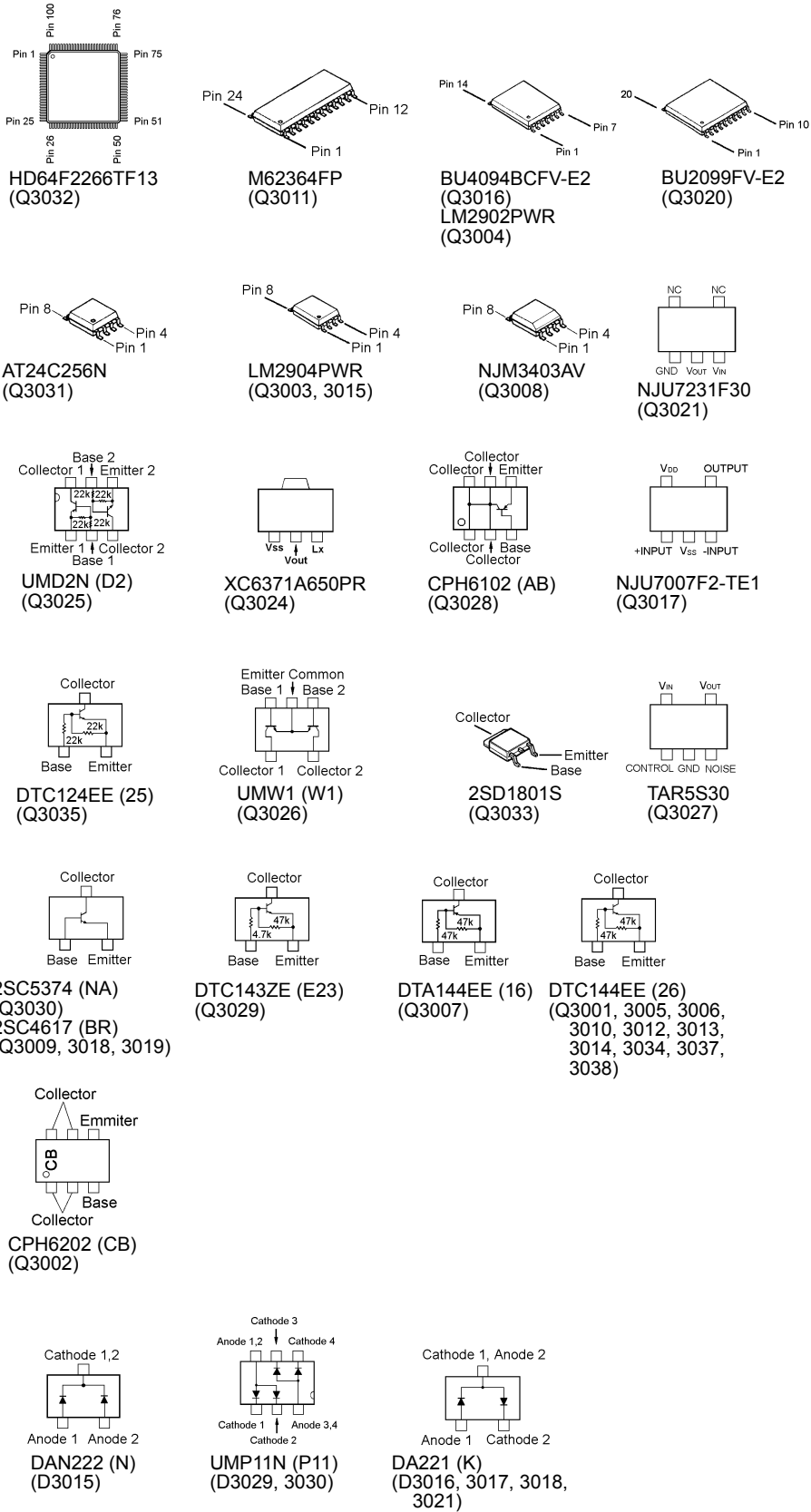
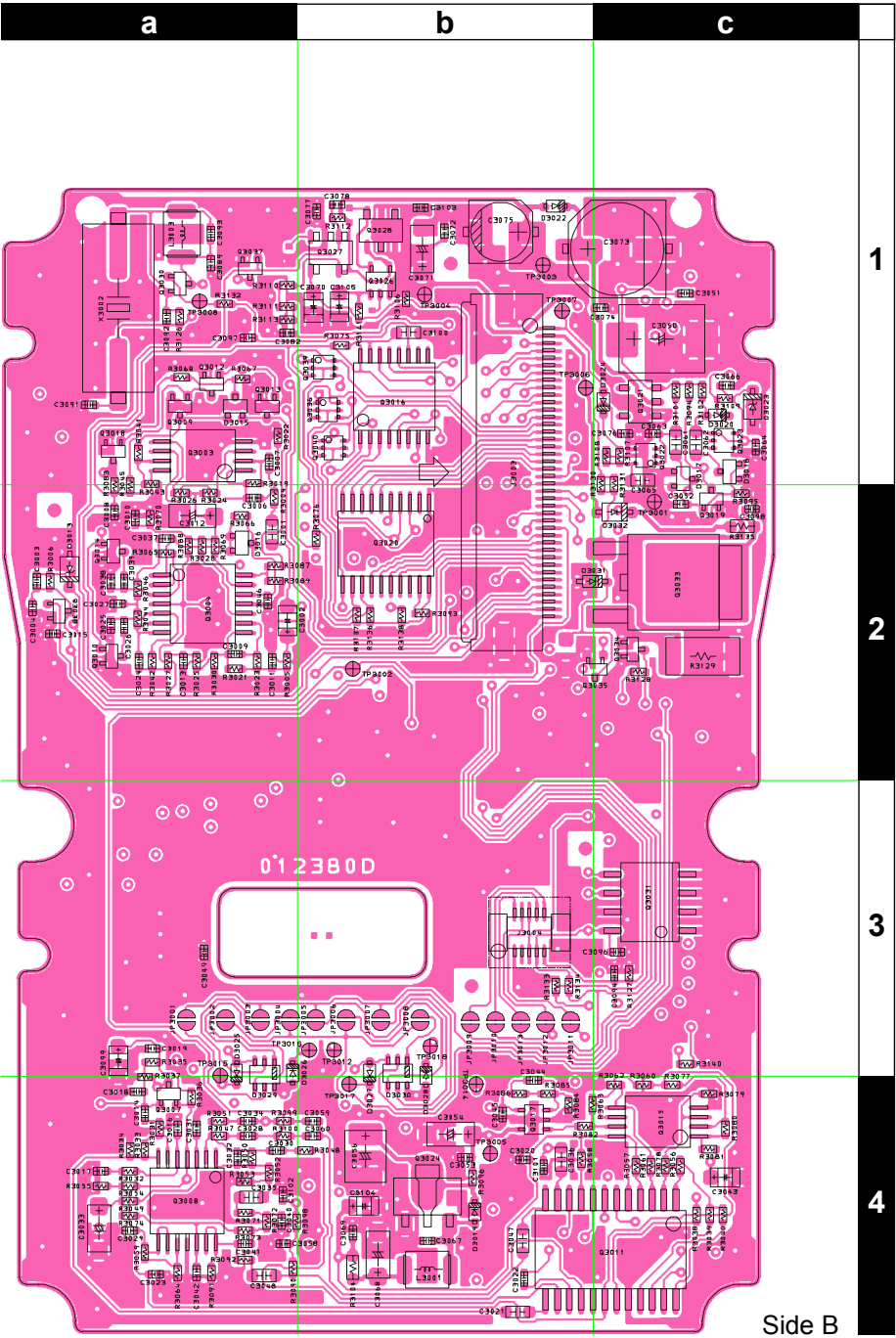
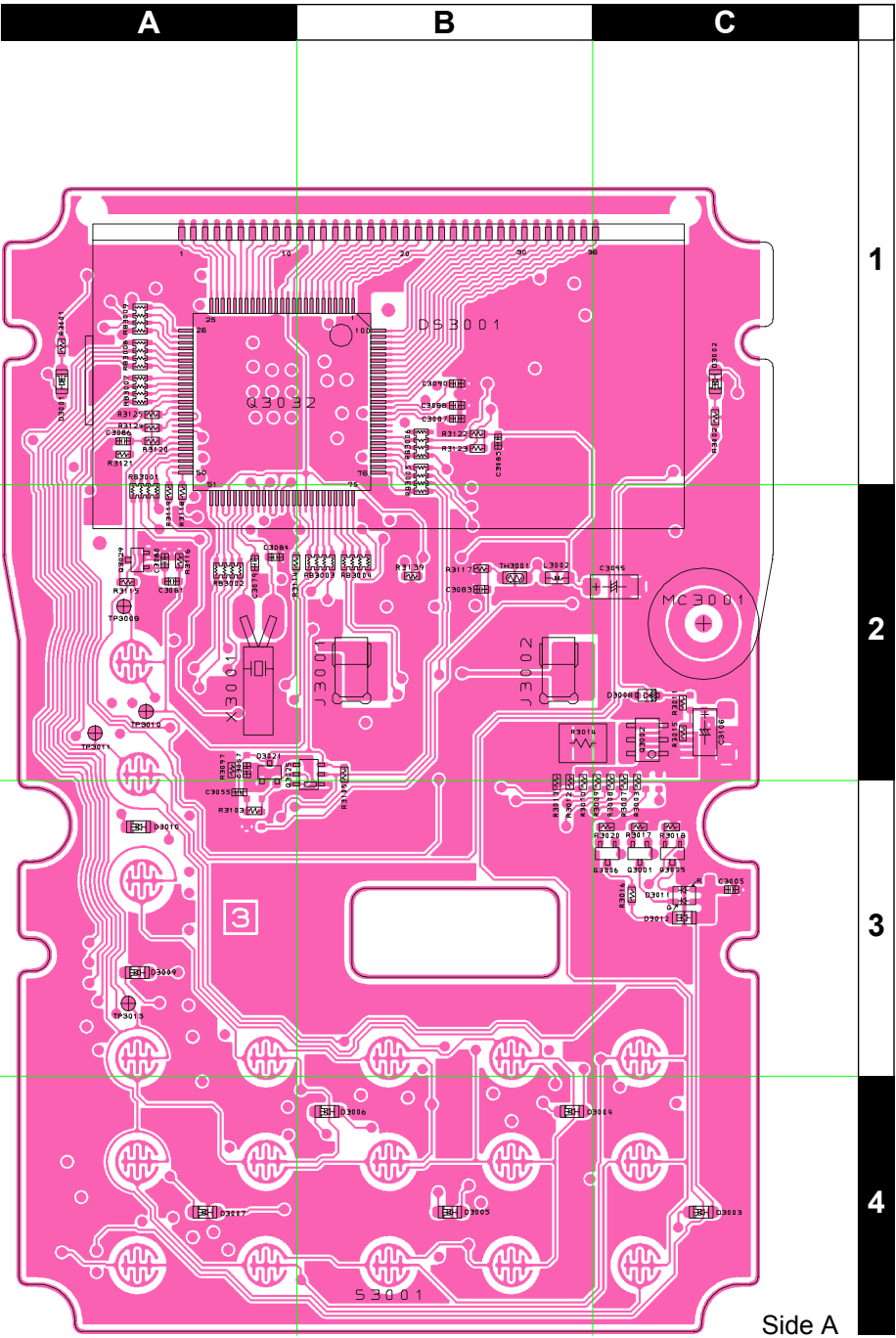
Parts Layout





CNTL Unit (Lot. 3~)

Parts Layout



## Parts List

| REF.                  | DESCRIPTION  | VALUE    | V/W  | TOL. | MFR'S DESIG     | VXSTD P/N | VERS.            | LOT. | SIDE | LAY ADR. |
|-----------------------|--------------|----------|------|------|-----------------|-----------|------------------|------|------|----------|
| *** CNTL UNIT ***     |              |          |      |      |                 |           |                  |      |      |          |
| PCB with Components   |              |          |      |      |                 | CB2944002 | DST:USA, TYP:AU2 |      |      |          |
|                       |              |          |      |      |                 | CB2944003 | DST:EXP, TYP:A1  |      |      |          |
|                       |              |          |      |      |                 | CB2944004 | DST:EXP, TYP:A2  |      |      |          |
|                       |              |          |      |      |                 | CB2944005 | DST:EXP, TYP:A3  |      |      |          |
|                       |              |          |      |      |                 | CB2944006 | DST:EU, TYP:B1   |      |      |          |
|                       |              |          |      |      |                 | CB2944007 | DST:EU, TYP:B2   |      |      |          |
|                       |              |          |      |      |                 | CB2944008 | DST:EXP, TYP:B3  |      |      |          |
|                       |              |          |      |      |                 | CB2944009 | DST:EU, TYP:C1   |      |      |          |
|                       |              |          |      |      |                 | CB2944010 | DST:EU, TYP:C2   |      |      |          |
|                       |              |          |      |      |                 | CB2944011 | DST:EXP, TYP:C3  |      |      |          |
|                       |              |          |      |      |                 | CB2944012 | DST:EU, TYP:D1   |      |      |          |
|                       |              |          |      |      |                 | CB2944013 | DST:EU, TYP:D2   |      |      |          |
|                       |              |          |      |      |                 | CB2944014 | DST:AUS, TYP:H1  |      |      |          |
|                       |              |          |      |      |                 | CB2944015 | DST:AUS, TYP:H2  |      |      |          |
| Printed Circuit Board |              |          |      |      |                 | FR012380C |                  | 1-   |      |          |
|                       |              |          |      |      |                 | FR012380D |                  | 3-   |      |          |
| C 3001                | CHIP CAP.    | 1uF      | 6.3V | B    | GRM39B105K6.3PT | K22084801 |                  | 1-   | B    | a2       |
| C 3002                | CHIP TA.CAP. | 4.7uF    | 6.3V |      | TESVSP0J475M-8R | K78080053 |                  | 1-   | B    | a2       |
| C 3003                | CHIP CAP.    | 0.001uF  | 50V  | B    | GRM36B102K50PT  | K22178809 |                  | 1-   | B    | a2       |
| C 3004                | CHIP CAP.    | 0.001uF  | 50V  | B    | GRM36B102K50PT  | K22178809 |                  | 1-   | B    | a2       |
| C 3005                | CHIP CAP.    | 0.001uF  | 50V  | B    | GRM36B102K50PT  | K22178809 |                  | 1-   | A    | C3       |
| C 3006                | CHIP CAP.    | 0.0047uF | 25V  | B    | TMK105B472KW-F  | K22148831 |                  | 1-   | B    | a2       |
| C 3007                | CHIP CAP.    | 0.0047uF | 25V  | B    | TMK105B472KW-F  | K22148831 |                  | 1-   | B    | a1       |
| C 3009                | CHIP CAP.    | 0.0027uF | 50V  | B    | UMK105B272KW-F  | K22178834 |                  | 1-   | B    | a2       |
| C 3010                | CHIP CAP.    | 0.001uF  | 50V  | B    | GRM36B102K50PT  | K22178809 |                  | 1-   | B    | a2       |
| C 3011                | CHIP CAP.    | 0.01uF   | 16V  | B    | GRM36B103K16PT  | K22128804 |                  | 1-   | B    | a2       |
| C 3012                | CHIP TA.CAP. | 22uF     | 4V   |      | TEMSVA0G226M-8R | K78060023 |                  | 1-   | B    | a2       |
| C 3013                | CHIP CAP.    | 0.022uF  | 16V  | B    | EMK105B223KW-F  | K22128813 |                  | 1-   | B    | a2       |
| C 3014                | CHIP CAP.    | 0.0047uF | 25V  | B    | TMK105B472KW-F  | K22148831 |                  | 1-   | B    | a4       |
| C 3015                | CHIP CAP.    | 0.001uF  | 50V  | B    | GRM36B102K50PT  | K22178809 |                  | 1-   | B    | a2       |
| C 3016                | CHIP CAP.    | 0.001uF  | 50V  | B    | GRM36B102K50PT  | K22178809 |                  | 1-   | B    | a4       |
| C 3017                | CHIP CAP.    | 0.001uF  | 50V  | B    | GRM36B102K50PT  | K22178809 |                  | 1-   | B    | a4       |
| C 3018                | CHIP CAP.    | 0.001uF  | 50V  | B    | GRM36B102K50PT  | K22178809 |                  | 1-   | B    | a4       |
| C 3019                | CHIP CAP.    | 0.001uF  | 50V  | B    | GRM36B102K50PT  | K22178809 |                  | 1-   | B    | a3       |
| C 3020                | CHIP CAP.    | 0.001uF  | 50V  | B    | GRM36B102K50PT  | K22178809 |                  | 1-   | B    | b4       |
| C 3021                | CHIP CAP.    | 1uF      | 6.3V | B    | GRM39B105K6.3PT | K22084801 |                  | 1-   | B    | b4       |
| C 3022                | CHIP CAP.    | 0.1uF    | 10V  | B    | GRM36B104K10PT  | K22108802 |                  | 1-   | B    | b4       |
| C 3024                | CHIP CAP.    | 0.015uF  | 16V  | B    | EMK105B153KW-F  | K22128811 |                  | 1-   | B    | a2       |
| C 3025                | CHIP CAP.    | 150pF    | 25V  | CH   | TMK105CH151JW-F | K22148242 |                  | 1-   | B    | a2       |
| C 3026                | CHIP CAP.    | 560pF    | 50V  | B    | UMK105B561KW-F  | K22178826 |                  | 1-   | B    | a2       |
| C 3027                | CHIP CAP.    | 0.022uF  | 16V  | B    | EMK105B223KW-F  | K22128813 |                  | 1-   | B    | a2       |
| C 3028                | CHIP CAP.    | 0.01uF   | 16V  | B    | GRM36B103K16PT  | K22128804 |                  | 1-   | B    | a4       |
| C 3029                | CHIP CAP.    | 0.01uF   | 16V  | B    | GRM36B103K16PT  | K22128804 |                  | 1-   | B    | a4       |
| C 3030                | CHIP CAP.    | 0.1uF    | 10V  | B    | GRM36B104K10PT  | K22108802 |                  | 1-   | B    | a4       |
| C 3031                | CHIP CAP.    | 0.001uF  | 50V  | B    | GRM36B102K50PT  | K22178809 |                  | 1-   | B    | a4       |
| C 3032                | CHIP CAP.    | 180pF    | 25V  | CH   | TMK105CH181JW-F | K22148244 |                  | 1-   | B    | a4       |
| C 3033                | CHIP TA.CAP. | 22uF     | 4V   |      | TEMSVA0G226M-8R | K78060023 |                  | 1-   | B    | a4       |
| C 3034                | CHIP CAP.    | 0.01uF   | 16V  | B    | GRM36B103K16PT  | K22128804 |                  | 1-   | B    | a4       |
| C 3035                | CHIP CAP.    | 1uF      | 6.3V | B    | GRM39B105K6.3PT | K22084801 |                  | 1-   | B    | a4       |
| C 3036                | CHIP CAP.    | 1uF      | 6.3V | B    | GRM39B105K6.3PT | K22084801 |                  | 1-   | B    | b4       |
| C 3037                | CHIP CAP.    | 0.015uF  | 16V  | B    | EMK105B153KW-F  | K22128811 |                  | 1-   | B    | a2       |
| C 3038                | CHIP CAP.    | 150pF    | 25V  | CH   | TMK105CH151JW-F | K22148242 |                  | 1-   | B    | a2       |
| C 3039                | CHIP CAP.    | 560pF    | 50V  | B    | UMK105B561KW-F  | K22178826 |                  | 1-   | B    | a2       |
| C 3040                | CHIP CAP.    | 0.0033uF | 50V  | B    | GRM36B332K50PT  | K22178815 |                  | 1-   | B    | a4       |
| C 3041                | CHIP CAP.    | 0.01uF   | 16V  | B    | GRM36B103K16PT  | K22128804 |                  | 1-   | B    | a4       |
| C 3042                | CHIP CAP.    | 0.0033uF | 50V  | B    | UMK105B332KW-F  | K22178835 |                  | 1-   | B    | a4       |
| C 3044                | CHIP CAP.    | 0.01uF   | 16V  | B    | GRM36B103K16PT  | K22128804 |                  | 1-   | B    | b4       |
| C 3045                | CHIP CAP.    | 0.001uF  | 50V  | B    | GRM36B102K50PT  | K22178809 |                  | 1-   | B    | b4       |
| C 3046                | CHIP CAP.    | 0.047uF  | 10V  | B    | GRM36B473K10PT  | K22108801 |                  | 1-   | B    | a2       |
| C 3047                | CHIP CAP.    | 1uF      | 6.3V | B    | GRM39B105K6.3PT | K22084801 |                  | 1-   | B    | b4       |
| C 3048                | CHIP CAP.    | 1uF      | 6.3V | B    | GRM39B105K6.3PT | K22084801 |                  | 1-   | B    | a4       |

# CNTL Unit

| REF.   | DESCRIPTION     | VALUE   | V/W  | TOL. | MFR'S DESIG            | VXSTD P/N | VERS. | LOT. | SIDE | LAY ADR. |
|--------|-----------------|---------|------|------|------------------------|-----------|-------|------|------|----------|
| C 3049 | CHIP CAP.       | 0.001uF | 50V  | B    | GRM36B102K50PT         | K22178809 |       | 1-   | B    | a3       |
| C 3050 | CHIP TA.CAP.    | 220uF   | 4V   |      | SK4-0G227M-RD          | K78060014 |       | 1-   | B    | c1       |
| C 3051 | CHIP CAP.       | 0.001uF | 50V  | B    | GRM36B102K50PT         | K22178809 |       | 1-   | B    | c1       |
| C 3052 | CHIP CAP.       | 0.1uF   | 10V  | B    | GRM36B104K10PT         | K22108802 |       | 1-   | B    | c2       |
| C 3053 | CHIP CAP.       | 0.001uF | 50V  | B    | GRM36B102K50PT         | K22178809 |       | 1-   | B    | b4       |
| C 3054 | CHIP TA.CAP.    | 10uF    | 10V  |      | TEMSVA1A106M-8R        | K78100028 |       | 1-   | B    | b4       |
| C 3055 | CHIP CAP.       | 100pF   | 50V  | CH   | GRM36CH101J50PT        | K22178236 |       | 1-   | A    | A3       |
| C 3056 | CHIP TA.CAP.    | 33uF    | 10V  |      | TEMSVB21A336M-8R       | K78100047 |       | 1-   | B    | b4       |
| C 3057 | CHIP CAP.       | 100pF   | 50V  | CH   | GRM36CH101J50PT        | K22178236 |       | 1-   | A    | A2       |
| C 3058 | CHIP CAP.       | 0.1uF   | 10V  | B    | GRM36B104K10PT         | K22108802 |       | 1-   | B    | a4       |
| C 3059 | CHIP CAP.       | 0.01uF  | 16V  | B    | GRM36B103K16PT         | K22128804 |       | 1-   | B    | b4       |
| C 3060 | CHIP CAP.       | 0.01uF  | 16V  | B    | GRM36B103K16PT         | K22128804 |       | 1-   | B    | b4       |
| C 3061 | CHIP CAP.       | 1uF     | 6.3V | B    | GRM39B105K6.3PT        | K22084801 |       | 1-   | B    | c1       |
| C 3062 | CHIP CAP.       | 1uF     | 6.3V | B    | GRM39B105K6.3PT        | K22084801 |       | 1-   | B    | c1       |
| C 3063 | CHIP CAP.       | 0.001uF | 50V  | B    | GRM36B102K50PT         | K22178809 |       | 1-   | B    | c1       |
| C 3064 | CHIP CAP.       | 0.001uF | 50V  | B    | GRM36B102K50PT         | K22178809 |       | 1-   | B    | c1       |
| C 3065 | CHIP CAP.       | 1uF     | 6.3V | B    | GRM39B105K6.3PT        | K22084801 |       | 1-   | B    | c1       |
| C 3066 | CHIP CAP.       | 0.001uF | 50V  | B    | GRM36B102K50PT         | K22178809 |       | 1-   | B    | c1       |
| C 3068 | CHIP TA.CAP.    | 22uF    | 4V   |      | TEMSVA0G226M-8R        | K78060023 |       | 1-   | B    | b4       |
| C 3069 | CHIP CAP.       | 0.001uF | 50V  | B    | GRM36B102K50PT         | K22178809 |       | 1-   | B    | b4       |
| C 3070 | CHIP TA.CAP.    | 10uF    | 6.3V |      | TESVSP0J106M-8R        | K78080055 |       | 1-   | B    | b1       |
| C 3071 | CHIP TA.CAP.    | 22uF    | 4V   |      | TEMSVA0G226M-8R        | K78060023 |       | 1-   | B    | b1       |
| C 3072 | CHIP CAP.       | 0.001uF | 50V  | B    | GRM36B102K50PT         | K22178809 |       | 1-   | B    | b1       |
| C 3073 | AL.ELECTRO.CAP. | 47uF    | 16V  |      | RV4-16V470MF46-RR2     | K48120019 |       | 1-   | B    | c1       |
| C 3074 | CHIP CAP.       | 0.01uF  | 16V  | B    | GRM36B103K16PT         | K22128804 |       | 1-   | B    | c1       |
| C 3075 | AL.ELECTRO.CAP. | 10uF    | 16V  |      | RV4-16V100MD46-RR2     | K48120018 |       | 1-   | B    | b1       |
| C 3076 | CHIP CAP.       | 0.001uF | 50V  | B    | GRM36B102K50PT         | K22178809 |       | 1-   | B    | c1       |
| C 3077 | CHIP CAP.       | 0.01uF  | 16V  | B    | GRM36B103K16PT         | K22128804 |       | 1-   | B    | a1       |
| C 3078 | CHIP CAP.       | 0.01uF  | 16V  | B    | GRM36B103K16PT         | K22128804 |       | 1-   | B    | b1       |
| C 3079 | CHIP CAP.       | 15pF    | 50V  | CH   | GRM36CH150J50PT        | K22178216 |       | 1-   | A    | A2       |
| C 3080 | CHIP CAP.       | 100pF   | 50V  | CH   | GRM36CH101J50PT        | K22178236 |       | 1-   | A    | A2       |
| C 3081 | CHIP CAP.       | 0.1uF   | 10V  | B    | GRM36B104K10PT         | K22108802 |       | 1-   | A    | A2       |
| C 3082 | CHIP CAP.       | 0.047uF | 10V  | B    | GRM36B473K10PT         | K22108801 |       | 1-   | B    | a1       |
| C 3083 | CHIP CAP.       | 0.047uF | 10V  | B    | GRM36B473K10PT         | K22108801 |       | 1-   | A    | B2       |
| C 3084 | CHIP CAP.       | 15pF    | 50V  | CH   | GRM36CH150J50PT        | K22178216 |       | 1-   | A    | A2       |
| C 3085 | CHIP CAP.       | 0.001uF | 50V  | B    | GRM36B102K50PT         | K22178809 |       | 1-   | A    | B1       |
| C 3087 | CHIP CAP.       | 0.1uF   | 10V  | B    | GRM36B104K10PT         | K22108802 |       | 1-   | A    | B1       |
| C 3088 | CHIP CAP.       | 0.1uF   | 10V  | B    | GRM36B104K10PT         | K22108802 |       | 1-   | A    | B1       |
| C 3089 | CHIP CAP.       | 15pF    | 50V  | CH   | GRM36CH150J50PT        | K22178216 |       | 1-   | B    | a1       |
| C 3090 | CHIP CAP.       | 0.1uF   | 10V  | B    | GRM36B104K10PT         | K22108802 |       | 1-   | A    | B1       |
| C 3091 | CHIP CAP.       | 15pF    | 50V  | CH   | GRM36CH150J50PT        | K22178216 |       | 1-   | B    | a1       |
| C 3092 | CHIP CAP.       | 4pF     | 50V  | CH   | UMK105CH040CW-F        | K22178252 |       | 1-   | B    | a1       |
| C 3093 | CHIP CAP.       | 5pF     | 50V  | CH   | UMK105CH050CW-F        | K22178253 |       | 1-   | B    | a1       |
| C 3094 | CHIP CAP.       | 0.001uF | 50V  | B    | GRM36B102K50PT         | K22178809 |       | 1-   | B    | c3       |
| C 3095 | CHIP TA.CAP.    | 47uF    | 4V   |      | SK7-0G476M-RA          | K78060048 |       | 1-   | A    | C2       |
| C 3096 | CHIP CAP.       | 0.001uF | 50V  | B    | GRM36B102K50PT         | K22178809 |       | 1-   | B    | c3       |
| C 3097 | CHIP CAP.       | 0.01uF  | 16V  | B    | GRM36B103K16PT         | K22128804 |       | 1-   | B    | a1       |
| C 3098 | CHIP CAP.       | 0.001uF | 50V  | B    | GRM36B102K50PT         | K22178809 |       | 1-   | B    | c2       |
| C 3099 | CHIP TA.CAP.    | 22uF    | 4V   |      | TESVSP0G226M-8R        | K78060047 |       | 1-   | B    | a3       |
| C 3100 | CHIP CAP.       | 1uF     | 6.3V | B    | GRM39B105K6.3PT        | K22084801 |       | 1-   | B    | b1       |
| C 3101 | CHIP CAP.       | 0.001uF | 50V  | B    | GRM36B102K50PT         | K22178809 |       | 1-   | B    | b4       |
| C 3103 | CHIP CAP.       | 0.1uF   | 10V  | B    | GRM36B104K10PT         | K22108802 |       | 1-   | B    | b1       |
| C 3106 | CHIP TA.CAP.    | 4.7uF   | 6.3V |      | TEMSVA0J475M-8R        | K78080017 |       | 1-   | A    | C2       |
| C 3107 | CHIP TA.CAP.    | 22uF    | 4V   |      | TESVSP0G226M-8R        | K78060047 |       | 1-   | B    | b2       |
| D 3001 | LED             |         |      |      | 19-215UYOC/S530-A2/TR8 | G2070884  |       | 1-   | A    | A1       |
| D 3002 | LED             |         |      |      | 19-215UYOC/S530-A2/TR8 | G2070884  |       | 1-   | A    | C1       |
| D 3003 | LED             |         |      |      | 19-215UYOC/S530-A2/TR8 | G2070884  |       | 1-   | A    | C4       |
| D 3004 | LED             |         |      |      | 19-215UYOC/S530-A2/TR8 | G2070884  |       | 1-   | A    | B4       |
| D 3005 | LED             |         |      |      | 19-215UYOC/S530-A2/TR8 | G2070884  |       | 1-   | A    | B4       |
| D 3006 | LED             |         |      |      | 19-215UYOC/S530-A2/TR8 | G2070884  |       | 1-   | A    | B4       |
| D 3007 | LED             |         |      |      | 19-215UYOC/S530-A2/TR8 | G2070884  |       | 1-   | A    | A4       |
| D 3008 | DIODE           |         |      |      | 1SS400 TE61            | G2070634  |       | 1-   | A    | C2       |

| REF.   | DESCRIPTION        | VALUE | V/W | TOL. | MFR'S DESIG            | VXSTD P/N | VERS. | LOT. | SIDE | LAY ADR. |
|--------|--------------------|-------|-----|------|------------------------|-----------|-------|------|------|----------|
| D 3009 | LED                |       |     |      | 19-215UYOC/S530-A2/TR8 | G2070884  |       | 1-   | A    | A3       |
| D 3010 | LED                |       |     |      | 19-215UYOC/S530-A2/TR8 | G2070884  |       | 1-   | A    | A3       |
| D 3011 | LED                |       |     |      | CL-165HR/YG-D-T        | G2070860  |       | 1-   | A    | C3       |
| D 3012 | LED                |       |     |      | CL-191WB-D(TAPE)       | G2070952  |       | 1-   | A    | C3       |
| D 3013 | DIODE              |       |     |      | UDZS TE-17 5.1B        | G2070908  |       | 1-   | B    | a2       |
| D 3015 | DIODE              |       |     |      | DAN222 TL              | G2070174  |       | 1-   | B    | a1       |
| D 3016 | DIODE              |       |     |      | DA221 TL               | G2070178  |       | 1-   | B    | a2       |
| D 3017 | DIODE              |       |     |      | DA221 TL               | G2070178  |       | 1-   | B    | c1       |
| D 3018 | DIODE              |       |     |      | DA221 TL               | G2070178  |       | 1-   | B    | c1       |
| D 3019 | DIODE              |       |     |      | RB751S-40TE61          | G2070850  |       | 1-   | B    | b4       |
| D 3020 | DIODE              |       |     |      | 1SS400 TE61            | G2070634  |       | 1-   | B    | c1       |
| D 3021 | DIODE              |       |     |      | DA221 TL               | G2070178  |       | 1-   | A    | A2       |
| D 3022 | DIODE              |       |     |      | RB521S-30 TE61         | G2070642  |       | 1-   | B    | b1       |
| D 3023 | DIODE              |       |     |      | UDZS TE-17 9.1B        | G2070868  |       | 1-   | B    | c1       |
| D 3024 | DIODE              |       |     |      | RB751S-40TE61          | G2070850  |       | 1-   | B    | c1       |
| D 3025 | DIODE              |       |     |      | 1SS400 TE61            | G2070634  |       | 1-   | B    | a3       |
| D 3026 | DIODE              |       |     |      | 1SS400 TE61            | G2070634  |       | 1-   | B    | a3       |
| D 3027 | DIODE              |       |     |      | 1SS400 TE61            | G2070634  |       | 1-   | B    | b3       |
| D 3028 | DIODE              |       |     |      | 1SS400 TE61            | G2070634  |       | 1-   | B    | b3       |
| D 3029 | DIODE              |       |     |      | UMP11N TN              | G2070646  |       | 1-   | B    | a3       |
| D 3030 | DIODE              |       |     |      | UMP11N TN              | G2070646  |       | 1-   | B    | b3       |
| D 3031 | DIODE              |       |     |      | RD2.0UM-T2             | G2070190  |       | 1-   | B    | b2       |
| D 3032 | DIODE              |       |     |      | RB551V-30 TE-17        | G2070892  |       | 1-   | B    | c2       |
| DS3001 | LCD                |       |     |      | AH021M                 | G6090164  |       | 1-   | A    | B1       |
| J 3001 | SHIELD FINGER      |       |     |      | 2026 3100012           | S5000196  |       | 1-   | A    | B2       |
| J 3002 | SHIELD FINGER      |       |     |      | 2026 3100012           | S5000196  |       | 1-   | A    | B2       |
| J 3003 | CONNECTOR          |       |     |      | 9637S-40-Y905          | P1091170  |       | 1-   | B    | b1       |
| J 3004 | CONNECTOR          |       |     |      | AXK6F10345YP           | P0091378  |       | 1-   | B    | b3       |
| L 3001 | M.RFC              | 150uH |     |      | FLC32P-T-151K          | L1690661  |       | 1-   | B    | b4       |
| L 3002 | M.RFC              | 1uH   |     |      | LK1608 1R0K-T          | L1690687  |       | 1-   | A    | B2       |
| L 3003 | M.RFC              | 150uH |     |      | FLC32T-151J            | L1690229  |       | 1-   | B    | a1       |
| MC3001 | MICROPHONE ELEMENT |       |     |      | SKB-2244S-C1033MG      | M3290040  |       | 1-   | A    | C2       |
| Q 3001 | TRANSISTOR         |       |     |      | DTC144EE TL            | G3070075  |       | 1-   | A    | C3       |
| Q 3002 | TRANSISTOR         |       |     |      | CPH6202-TL             | G3070265  |       | 1-   | A    | C2       |
| Q 3003 | IC                 |       |     |      | LM2904PWR              | G1094010  |       | 1-   | B    | a1       |
| Q 3004 | IC                 |       |     |      | LM2902PWR              | G1094009  |       | 1-   | B    | a2       |
| Q 3005 | TRANSISTOR         |       |     |      | DTC144EE TL            | G3070075  |       | 1-   | A    | C3       |
| Q 3006 | TRANSISTOR         |       |     |      | DTC144EE TL            | G3070075  |       | 1-   | A    | C3       |
| Q 3007 | TRANSISTOR         |       |     |      | DTA144EE TL            | G3070074  |       | 1-   | B    | a4       |
| Q 3008 | IC                 |       |     |      | NJM3403AV-TE1          | G1092215  |       | 1-   | B    | a4       |
| Q 3009 | TRANSISTOR         |       |     |      | 2SC4617 TL R           | G3346178R |       | 1-   | B    | a1       |
| Q 3010 | TRANSISTOR         |       |     |      | DTC144EE TL            | G3070075  |       | 1-   | B    | a2       |
| Q 3011 | IC                 |       |     |      | M62364FP 600D          | G1093033  |       | 1-   | B    | c4       |
| Q 3012 | TRANSISTOR         |       |     |      | DTC144EE TL            | G3070075  |       | 1-   | B    | a1       |
| Q 3013 | TRANSISTOR         |       |     |      | DTC144EE TL            | G3070075  |       | 1-   | B    | a1       |
| Q 3014 | TRANSISTOR         |       |     |      | DTC144EE TL            | G3070075  |       | 1-   | B    | a2       |
| Q 3015 | IC                 |       |     |      | LM2904PWR              | G1094010  |       | 1-   | B    | c4       |
| Q 3016 | IC                 |       |     |      | BU4094BCFV-E2          | G1093527  |       | 1-   | B    | b1       |
| Q 3017 | IC                 |       |     |      | NJU7007F2-TE1          | G1093617  |       | 1-   | B    | b4       |
| Q 3018 | TRANSISTOR         |       |     |      | 2SC4617 TL R           | G3346178R |       | 1-   | B    | a1       |
| Q 3019 | TRANSISTOR         |       |     |      | 2SC4617 TL R           | G3346178R |       | 1-   | B    | c2       |
| Q 3020 | IC                 |       |     |      | BU2099FV-E2            | G1093243  |       | 1-   | B    | b2       |
| Q 3021 | IC                 |       |     |      | NJU7231F30-TE1         | G1093512  |       | 1-   | B    | c1       |
| Q 3022 | IC                 |       |     |      | BD4830FVE-TR           | G1094121  |       | 1-   | B    | c1       |
| Q 3023 | IC                 |       |     |      | BD4830FVE-TR           | G1094121  |       | 1-   | B    | c1       |
| Q 3024 | IC                 |       |     |      | XC6371A650PR           | G1094017  |       | 1-   | B    | b4       |
| Q 3025 | TRANSISTOR         |       |     |      | UMD2N TR               | G3070076  |       | 1-   | A    | B2       |
| Q 3026 | TRANSISTOR         |       |     |      | UMW1 TR                | G3070078  |       | 1-   | B    | b1       |
| Q 3027 | IC                 |       |     |      | TAR5S30(TE85L)         | G1093570  |       | 1-   | B    | b1       |
| Q 3028 | TRANSISTOR         |       |     |      | FMMTL718TA             | G3070335  |       | 1-   | B    | b1       |
| Q 3028 | TRANSISTOR         |       |     |      | CPH6102-TL             | G3070223  |       | 3-   | B    | b1       |
| Q 3029 | TRANSISTOR         |       |     |      | DTC143ZE TL            | G3070102  |       | 1-   | A    | A2       |

# CNTL Unit

| REF.   | DESCRIPTION | VALUE | V/W   | TOL. | MFR'S DESIG        | VXSTD P/N | VERS. | LOT. | SIDE | LAY ADR. |
|--------|-------------|-------|-------|------|--------------------|-----------|-------|------|------|----------|
| Q 3030 | TRANSISTOR  |       |       |      | 2SC5374-TL         | G3353748  |       | 1-   | B    | a1       |
| Q 3031 | IC          |       |       |      | AT24C256N-10SI-1.8 | G1093837  |       | 1-   | B    | c3       |
| Q 3032 | IC          |       |       |      | HD64F2266TF13      | ✖         |       | 1-   | A    | A1       |
| Q 3033 | TRANSISTOR  |       |       |      | 2SD1801S-TL        | G3418018S |       | 1-   | B    | c2       |
| Q 3034 | TRANSISTOR  |       |       |      | DTC144EE TL        | G3070075  |       | 1-   | B    | c2       |
| Q 3035 | TRANSISTOR  |       |       |      | DTC124EE TL        | G3070109  |       | 1-   | B    | b2       |
| Q 3036 | TRANSISTOR  |       |       |      | EMD2 T2R           | G3070312  |       | 1-   | B    | b1       |
| Q 3037 | TRANSISTOR  |       |       |      | DTC144EE TL        | G3070075  |       | 1-   | B    | a1       |
| Q 3038 | TRANSISTOR  |       |       |      | DTC144EE TL        | G3070075  |       | 1-   | B    | a2       |
| Q 3039 | TRANSISTOR  |       |       |      | EMD2 T2R           | G3070312  |       | 1-   | B    | b1       |
| Q 3040 | TRANSISTOR  |       |       |      | EMD2 T2R           | G3070312  |       | 1-   | B    | b1       |
| R 3001 | CHIP RES.   | 47    | 1/16W | 5%   | RMC1/16S 470JTH    | J24189009 |       | 1-   | A    | A1       |
| R 3002 | CHIP RES.   | 47    | 1/16W | 5%   | RMC1/16S 470JTH    | J24189009 |       | 1-   | A    | C1       |
| R 3003 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH    | J24189013 |       | 1-   | A    | C3       |
| R 3004 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH    | J24189037 |       | 1-   | B    | a2       |
| R 3005 | CHIP RES.   | 15k   | 1/16W | 5%   | RMC1/16S 153JTH    | J24189039 |       | 1-   | B    | a2       |
| R 3006 | CHIP RES.   | 2.2k  | 1/16W | 5%   | RMC1/16S 222JTH    | J24189029 |       | 1-   | B    | a2       |
| R 3007 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH    | J24189013 |       | 1-   | A    | C3       |
| R 3008 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH    | J24189013 |       | 1-   | A    | C3       |
| R 3009 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH    | J24189013 |       | 1-   | A    | C3       |
| R 3010 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH    | J24189013 |       | 1-   | A    | C3       |
| R 3011 | CHIP RES.   | 1k    | 1/16W | 5%   | RMC1/16S 102JTH    | J24189025 |       | 1-   | A    | C2       |
| R 3012 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH    | J24189013 |       | 1-   | A    | B3       |
| R 3013 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH    | J24189013 |       | 1-   | A    | B3       |
| R 3014 | CHIP RES.   | 12    | 1/4W  | 5%   | RMC1/4 120JATP     | J24245120 |       | 1-   | A    | C2       |
| R 3015 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH    | J24189037 |       | 1-   | A    | C2       |
| R 3016 | CHIP RES.   | 47    | 1/16W | 5%   | RMC1/16S 470JTH    | J24189009 |       | 1-   | A    | C3       |
| R 3017 | CHIP RES.   | 120   | 1/16W | 5%   | RMC1/16S 121JTH    | J24189014 |       | 1-   | A    | C3       |
| R 3018 | CHIP RES.   | 220   | 1/16W | 5%   | RMC1/16S 221JTH    | J24189017 |       | 1-   | A    | C3       |
| R 3019 | CHIP RES.   | 560k  | 1/16W | 5%   | RMC1/16S 564JTH    | J24189058 |       | 1-   | B    | a1       |
| R 3020 | CHIP RES.   | 18    | 1/16W | 5%   | RMC1/16S 180JTH    | J24189004 |       | 1-   | A    | C3       |
| R 3021 | CHIP RES.   | 150k  | 1/16W | 5%   | RMC1/16S 154JTH    | J24189051 |       | 1-   | B    | a2       |
| R 3022 | CHIP RES.   | 680   | 1/16W | 5%   | RMC1/16S 681JTH    | J24189023 |       | 1-   | B    | a1       |
| R 3023 | CHIP RES.   | 47k   | 1/16W | 5%   | RMC1/16S 473JTH    | J24189045 |       | 1-   | B    | a2       |
| R 3024 | CHIP RES.   | 47k   | 1/16W | 5%   | RMC1/16S 473JTH    | J24189045 |       | 1-   | B    | a2       |
| R 3025 | CHIP RES.   | 68k   | 1/16W | 5%   | RMC1/16S 683JTH    | J24189047 |       | 1-   | B    | a2       |
| R 3026 | CHIP RES.   | 47k   | 1/16W | 5%   | RMC1/16S 473JTH    | J24189045 |       | 1-   | B    | a2       |
| R 3027 | CHIP RES.   | 390k  | 1/16W | 5%   | RMC1/16S 394JTH    | J24189056 |       | 1-   | B    | a2       |
| R 3028 | CHIP RES.   | 0     | 1/16W | 5%   | RMC1/16S JPTH      | J24189070 |       | 1-   | B    | a2       |
| R 3030 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH    | J24189037 |       | 1-   | B    | a2       |
| R 3031 | CHIP RES.   | 5.6k  | 1/16W | 5%   | RMC1/16S 562JTH    | J24189034 |       | 1-   | B    | a4       |
| R 3032 | CHIP RES.   | 47k   | 1/16W | 5%   | RMC1/16S 473JTH    | J24189045 |       | 1-   | B    | a4       |
| R 3033 | CHIP RES.   | 390k  | 1/16W | 5%   | RMC1/16S 394JTH    | J24189056 |       | 1-   | B    | a4       |
| R 3034 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH    | J24189037 |       | 1-   | B    | a4       |
| R 3035 | CHIP RES.   | 2.2k  | 1/16W | 5%   | RMC1/16S 222JTH    | J24189029 |       | 1-   | B    | a3       |
| R 3036 | CHIP RES.   | 470   | 1/16W | 5%   | RMC1/16S 471JTH    | J24189021 |       | 1-   | B    | a4       |
| R 3037 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH    | J24189049 |       | 1-   | B    | a4       |
| R 3038 | CHIP RES.   | 47k   | 1/16W | 5%   | RMC1/16S 473JTH    | J24189045 |       | 1-   | B    | c4       |
| R 3039 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH    | J24189013 |       | 1-   | B    | c4       |
| R 3040 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH    | J24189013 |       | 1-   | B    | c4       |
| R 3041 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH    | J24189037 |       | 1-   | B    | a1       |
| R 3042 | CHIP RES.   | 390k  | 1/16W | 5%   | RMC1/16S 394JTH    | J24189056 |       | 1-   | B    | a2       |
| R 3043 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH    | J24189037 |       | 1-   | B    | a1       |
| R 3044 | CHIP RES.   | 68k   | 1/16W | 5%   | RMC1/16S 683JTH    | J24189047 |       | 1-   | B    | a2       |
| R 3045 | CHIP RES.   | 47k   | 1/16W | 5%   | RMC1/16S 473JTH    | J24189045 |       | 1-   | B    | a2       |
| R 3046 | CHIP RES.   | 390k  | 1/16W | 5%   | RMC1/16S 394JTH    | J24189056 |       | 1-   | B    | a2       |
| R 3047 | CHIP RES.   | 390k  | 1/16W | 5%   | RMC1/16S 394JTH    | J24189056 |       | 1-   | B    | a4       |
| R 3048 | CHIP RES.   | 3.3k  | 1/16W | 5%   | RMC1/16S 332JTH    | J24189031 |       | 1-   | B    | b4       |
| R 3049 | CHIP RES.   | 47k   | 1/16W | 5%   | RMC1/16S 473JTH    | J24189045 |       | 1-   | B    | a4       |
| R 3050 | CHIP RES.   | 180k  | 1/16W | 5%   | RMC1/16S 184JTH    | J24189052 |       | 1-   | B    | a4       |
| R 3051 | CHIP RES.   | 390k  | 1/16W | 5%   | RMC1/16S 394JTH    | J24189056 |       | 1-   | B    | a4       |
| R 3052 | CHIP RES.   | 5.6k  | 1/16W | 5%   | RMC1/16S 562JTH    | J24189034 |       | 1-   | B    | a4       |

| REF.   | DESCRIPTION | VALUE | V/W   | TOL. | MFR'S DESIG     | VXSTD P/N | VERS. | LOT. | SIDE | LAY ADR. |
|--------|-------------|-------|-------|------|-----------------|-----------|-------|------|------|----------|
| R 3053 | CHIP RES.   | 5.6k  | 1/16W | 5%   | RMC1/16S 562JTH | J24189034 |       | 1-   | B    | a4       |
| R 3054 | CHIP RES.   | 47k   | 1/16W | 5%   | RMC1/16S 473JTH | J24189045 |       | 1-   | B    | a4       |
| R 3055 | CHIP RES.   | 33k   | 1/16W | 5%   | RMC1/16S 333JTH | J24189043 |       | 1-   | B    | a4       |
| R 3056 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH | J24189013 |       | 1-   | B    | c4       |
| R 3057 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH | J24189013 |       | 1-   | B    | c4       |
| R 3058 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH | J24189013 |       | 1-   | B    | b4       |
| R 3059 | CHIP RES.   | 270k  | 1/16W | 0.5% | MCR01MZPD2703   | J24189329 |       | 1-   | B    | a4       |
| R 3060 | CHIP RES.   | 390k  | 1/16W | 0.5% | MCR01MZPD3903   | J24189331 |       | 1-   | B    | c4       |
| R 3061 | CHIP RES.   | 470k  | 1/16W | 0.5% | MCR01MZPD4703   | J24189332 |       | 1-   | B    | c4       |
| R 3062 | CHIP RES.   | 330k  | 1/16W | 0.5% | MCR01MZPD3303   | J24189330 |       | 1-   | B    | c4       |
| R 3063 | CHIP RES.   | 270k  | 1/16W | 0.5% | MCR01MZPD2703   | J24189329 |       | 1-   | B    | b4       |
| R 3064 | CHIP RES.   | 100k  | 1/16W | 0.5% | MCR01MZPD1003   | J24189386 |       | 1-   | B    | a4       |
| R 3065 | CHIP RES.   | 390k  | 1/16W | 5%   | RMC1/16S 394JTH | J24189056 |       | 1-   | B    | a2       |
| R 3066 | CHIP RES.   | 12k   | 1/16W | 5%   | RMC1/16S 123JTH | J24189038 |       | 1-   | B    | a2       |
| R 3067 | CHIP RES.   | 47k   | 1/16W | 5%   | RMC1/16S 473JTH | J24189045 |       | 1-   | B    | a1       |
| R 3068 | CHIP RES.   | 47k   | 1/16W | 5%   | RMC1/16S 473JTH | J24189045 |       | 1-   | B    | a1       |
| R 3069 | CHIP RES.   | 47k   | 1/16W | 5%   | RMC1/16S 473JTH | J24189045 |       | 1-   | B    | a2       |
| R 3070 | CHIP RES.   | 33k   | 1/16W | 5%   | RMC1/16S 333JTH | J24189043 |       | 1-   | B    | a2       |
| R 3071 | CHIP RES.   | 4.7k  | 1/16W | 5%   | RMC1/16S 472JTH | J24189033 |       | 1-   | B    | a4       |
| R 3072 | CHIP RES.   | 2.2k  | 1/16W | 5%   | RMC1/16S 222JTH | J24189029 |       | 1-   | B    | a4       |
| R 3073 | CHIP RES.   | 4.7k  | 1/16W | 5%   | RMC1/16S 472JTH | J24189033 |       | 1-   | B    | a4       |
| R 3074 | CHIP RES.   | 470k  | 1/16W | 5%   | RMC1/16S 474JTH | J24189057 |       | 1-   | B    | a4       |
| R 3075 | CHIP RES.   | 220k  | 1/16W | 5%   | RMC1/16S 224JTH | J24189053 |       | 1-   | B    | b1       |
| R 3076 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |       | 1-   | B    | b2       |
| R 3077 | CHIP RES.   | 330k  | 1/16W | 0.5% | MCR01MZPD3303   | J24189330 |       | 1-   | B    | c4       |
| R 3078 | CHIP RES.   | 330k  | 1/16W | 0.5% | MCR01MZPD3303   | J24189330 |       | 1-   | B    | c4       |
| R 3079 | CHIP RES.   | 220k  | 1/16W | 0.5% | MCR01MZPD2203   | J24189389 |       | 1-   | B    | c4       |
| R 3080 | CHIP RES.   | 470k  | 1/16W | 0.5% | MCR01MZPD4703   | J24189332 |       | 1-   | B    | c4       |
| R 3081 | CHIP RES.   | 22k   | 1/16W | 5%   | RMC1/16S 223JTH | J24189041 |       | 1-   | B    | c4       |
| R 3082 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | B    | b4       |
| R 3083 | CHIP RES.   | 47k   | 1/16W | 5%   | RMC1/16S 473JTH | J24189045 |       | 1-   | B    | a2       |
| R 3084 | CHIP RES.   | 1M    | 1/16W | 1%   | MCR01MZSF1004   | J24189333 |       | 1-   | B    | b4       |
| R 3085 | CHIP RES.   | 3.3M  | 1/16W | 5%   | RMC1/16S 335JTH | J24189324 |       | 1-   | B    | b4       |
| R 3086 | CHIP RES.   | 150k  | 1/16W | 0.5% | MCR01MZPD1503   | J24189328 |       | 1-   | B    | b4       |
| R 3087 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | B    | a2       |
| R 3088 | CHIP RES.   | 47k   | 1/16W | 5%   | RMC1/16S 473JTH | J24189045 |       | 1-   | B    | a2       |
| R 3089 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | B    | a2       |
| R 3090 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | B    | a4       |
| R 3091 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | B    | a4       |
| R 3092 | CHIP RES.   | 4.7k  | 1/16W | 5%   | RMC1/16S 472JTH | J24189033 |       | 1-   | B    | a4       |
| R 3093 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | B    | b2       |
| R 3094 | CHIP RES.   | 15k   | 1/16W | 5%   | RMC1/16S 153JTH | J24189039 |       | 1-   | B    | c1       |
| R 3095 | CHIP RES.   | 390k  | 1/16W | 5%   | RMC1/16S 394JTH | J24189056 |       | 1-   | B    | c2       |
| R 3096 | CHIP RES.   | 4.7   | 1/16W | 5%   | RMC1/16S 4R7JTH | J24189066 |       | 1-   | B    | b4       |
| R 3097 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |       | 1-   | A    | A3       |
| R 3098 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | B    | a4       |
| R 3099 | CHIP RES.   | 150k  | 1/16W | 5%   | RMC1/16S 154JTH | J24189051 |       | 1-   | B    | a4       |
| R 3100 | CHIP RES.   | 150k  | 1/16W | 5%   | RMC1/16S 154JTH | J24189051 |       | 1-   | B    | a4       |
| R 3101 | CHIP RES.   | 22k   | 1/16W | 5%   | RMC1/16S 223JTH | J24189041 |       | 1-   | B    | c1       |
| R 3102 | CHIP RES.   | 22k   | 1/16W | 5%   | RMC1/16S 223JTH | J24189041 |       | 1-   | B    | c1       |
| R 3103 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH | J24189013 |       | 1-   | A    | A3       |
| R 3104 | CHIP RES.   | 2.2   | 1/16W | 5%   | RMC1/16 2R2JATP | J24185229 |       | 1-   | B    | b4       |
| R 3105 | CHIP RES.   | 4.7k  | 1/16W | 5%   | RMC1/16S 472JTH | J24189033 |       | 1-   | A    | B2       |
| R 3106 | CHIP RES.   | 2.7k  | 1/16W | 5%   | RMC1/16S 272JTH | J24189030 |       | 1-   | B    | b1       |
| R 3107 | CHIP RES.   | 150k  | 1/16W | 5%   | RMC1/16S 154JTH | J24189051 |       | 1-   | B    | c1       |
| R 3108 | CHIP RES.   | 82k   | 1/16W | 5%   | RMC1/16S 823JTH | J24189048 |       | 1-   | B    | c1       |
| R 3109 | CHIP RES.   | 2.2k  | 1/16W | 5%   | RMC1/16S 222JTH | J24189029 |       | 1-   | B    | c1       |
| R 3110 | CHIP RES.   | 390k  | 1/16W | 0.5% | MCR01MZPD3903   | J24189331 |       | 1-   | B    | a1       |
| R 3111 | CHIP RES.   | 10k   | 1/16W | 0.5% | MCR01MZPD1002   | J24189374 |       | 1-   | B    | a1       |
| R 3112 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |       | 1-   | B    | b1       |
| R 3113 | CHIP RES.   | 68k   | 1/16W | 0.5% | MCR01MZPD6802   | J24189384 |       | 1-   | B    | a1       |
| R 3114 | CHIP RES.   | 1k    | 1/16W | 5%   | RMC1/16S 102JTH | J24189025 |       | 1-   | A    | A2       |

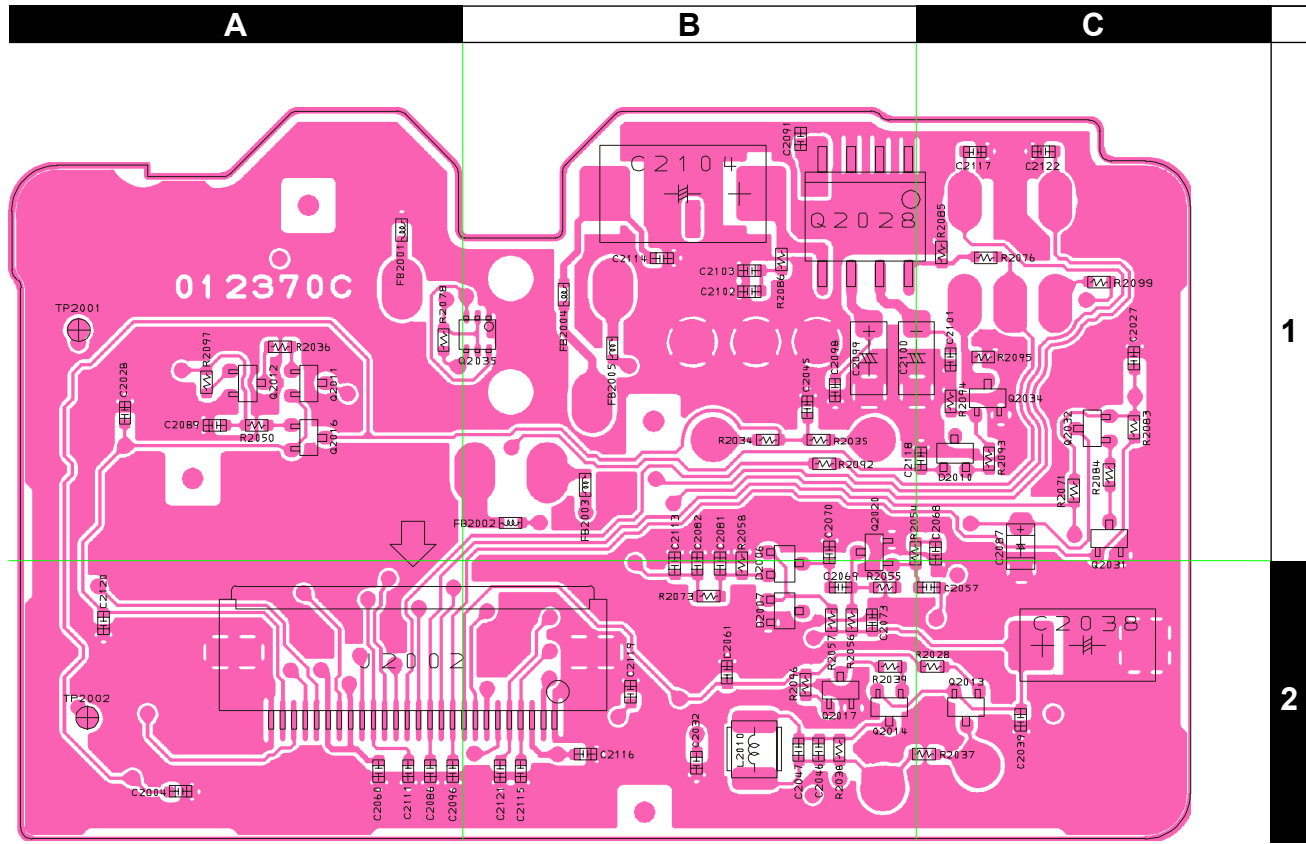
# CNTL Unit

| REF.   | DESCRIPTION     | VALUE       | V/W   | TOL. | MFR'S DESIG         | VXSTD P/N | VERS. | LOT. | SIDE | LAY ADR. |
|--------|-----------------|-------------|-------|------|---------------------|-----------|-------|------|------|----------|
| R 3115 | CHIP RES.       | 100k        | 1/16W | 5%   | RMC1/16S 104JTH     | J24189049 |       | 1-   | A    | A2       |
| R 3116 | CHIP RES.       | 33k         | 1/16W | 5%   | RMC1/16S 333JTH     | J24189043 |       | 1-   | A    | A2       |
| R 3117 | CHIP RES.       | 47k         | 1/16W | 5%   | RMC1/16S 473JTH     | J24189045 |       | 1-   | A    | B2       |
| R 3118 | CHIP RES.       | 1k          | 1/16W | 5%   | RMC1/16S 102JTH     | J24189025 |       | 1-   | A    | A2       |
| R 3119 | CHIP RES.       | 1k          | 1/16W | 5%   | RMC1/16S 102JTH     | J24189025 |       | 1-   | A    | A2       |
| R 3120 | CHIP RES.       | 47k         | 1/16W | 5%   | RMC1/16S 473JTH     | J24189045 |       | 1-   | A    | A1       |
| R 3121 | CHIP RES.       | 10k         | 1/16W | 5%   | RMC1/16S 103JTH     | J24189037 |       | 1-   | A    | A1       |
| R 3122 | CHIP RES.       | 22k         | 1/16W | 5%   | RMC1/16S 223JTH     | J24189041 |       | 1-   | A    | B1       |
| R 3123 | CHIP RES.       | 22k         | 1/16W | 5%   | RMC1/16S 223JTH     | J24189041 |       | 1-   | A    | B1       |
| R 3124 | CHIP RES.       | 1k          | 1/16W | 5%   | RMC1/16S 102JTH     | J24189025 |       | 1-   | A    | A1       |
| R 3125 | CHIP RES.       | 1k          | 1/16W | 5%   | RMC1/16S 102JTH     | J24189025 |       | 1-   | A    | A1       |
| R 3126 | CHIP RES.       | 1M          | 1/16W | 5%   | RMC1/16S 105JTH     | J24189061 |       | 1-   | B    | a1       |
| R 3127 | CHIP RES.       | 1M          | 1/16W | 5%   | RMC1/16S 105JTH     | J24189061 |       | 1-   | B    | c3       |
| R 3128 | CHIP RES.       | 100k        | 1/16W | 5%   | RMC1/16S 104JTH     | J24189049 |       | 1-   | B    | c2       |
| R 3129 | CHIP RES.       | 4.7         | 1/2W  | 5%   | RMC1/2 4R7JCTP      | J24275479 |       | 1-   | B    | c2       |
| R 3130 | CHIP RES.       | 4.7k        | 1/16W | 5%   | RMC1/16S 472JTH     | J24189033 |       | 1-   | B    | c1       |
| R 3131 | CHIP RES.       | 4.7k        | 1/16W | 5%   | RMC1/16S 472JTH     | J24189033 |       | 1-   | B    | c1       |
| R 3132 | CHIP RES.       | 10k         | 1/16W | 5%   | RMC1/16S 103JTH     | J24189037 |       | 1-   | B    | a1       |
| R 3133 | CHIP RES.       | 22k         | 1/16W | 5%   | RMC1/16S 223JTH     | J24189041 |       | 1-   | B    | b3       |
| R 3134 | CHIP RES.       | 22k         | 1/16W | 5%   | RMC1/16S 223JTH     | J24189041 |       | 1-   | B    | b3       |
| R 3135 | CHIP RES.       | 0           | 1/16W | 5%   | RMC1/16 000JATP     | J24185000 |       | 1-   | B    | c2       |
| R 3136 | CHIP RES.       | 22k         | 1/16W | 5%   | RMC1/16S 223JTH     | J24189041 |       | 1-   | B    | b2       |
| R 3137 | CHIP RES.       | 22k         | 1/16W | 5%   | RMC1/16S 223JTH     | J24189041 |       | 1-   | B    | b2       |
| R 3138 | CHIP RES.       | 22k         | 1/16W | 5%   | RMC1/16S 223JTH     | J24189041 |       | 1-   | B    | b2       |
| R 3139 | CHIP RES.       | 47k         | 1/16W | 5%   | RMC1/16S 473JTH     | J24189045 |       | 1-   | A    | B2       |
| R 3140 | CHIP RES.       | 0           | 1/16W | 5%   | RMC1/16S JPTH       | J24189070 |       | 1-   | B    | c3       |
| R 3141 | CHIP RES.       | 0           | 1/16W | 5%   | RMC1/16S JPTH       | J24189070 |       | 1-   | B    | b1       |
| RB3001 | BLOCK RES.      |             |       |      | MNR04M0ABJ102       | J42900039 |       | 1-   | A    | A2       |
| RB3002 | BLOCK RES.      |             |       |      | MNR04M0ABJ102       | J42900039 |       | 1-   | A    | A2       |
| RB3003 | BLOCK RES.      |             |       |      | MNR04M0ABJ102       | J42900039 |       | 1-   | A    | B2       |
| RB3004 | BLOCK RES.      |             |       |      | MNR04M0ABJ102       | J42900039 |       | 1-   | A    | B2       |
| RB3005 | BLOCK RES.      |             |       |      | MNR04M0ABJ102       | J42900039 |       | 1-   | A    | B1       |
| RB3006 | BLOCK RES.      |             |       |      | MNR04M0ABJ102       | J42900039 |       | 1-   | A    | B1       |
| RB3007 | BLOCK RES.      |             |       |      | MNR04M0ABJ102       | J42900039 |       | 1-   | A    | A1       |
| RB3008 | BLOCK RES.      |             |       |      | MNR04M0ABJ102       | J42900039 |       | 1-   | A    | A1       |
| RB3009 | BLOCK RES.      |             |       |      | MNR04M0ABJ102       | J42900039 |       | 1-   | A    | A1       |
| TH3001 | THERMISTOR      |             |       |      | ERTJ1VV473J         | G9090122  |       | 1-   | A    | B2       |
| X 3001 | XTAL VT-200     |             |       |      | 32.768KHZ 20PPM/6PF | H0103267  |       | 1-   | A    | A2       |
| X 3002 | XTAL XPFEGC     | 3.579545MHZ |       |      | 3.579545MHZ         | H0103304  |       | 1-   | B    | a1       |
|        | LIGHT GUIDE     |             |       |      | (LCD)               | RA0646600 |       | 1-   |      |          |
|        | REFLECTOR SHEET |             |       |      |                     | RA0646700 |       | 1-   |      |          |
|        | INTER CONNECTOR |             |       |      |                     | RA0646800 |       | 1-   |      |          |

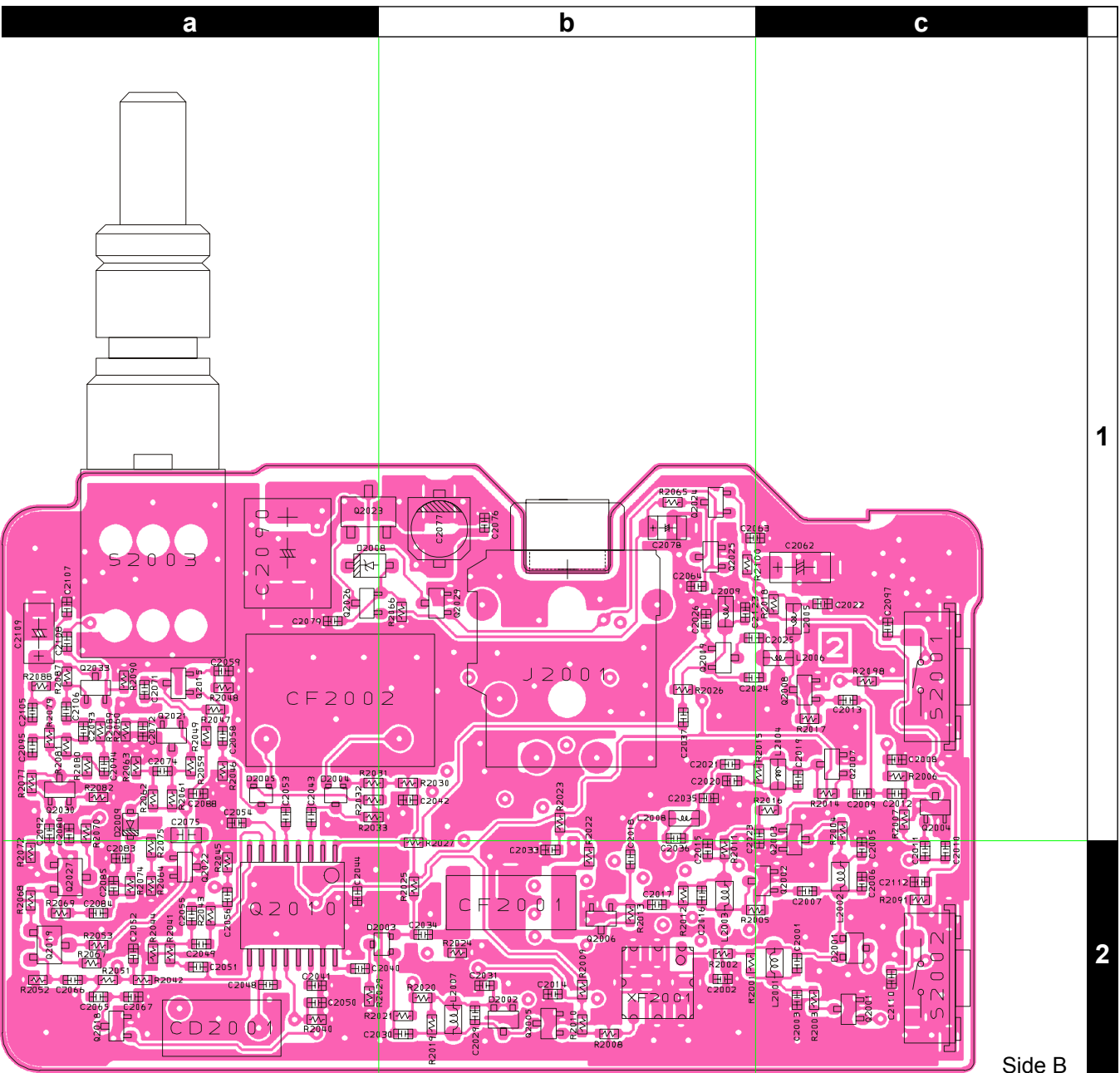


AF Unit (Lot. 1~2)

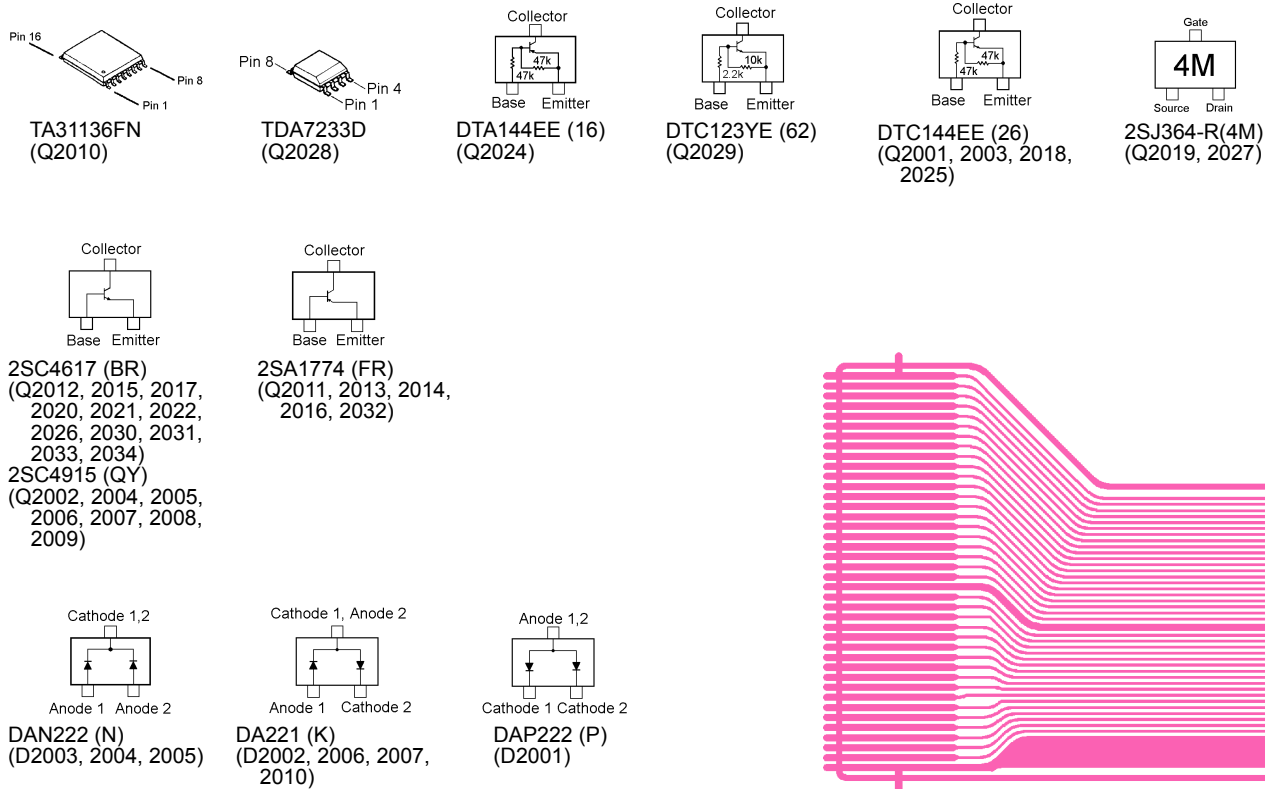
Parts Layout

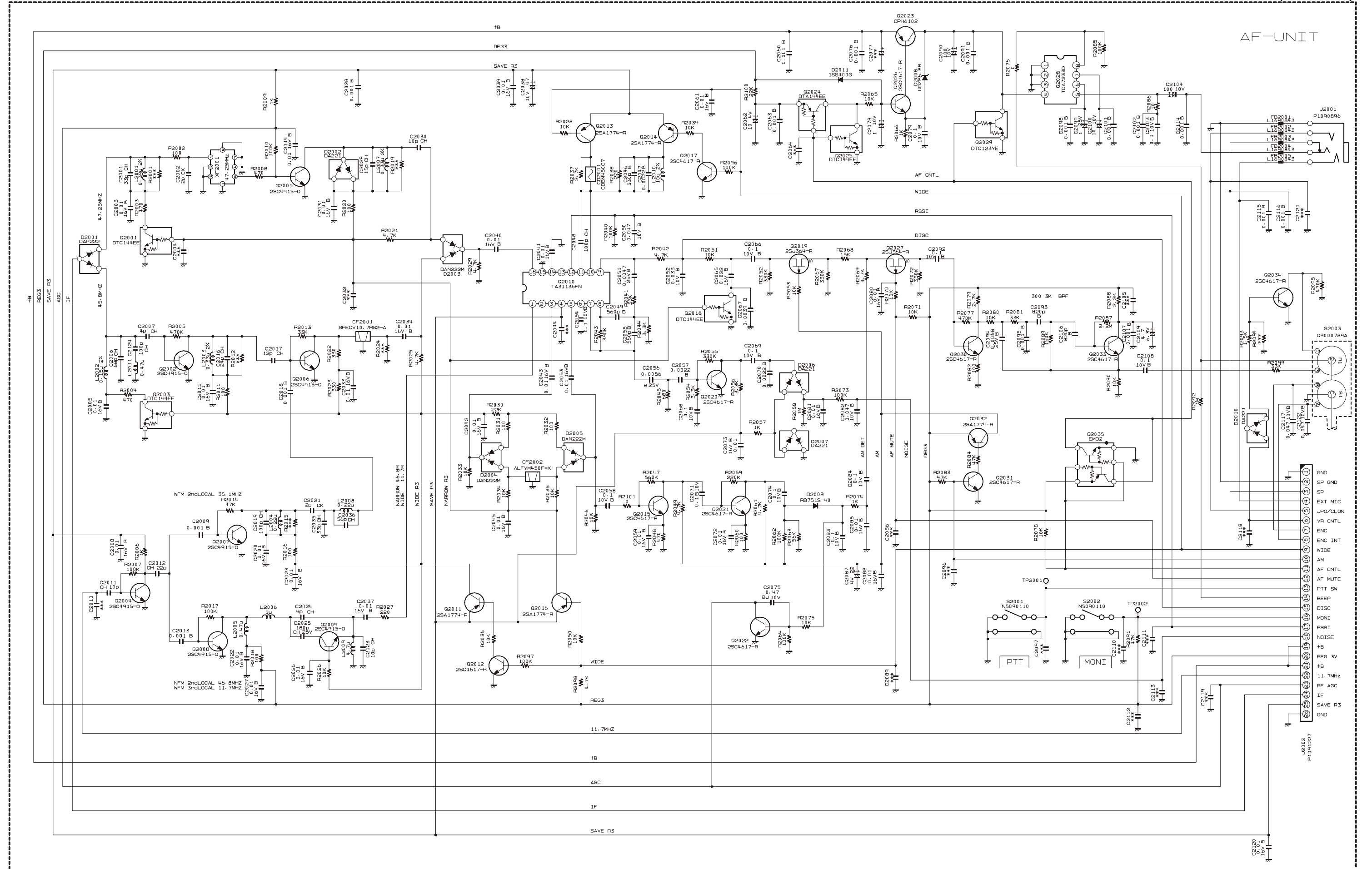


Side A



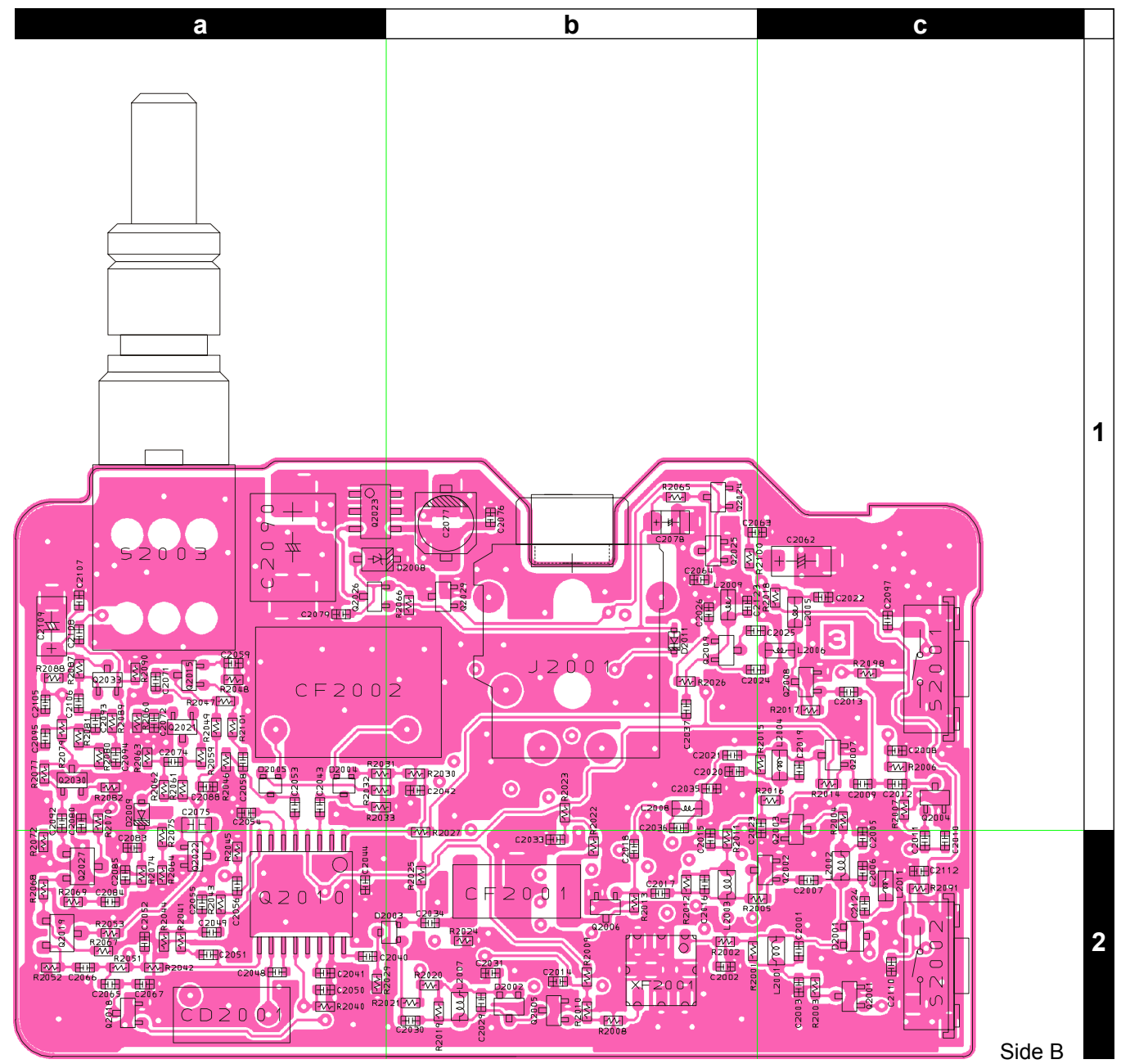
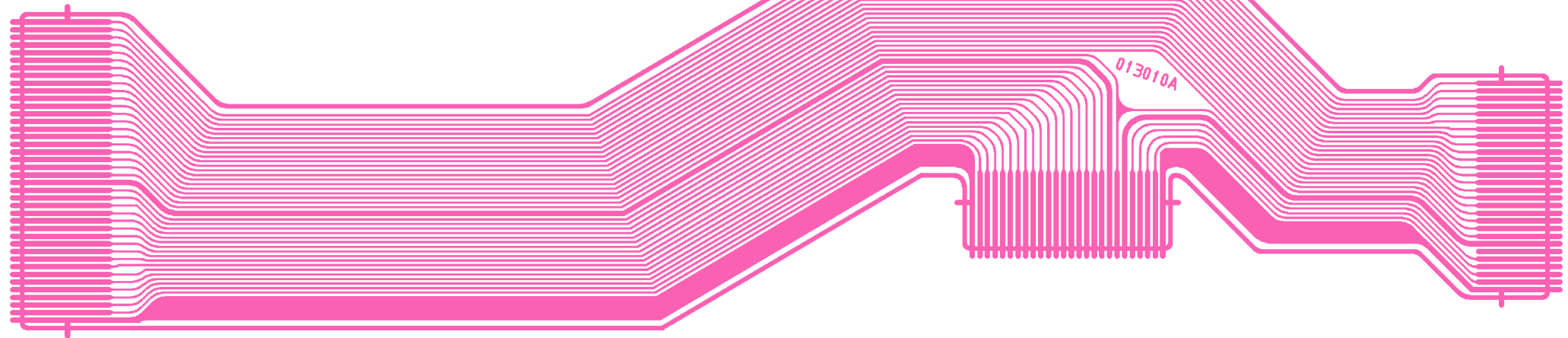
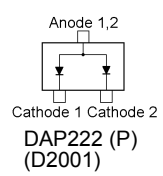
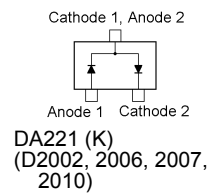
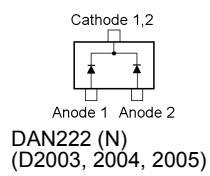
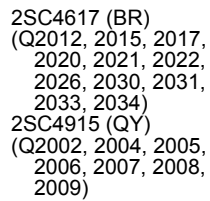
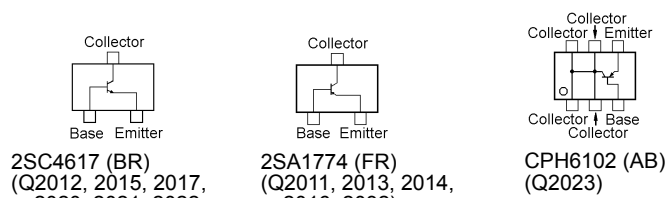
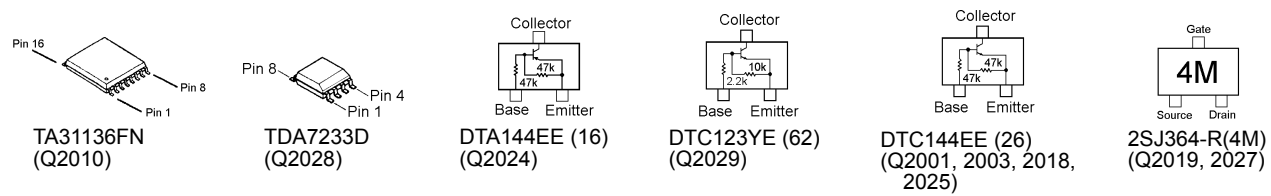
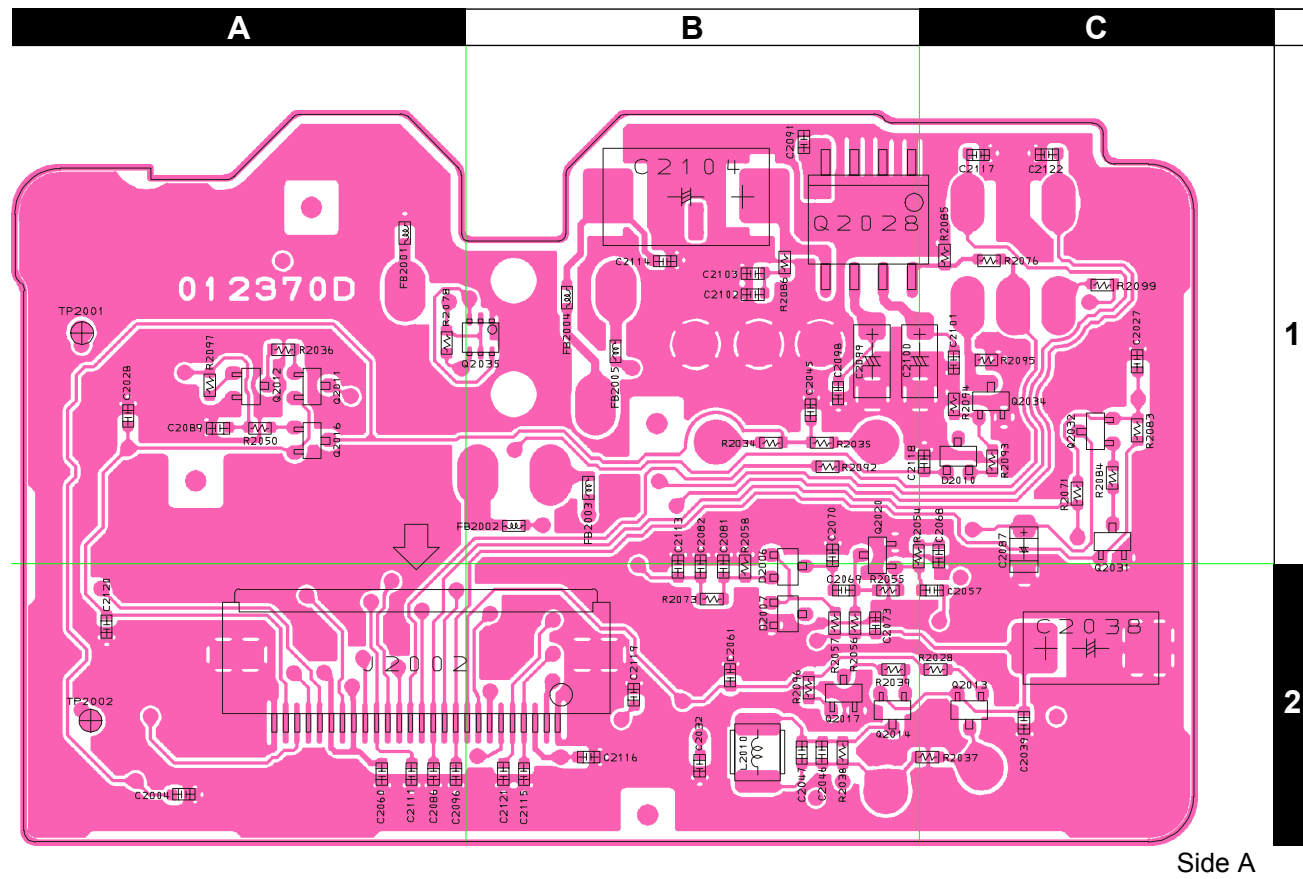
Side B





*AF Unit (Lot. 3~)*

## Parts Layout



## Parts List

| REF.                  | DESCRIPTION  | VALUE    | V/W | TOL. | MFR'S DESIG     | VXSTD P/N | VERS. | LOT. | SIDE | LAY ADR. |
|-----------------------|--------------|----------|-----|------|-----------------|-----------|-------|------|------|----------|
| *** AF UNIT ***       |              |          |     |      |                 |           |       |      |      |          |
| PCB with Components   |              |          |     |      |                 | CB2943001 |       |      |      |          |
| Printed Circuit Board |              |          |     |      |                 | FR012370C |       | 1-   |      |          |
|                       |              |          |     |      |                 | FR012370D |       | 3-   |      |          |
| C 2001                | CHIP CAP.    | 33pF     | 50V | CH   | GRM36CH330J50PT | K22178224 |       | 1-   | B    | c2       |
| C 2002                | CHIP CAP.    | 2pF      | 50V | CK   | GRM36CK020C50PT | K22178204 |       | 1-   | B    | b2       |
| C 2003                | CHIP CAP.    | 0.01uF   | 16V | B    | GRM36B103K16PT  | K22128804 |       | 1-   | B    | c2       |
| C 2005                | CHIP CAP.    | 0.01uF   | 16V | B    | GRM36B103K16PT  | K22128804 |       | 1-   | B    | c2       |
| C 2006                | CHIP CAP.    | 68pF     | 50V | CH   | GRM36CH680J50PT | K22178232 |       | 1-   | B    | c2       |
| C 2007                | CHIP CAP.    | 4pF      | 50V | CH   | GRM36CH040C50PT | K22178206 |       | 1-   | B    | c2       |
| C 2008                | CHIP CAP.    | 0.01uF   | 16V | B    | GRM36B103K16PT  | K22128804 |       | 1-   | B    | c1       |
| C 2009                | CHIP CAP.    | 0.001uF  | 50V | B    | GRM36B102K50PT  | K22178809 |       | 1-   | B    | c1       |
| C 2010                | CHIP CAP.    | 5pF      | 50V | CH   | UMK105CH050CW-F | K22178253 |       | 1-   | B    | c2       |
| C 2011                | CHIP CAP.    | 10pF     | 50V | CH   | UMK105CH100DW-F | K22178258 |       | 1-   | B    | c2       |
| C 2012                | CHIP CAP.    | 22pF     | 50V | CH   | GRM36CH220J50PT | K22178220 |       | 1-   | B    | c1       |
| C 2013                | CHIP CAP.    | 0.001uF  | 50V | B    | GRM36B102K50PT  | K22178809 |       | 1-   | B    | c1       |
| C 2014                | CHIP CAP.    | 0.01uF   | 16V | B    | GRM36B103K16PT  | K22128804 |       | 1-   | B    | b2       |
| C 2015                | CHIP CAP.    | 0.01uF   | 16V | B    | GRM36B103K16PT  | K22128804 |       | 1-   | B    | b2       |
| C 2016                | CHIP CAP.    | 24pF     | 50V | CH   | GRM36CH240J50PT | K22178221 |       | 1-   | B    | b2       |
| C 2017                | CHIP CAP.    | 12pF     | 50V | CH   | GRM36CH120J50PT | K22178214 |       | 1-   | B    | b2       |
| C 2018                | CHIP CAP.    | 0.001uF  | 50V | B    | GRM36B102K50PT  | K22178809 |       | 1-   | B    | b2       |
| C 2019                | CHIP CAP.    | 100pF    | 50V | CH   | GRM36CH101J50PT | K22178236 |       | 1-   | B    | c1       |
| C 2020                | CHIP CAP.    | 0.01uF   | 16V | B    | GRM36B103K16PT  | K22128804 |       | 1-   | B    | b1       |
| C 2021                | CHIP CAP.    | 2pF      | 50V | CK   | GRM36CK020C50PT | K22178204 |       | 1-   | B    | b1       |
| C 2022                | CHIP CAP.    | 0.01uF   | 16V | B    | GRM36B103K16PT  | K22128804 |       | 1-   | B    | c1       |
| C 2023                | CHIP CAP.    | 0.01uF   | 16V | B    | GRM36B103K16PT  | K22128804 |       | 1-   | B    | c1       |
| C 2024                | CHIP CAP.    | 4pF      | 50V | CH   | GRM36CH040C50PT | K22178206 |       | 1-   | B    | b1       |
| C 2025                | CHIP CAP.    | 180pF    | 25V | CH   | TMK105CH181JW-F | K22148244 |       | 1-   | B    | b1       |
| C 2026                | CHIP CAP.    | 0.01uF   | 16V | B    | GRM36B103K16PT  | K22128804 |       | 1-   | B    | b1       |
| C 2027                | CHIP CAP.    | 0.01uF   | 16V | B    | GRM36B103K16PT  | K22128804 |       | 1-   | A    | C1       |
| C 2028                | CHIP CAP.    | 0.001uF  | 50V | B    | GRM36B102K50PT  | K22178809 |       | 1-   | A    | A1       |
| C 2029                | CHIP CAP.    | 15pF     | 50V | CH   | GRM36CH150J50PT | K22178216 |       | 1-   | B    | b2       |
| C 2030                | CHIP CAP.    | 10pF     | 50V | CH   | UMK105CH100DW-F | K22178258 |       | 1-   | B    | b2       |
| C 2031                | CHIP CAP.    | 0.01uF   | 16V | B    | GRM36B103K16PT  | K22128804 |       | 1-   | B    | b2       |
| C 2033                | CHIP CAP.    | 0.01uF   | 16V | B    | GRM36B103K16PT  | K22128804 |       | 1-   | B    | b2       |
| C 2034                | CHIP CAP.    | 0.01uF   | 16V | B    | GRM36B103K16PT  | K22128804 |       | 1-   | B    | b2       |
| C 2035                | CHIP CAP.    | 33pF     | 50V | CH   | GRM36CH330J50PT | K22178224 |       | 1-   | B    | b1       |
| C 2036                | CHIP CAP.    | 56pF     | 50V | CH   | GRM36CH560J50PT | K22178230 |       | 1-   | B    | b1       |
| C 2037                | CHIP CAP.    | 0.01uF   | 16V | B    | GRM36B103K16PT  | K22128804 |       | 1-   | B    | b1       |
| C 2038                | CHIP TA.CAP. | 47uF     | 10V |      | TEMSVC1A476M12R | K78100024 |       | 1-   | A    | C2       |
| C 2039                | CHIP CAP.    | 0.01uF   | 16V | B    | GRM36B103K16PT  | K22128804 |       | 1-   | A    | C2       |
| C 2040                | CHIP CAP.    | 0.01uF   | 16V | B    | GRM36B103K16PT  | K22128804 |       | 1-   | B    | a2       |
| C 2041                | CHIP CAP.    | 0.01uF   | 16V | B    | GRM36B103K16PT  | K22128804 |       | 1-   | B    | a2       |
| C 2042                | CHIP CAP.    | 0.01uF   | 16V | B    | GRM36B103K16PT  | K22128804 |       | 1-   | B    | b1       |
| C 2043                | CHIP CAP.    | 0.01uF   | 16V | B    | GRM36B103K16PT  | K22128804 |       | 1-   | B    | a1       |
| C 2045                | CHIP CAP.    | 0.01uF   | 16V | B    | GRM36B103K16PT  | K22128804 |       | 1-   | A    | B1       |
| C 2046                | CHIP CAP.    | 330pF    | 50V | B    | UMK105B331KW-F  | K22178823 |       | 1-   | A    | B2       |
| C 2047                | CHIP CAP.    | 0.0022uF | 50V | B    | GRM36B222K50PT  | K22178813 |       | 1-   | A    | B2       |
| C 2048                | CHIP CAP.    | 100pF    | 50V | CH   | GRM36CH101J50PT | K22178236 |       | 1-   | B    | a2       |
| C 2049                | CHIP CAP.    | 560pF    | 50V | B    | UMK105B561KW-F  | K22178826 |       | 1-   | B    | a2       |
| C 2050                | CHIP CAP.    | 0.047uF  | 10V | B    | GRM36B473K10PT  | K22108801 |       | 1-   | B    | a2       |
| C 2051                | CHIP CAP.    | 0.0047uF | 25V | B    | GRM36B472K25PT  | K22148830 |       | 1-   | B    | a2       |
| C 2052                | CHIP CAP.    | 0.033uF  | 10V | B    | GRM36B333K10PT  | K22108803 |       | 1-   | B    | a2       |
| C 2053                | CHIP CAP.    | 0.01uF   | 16V | B    | GRM36B103K16PT  | K22128804 |       | 1-   | B    | a1       |
| C 2054                | CHIP CAP.    | 0.1uF    | 10V | B    | GRM36B104K10PT  | K22108802 |       | 1-   | B    | a1       |
| C 2055                | CHIP CAP.    | 560pF    | 50V | B    | UMK105B561KW-F  | K22178826 |       | 1-   | B    | a2       |
| C 2056                | CHIP CAP.    | 0.0056uF | 25V | B    | GRM36B562K25PT  | K22148802 |       | 1-   | B    | a2       |
| C 2057                | CHIP CAP.    | 0.0022uF | 50V | B    | GRM36B222K50PT  | K22178813 |       | 1-   | A    | C2       |
| C 2058                | CHIP CAP.    | 0.1uF    | 10V | B    | GRM36B104K10PT  | K22108802 |       | 1-   | B    | a1       |
| C 2059                | CHIP CAP.    | 0.01uF   | 16V | B    | GRM36B103K16PT  | K22128804 |       | 1-   | B    | a1       |
| C 2060                | CHIP CAP.    | 0.001uF  | 50V | B    | GRM36B102K50PT  | K22178809 |       | 1-   | A    | A2       |
| C 2061                | CHIP CAP.    | 0.01uF   | 16V | B    | GRM36B103K16PT  | K22128804 |       | 1-   | A    | B2       |

# AF Unit

| REF.   | DESCRIPTION    | VALUE    | V/W  | TOL. | MFR'S DESIG       | VXSTD P/N | VERS. | LOT. | SIDE | LAY ADR. |
|--------|----------------|----------|------|------|-------------------|-----------|-------|------|------|----------|
| C 2062 | CHIP TA.CAP.   | 10uF     | 6.3V |      | TEMSVA0J106M-8R   | K78080027 |       | 1-   | B    | c1       |
| C 2063 | CHIP CAP.      | 0.001uF  | 50V  | B    | GRM36B102K50PT    | K22178809 |       | 1-   | B    | b1       |
| C 2065 | CHIP CAP.      | 0.022uF  | 16V  | B    | EMK105B223KW-F    | K22128813 |       | 1-   | B    | a2       |
| C 2066 | CHIP CAP.      | 0.1uF    | 10V  | B    | GRM36B104K10PT    | K22108802 |       | 1-   | B    | a2       |
| C 2067 | CHIP CAP.      | 0.0039uF | 50V  | B    | UMK105B392KW-F    | K22178836 |       | 1-   | B    | a2       |
| C 2068 | CHIP CAP.      | 0.1uF    | 10V  | B    | GRM36B104K10PT    | K22108802 |       | 1-   | A    | C1       |
| C 2069 | CHIP CAP.      | 0.1uF    | 10V  | B    | GRM36B104K10PT    | K22108802 |       | 1-   | A    | B2       |
| C 2070 | CHIP CAP.      | 0.0022uF | 50V  | B    | GRM36B222K50PT    | K22178813 |       | 1-   | A    | B1       |
| C 2071 | CHIP CAP.      | 0.1uF    | 10V  | B    | GRM36B104K10PT    | K22108802 |       | 1-   | B    | a1       |
| C 2072 | CHIP CAP.      | 0.01uF   | 16V  | B    | GRM36B103K16PT    | K22128804 |       | 1-   | B    | a1       |
| C 2073 | CHIP CAP.      | 0.01uF   | 16V  | B    | GRM36B103K16PT    | K22128804 |       | 1-   | A    | B2       |
| C 2074 | CHIP CAP.      | 0.1uF    | 10V  | B    | GRM36B104K10PT    | K22108802 |       | 1-   | B    | a1       |
| C 2075 | CHIP CAP.      | 0.47uF   | 10V  | BJ   | LMK107BJ474KA-T   | K22104803 |       | 1-   | B    | a1       |
| C 2076 | CHIP CAP.      | 0.001uF  | 50V  | B    | GRM36B102K50PT    | K22178809 |       | 1-   | B    | b1       |
| C 2078 | CHIP TA.CAP.   | 1uF      | 10V  |      | TESVSP1A105M-8R   | K78100032 |       | 1-   | B    | b1       |
| C 2079 | CHIP CAP.      | 0.1uF    | 10V  | B    | GRM36B104K10PT    | K22108802 |       | 1-   | B    | a1       |
| C 2080 | CHIP CAP.      | 0.01uF   | 16V  | B    | GRM36B103K16PT    | K22128804 |       | 1-   | B    | a1       |
| C 2081 | CHIP CAP.      | 0.01uF   | 16V  | B    | GRM36B103K16PT    | K22128804 |       | 1-   | A    | B1       |
| C 2082 | CHIP CAP.      | 0.047uF  | 10V  | B    | GRM36B473K10PT    | K22108801 |       | 1-   | A    | B1       |
| C 2083 | CHIP CAP.      | 0.1uF    | 10V  | B    | GRM36B104K10PT    | K22108802 |       | 1-   | B    | a2       |
| C 2084 | CHIP CAP.      | 0.1uF    | 10V  | B    | GRM36B104K10PT    | K22108802 |       | 1-   | B    | a2       |
| C 2085 | CHIP CAP.      | 0.01uF   | 16V  | B    | GRM36B103K16PT    | K22128804 |       | 1-   | B    | a2       |
| C 2087 | CHIP TA.CAP.   | 22uF     | 4V   |      | TESVSP0G226M-8R   | K78060047 |       | 1-   | A    | C1       |
| C 2088 | CHIP CAP.      | 0.01uF   | 16V  | B    | GRM36B103K16PT    | K22128804 |       | 1-   | B    | a1       |
| C 2090 | CHIP TA.CAP.   | 100uF    | 10V  |      | TEMSVD21A107M12R  | K78100049 |       | 1-   | B    | a1       |
| C 2091 | CHIP CAP.      | 0.001uF  | 50V  | B    | GRM36B102K50PT    | K22178809 |       | 1-   | A    | B1       |
| C 2092 | CHIP CAP.      | 0.1uF    | 10V  | B    | GRM36B104K10PT    | K22108802 |       | 1-   | B    | a1       |
| C 2093 | CHIP CAP.      | 820pF    | 50V  | B    | UMK105B821KW-F    | K22178828 |       | 1-   | B    | a1       |
| C 2094 | CHIP CAP.      | 0.0068uF | 25V  | B    | GRM36B682J25PT    | K22148803 |       | 1-   | B    | a1       |
| C 2095 | CHIP CAP.      | 0.001uF  | 50V  | B    | GRM36B102K50PT    | K22178809 |       | 1-   | B    | a1       |
| C 2098 | CHIP CAP.      | 0.001uF  | 50V  | B    | GRM36B102K50PT    | K22178809 |       | 1-   | A    | B1       |
| C 2099 | CHIP TA.CAP.   | 1uF      | 25V  |      | TEMSVA1E105M-8R   | K78140013 |       | 1-   | A    | B1       |
| C 2100 | CHIP TA.CAP.   | 10uF     | 10V  |      | TEMSVA1A106M-8R   | K78100028 |       | 1-   | A    | B1       |
| C 2101 | CHIP CAP.      | 0.001uF  | 50V  | B    | GRM36B102K50PT    | K22178809 |       | 1-   | A    | C1       |
| C 2102 | CHIP CAP.      | 0.001uF  | 50V  | B    | GRM36B102K50PT    | K22178809 |       | 1-   | A    | B1       |
| C 2103 | CHIP CAP.      | 0.1uF    | 10V  | B    | GRM36B104K10PT    | K22108802 |       | 1-   | A    | B1       |
| C 2104 | CHIP TA.CAP.   | 100uF    | 10V  |      | TEMSVD1A107M12R   | K78100031 |       | 1-   | A    | B1       |
| C 2106 | CHIP CAP.      | 820pF    | 50V  | B    | UMK105B821KW-F    | K22178828 |       | 1-   | B    | a1       |
| C 2107 | CHIP CAP.      | 0.001uF  | 50V  | B    | GRM36B102K50PT    | K22178809 |       | 1-   | B    | a1       |
| C 2108 | CHIP CAP.      | 0.1uF    | 10V  | B    | GRM36B104K10PT    | K22108802 |       | 1-   | B    | a1       |
| C 2109 | CHIP TA.CAP.   | 4.7uF    | 6.3V |      | TMCMA0J475MTR     | K78080026 |       | 1-   | B    | a1       |
| C 2114 | CHIP CAP.      | 0.001uF  | 50V  | B    | GRM36B102K50PT    | K22178809 |       | 1-   | A    | B1       |
| C 2115 | CHIP CAP.      | 0.001uF  | 50V  | B    | GRM36B102K50PT    | K22178809 |       | 1-   | A    | B2       |
| C 2116 | CHIP CAP.      | 0.001uF  | 50V  | B    | GRM36B102K50PT    | K22178809 |       | 1-   | A    | B2       |
| C 2117 | CHIP CAP.      | 0.047uF  | 10V  | B    | GRM36B473K10PT    | K22108801 |       | 1-   | A    | C1       |
| C 2120 | CHIP CAP.      | 0.01uF   | 16V  | B    | GRM36B103K16PT    | K22128804 |       | 1-   | A    | A2       |
| C 2122 | CHIP CAP.      | 0.047uF  | 10V  | B    | GRM36B473K10PT    | K22108801 |       | 1-   | A    | C1       |
| C 2123 | CHIP CAP.      | 10pF     | 50V  | CH   | UMK105CH100DW-F   | K22178258 |       | 1-   | B    | b1       |
| C 2124 | CHIP CAP.      | 100pF    | 50V  | CH   | GRM36CH101J50PT   | K22178236 |       | 3-   | B    | c2       |
| CD2001 | CERAMIC DISC   |          |      |      | CDBLB450KCAY07-B0 | H7900930  |       | 1-   | B    | a2       |
| CF2001 | CERAMIC FILTER |          |      |      | SFECPI0M7GA00-R0  | H3900514  |       | 1-   | B    | b2       |
| CF2002 | CERAMIC FILTER |          |      |      | ALFYM450F=K       | H3900531  |       | 1-   | B    | a1       |
| D 2001 | DIODE          |          |      |      | DAP222-TL         | G2070432  |       | 1-   | B    | c2       |
| D 2002 | DIODE          |          |      |      | DA221 TL          | G2070178  |       | 1-   | B    | b2       |
| D 2003 | DIODE          |          |      |      | DAN222M T2L       | G2070936  |       | 1-   | B    | b2       |
| D 2004 | DIODE          |          |      |      | DAN222M T2L       | G2070936  |       | 1-   | B    | a1       |
| D 2005 | DIODE          |          |      |      | DAN222M T2L       | G2070936  |       | 1-   | B    | a1       |
| D 2006 | DIODE          |          |      |      | DA221 TL          | G2070178  |       | 1-   | A    | B1       |
| D 2007 | DIODE          |          |      |      | DA221 TL          | G2070178  |       | 1-   | A    | B2       |
| D 2008 | DIODE          |          |      |      | UDZS TE-17 6.8B   | G2070888  |       | 1-   | B    | a1       |
| D 2009 | DIODE          |          |      |      | RB751S-40TE61     | G2070850  |       | 1-   | B    | a1       |
| D 2010 | DIODE          |          |      |      | DA221 TL          | G2070178  |       | 1-   | A    | C1       |

| REF.   | DESCRIPTION | VALUE  | V/W   | TOL. | MFR'S DESIG      | VXSTD P/N | VERS. | LOT. | SIDE | LAY ADR. |
|--------|-------------|--------|-------|------|------------------|-----------|-------|------|------|----------|
| D 2011 | DIODE       |        |       |      | 1SS400G T2R      | G2070934  |       | 3-   | B    | b1       |
| FB2001 | CHIP COIL   |        |       |      | BLM10A121SPT     | L1690843  |       | 1-   | A    | A1       |
| FB2002 | CHIP COIL   |        |       |      | BLM10A121SPT     | L1690843  |       | 1-   | A    | B1       |
| FB2003 | CHIP COIL   |        |       |      | BLM10A121SPT     | L1690843  |       | 1-   | A    | B1       |
| FB2004 | CHIP COIL   |        |       |      | BLM10A121SPT     | L1690843  |       | 1-   | A    | B1       |
| FB2005 | CHIP COIL   |        |       |      | BLM10A121SPT     | L1690843  |       | 1-   | A    | B1       |
| J 2001 | CONNECTOR   |        |       |      | HSJ1594-010055   | P1090896  |       | 1-   | B    | b1       |
| J 2002 | CONNECTOR   |        |       |      | 9637S-26-Y905    | P1091227  |       | 1-   | A    | A2       |
| L 2001 | M.RFC       | 0.39uH |       | 2%   | C1608CB-R39G     | L1691107  |       | 1-   | B    | c2       |
| L 2002 | M.RFC       | 0.15uH |       | 2%   | C1608CB-R15G     | L1691101  |       | 1-   | B    | c2       |
| L 2003 | M.RFC       | 0.33uH |       | 2%   | C1608CB-R33G     | L1691106  |       | 1-   | B    | b2       |
| L 2004 | M.RFC       | 0.22uH |       |      | LK1608 R22K-T    | L1690410  |       | 1-   | B    | c1       |
| L 2005 | M.RFC       | 0.47uH |       |      | LK1608 R47K-T    | L1690414  |       | 1-   | B    | c1       |
| L 2006 | M.RFC       | 1uH    |       |      | LK1608 1R0K-T    | L1690687  |       | 1-   | B    | c1       |
| L 2007 | M.RFC       | 0.33uH |       | 2%   | C1608CB-R33G     | L1691106  |       | 1-   | B    | b2       |
| L 2008 | M.RFC       | 0.22uH |       |      | LK1608 R22K-T    | L1690410  |       | 1-   | B    | b1       |
| L 2009 | M.RFC       | 4.7uH  |       |      | LK1608 4R7K-T    | L1690688  |       | 1-   | B    | b1       |
| L 2010 | M.RFC       | 10uH   |       | 2%   | KQ1008TE100G     | L1691216  |       | 1-   | A    | B2       |
| L 2011 | M.RFC       | 0.47uH |       |      | LK1608 R47K-T    | L1690414  |       | 3-   | B    | c2       |
| Q 2001 | TRANSISTOR  |        |       |      | DTC144EE TL      | G3070075  |       | 1-   | B    | c2       |
| Q 2002 | TRANSISTOR  |        |       |      | 2SC4915-O(TE85L) | G3349158O |       | 1-   | B    | c2       |
| Q 2003 | TRANSISTOR  |        |       |      | DTC144EE TL      | G3070075  |       | 1-   | B    | c1       |
| Q 2004 | TRANSISTOR  |        |       |      | 2SC4915-O(TE85L) | G3349158O |       | 1-   | B    | c1       |
| Q 2005 | TRANSISTOR  |        |       |      | 2SC4915-O(TE85L) | G3349158O |       | 1-   | B    | b2       |
| Q 2006 | TRANSISTOR  |        |       |      | 2SC4915-O(TE85L) | G3349158O |       | 1-   | B    | b2       |
| Q 2007 | TRANSISTOR  |        |       |      | 2SC4915-O(TE85L) | G3349158O |       | 1-   | B    | c1       |
| Q 2008 | TRANSISTOR  |        |       |      | 2SC4915-O(TE85L) | G3349158O |       | 1-   | B    | c1       |
| Q 2009 | TRANSISTOR  |        |       |      | 2SC4915-O(TE85L) | G3349158O |       | 1-   | B    | b1       |
| Q 2010 | IC          |        |       |      | TA31136FN(EL)    | G1091605  |       | 1-   | B    | a2       |
| Q 2011 | TRANSISTOR  |        |       |      | 2SA1774 TL R     | G3117748R |       | 1-   | A    | A1       |
| Q 2012 | TRANSISTOR  |        |       |      | 2SC4617 TL R     | G3346178R |       | 1-   | A    | A1       |
| Q 2013 | TRANSISTOR  |        |       |      | 2SA1774 TL R     | G3117748R |       | 1-   | A    | C2       |
| Q 2014 | TRANSISTOR  |        |       |      | 2SA1774 TL R     | G3117748R |       | 1-   | A    | B2       |
| Q 2015 | TRANSISTOR  |        |       |      | 2SC4617 TL R     | G3346178R |       | 1-   | B    | a1       |
| Q 2016 | TRANSISTOR  |        |       |      | 2SA1774 TL R     | G3117748R |       | 1-   | A    | A1       |
| Q 2017 | TRANSISTOR  |        |       |      | 2SC4617 TL R     | G3346178R |       | 1-   | A    | B2       |
| Q 2018 | TRANSISTOR  |        |       |      | DTC144EE TL      | G3070075  |       | 1-   | B    | a2       |
| Q 2019 | FET         |        |       |      | 2SJ364-R(TX)     | G3703648R |       | 1-   | B    | a2       |
| Q 2020 | TRANSISTOR  |        |       |      | 2SC4617 TL R     | G3346178R |       | 1-   | A    | B1       |
| Q 2021 | TRANSISTOR  |        |       |      | 2SC4617 TL R     | G3346178R |       | 1-   | B    | a1       |
| Q 2022 | TRANSISTOR  |        |       |      | 2SC4617 TL R     | G3346178R |       | 1-   | B    | a2       |
| Q 2023 | TRANSISTOR  |        |       |      | FMMTL718TA       | G3070335  |       | 1-   | B    | a1       |
| Q 2023 | TRANSISTOR  |        |       |      | CPH6102-TL       | G3070223  |       | 3-   | B    | a1       |
| Q 2024 | TRANSISTOR  |        |       |      | DTA144EE TL      | G3070074  |       | 1-   | B    | b1       |
| Q 2025 | TRANSISTOR  |        |       |      | DTC144EE TL      | G3070075  |       | 1-   | B    | b1       |
| Q 2026 | TRANSISTOR  |        |       |      | 2SC4617 TL R     | G3346178R |       | 1-   | B    | a1       |
| Q 2027 | FET         |        |       |      | 2SJ364-R(TX)     | G3703648R |       | 1-   | B    | a2       |
| Q 2028 | IC          |        |       |      | TDA7233D-TR      | G1091112  |       | 1-   | A    | B1       |
| Q 2029 | TRANSISTOR  |        |       |      | DTC123YE TL      | G3070095  |       | 1-   | B    | b1       |
| Q 2030 | TRANSISTOR  |        |       |      | 2SC4617 TL R     | G3346178R |       | 1-   | B    | a1       |
| Q 2031 | TRANSISTOR  |        |       |      | 2SC4617 TL R     | G3346178R |       | 1-   | A    | C1       |
| Q 2032 | TRANSISTOR  |        |       |      | 2SA1774 TL R     | G3117748R |       | 1-   | A    | C1       |
| Q 2033 | TRANSISTOR  |        |       |      | 2SC4617 TL R     | G3346178R |       | 1-   | B    | a1       |
| Q 2034 | TRANSISTOR  |        |       |      | 2SC4617 TL R     | G3346178R |       | 1-   | A    | C1       |
| Q 2035 | TRANSISTOR  |        |       |      | EMD2 T2R         | G3070312  |       | 1-   | A    | B1       |
| R 2002 | CHIP RES.   | 100    | 1/16W | 5%   | RMC1/16S 101JTH  | J24189013 |       | 1-   | B    | b2       |
| R 2003 | CHIP RES.   | 470    | 1/16W | 5%   | RMC1/16S 471JTH  | J24189021 |       | 1-   | B    | c2       |
| R 2004 | CHIP RES.   | 470    | 1/16W | 5%   | RMC1/16S 471JTH  | J24189021 |       | 1-   | B    | c1       |
| R 2005 | CHIP RES.   | 470k   | 1/16W | 5%   | RMC1/16S 474JTH  | J24189057 |       | 1-   | B    | c2       |
| R 2006 | CHIP RES.   | 1k     | 1/16W | 5%   | RMC1/16S 102JTH  | J24189025 |       | 1-   | B    | c1       |
| R 2007 | CHIP RES.   | 100k   | 1/16W | 5%   | RMC1/16S 104JTH  | J24189049 |       | 1-   | B    | c1       |
| R 2008 | CHIP RES.   | 470    | 1/16W | 5%   | RMC1/16S 471JTH  | J24189021 |       | 1-   | B    | b2       |

# AF Unit

| REF.   | DESCRIPTION | VALUE | V/W   | TOL. | MFR'S DESIG     | VXSTD P/N | VERS. | LOT. | SIDE | LAY ADR. |
|--------|-------------|-------|-------|------|-----------------|-----------|-------|------|------|----------|
| R 2009 | CHIP RES.   | 1k    | 1/16W | 5%   | RMC1/16S 102JTH | J24189025 |       | 1-   | B    | b2       |
| R 2010 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |       | 1-   | B    | b2       |
| R 2011 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH | J24189013 |       | 1-   | B    | b2       |
| R 2013 | CHIP RES.   | 33k   | 1/16W | 5%   | RMC1/16S 333JTH | J24189043 |       | 1-   | B    | b2       |
| R 2014 | CHIP RES.   | 47k   | 1/16W | 5%   | RMC1/16S 473JTH | J24189045 |       | 1-   | B    | c1       |
| R 2016 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH | J24189013 |       | 1-   | B    | c1       |
| R 2017 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |       | 1-   | B    | c1       |
| R 2018 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH | J24189013 |       | 1-   | B    | c1       |
| R 2020 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH | J24189013 |       | 1-   | B    | b2       |
| R 2021 | CHIP RES.   | 4.7k  | 1/16W | 5%   | RMC1/16S 472JTH | J24189033 |       | 1-   | B    | b2       |
| R 2022 | CHIP RES.   | 330   | 1/16W | 5%   | RMC1/16S 331JTH | J24189019 |       | 1-   | B    | b2       |
| R 2023 | CHIP RES.   | 330   | 1/16W | 5%   | RMC1/16S 331JTH | J24189019 |       | 1-   | B    | b1       |
| R 2025 | CHIP RES.   | 4.7k  | 1/16W | 5%   | RMC1/16S 472JTH | J24189033 |       | 1-   | B    | b2       |
| R 2026 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | B    | b1       |
| R 2027 | CHIP RES.   | 220   | 1/16W | 5%   | RMC1/16S 221JTH | J24189017 |       | 1-   | B    | b2       |
| R 2028 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | A    | C2       |
| R 2029 | CHIP RES.   | 4.7k  | 1/16W | 5%   | RMC1/16S 472JTH | J24189033 |       | 1-   | B    | a2       |
| R 2030 | CHIP RES.   | 22k   | 1/16W | 5%   | RMC1/16S 223JTH | J24189041 |       | 1-   | B    | b1       |
| R 2031 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH | J24189013 |       | 1-   | B    | a1       |
| R 2032 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH | J24189013 |       | 1-   | B    | a1       |
| R 2033 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | B    | a1       |
| R 2034 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | A    | B1       |
| R 2035 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | A    | B1       |
| R 2036 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | A    | A1       |
| R 2037 | CHIP RES.   | 2.7k  | 1/16W | 5%   | RMC1/16S 272JTH | J24189030 |       | 1-   | A    | C2       |
| R 2038 | CHIP RES.   | 220   | 1/16W | 5%   | RMC1/16S 221JTH | J24189017 |       | 1-   | A    | B2       |
| R 2039 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | A    | B2       |
| R 2040 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |       | 1-   | B    | a2       |
| R 2041 | CHIP RES.   | 33k   | 1/16W | 5%   | RMC1/16S 333JTH | J24189043 |       | 1-   | B    | a2       |
| R 2042 | CHIP RES.   | 4.7k  | 1/16W | 5%   | RMC1/16S 472JTH | J24189033 |       | 1-   | B    | a2       |
| R 2043 | CHIP RES.   | 390k  | 1/16W | 5%   | RMC1/16S 394JTH | J24189056 |       | 1-   | B    | a2       |
| R 2044 | CHIP RES.   | 3.3k  | 1/16W | 5%   | RMC1/16S 332JTH | J24189031 |       | 1-   | B    | a2       |
| R 2045 | CHIP RES.   | 680   | 1/16W | 5%   | RMC1/16S 681JTH | J24189023 |       | 1-   | B    | a2       |
| R 2046 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | B    | a1       |
| R 2047 | CHIP RES.   | 560k  | 1/16W | 5%   | RMC1/16S 564JTH | J24189058 |       | 1-   | B    | a1       |
| R 2048 | CHIP RES.   | 470   | 1/16W | 5%   | RMC1/16S 471JTH | J24189021 |       | 1-   | B    | a1       |
| R 2049 | CHIP RES.   | 4.7k  | 1/16W | 5%   | RMC1/16S 472JTH | J24189033 |       | 1-   | B    | a1       |
| R 2050 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | A    | A1       |
| R 2051 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | B    | a2       |
| R 2052 | CHIP RES.   | 330k  | 1/16W | 5%   | RMC1/16S 334JTH | J24189055 |       | 1-   | B    | a2       |
| R 2053 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | B    | a2       |
| R 2054 | CHIP RES.   | 3.3k  | 1/16W | 5%   | RMC1/16S 332JTH | J24189031 |       | 1-   | A    | B1       |
| R 2055 | CHIP RES.   | 330k  | 1/16W | 5%   | RMC1/16S 334JTH | J24189055 |       | 1-   | A    | B2       |
| R 2056 | CHIP RES.   | 3.3k  | 1/16W | 5%   | RMC1/16S 332JTH | J24189031 |       | 1-   | A    | B2       |
| R 2057 | CHIP RES.   | 1k    | 1/16W | 5%   | RMC1/16S 102JTH | J24189025 |       | 1-   | A    | B2       |
| R 2058 | CHIP RES.   | 1M    | 1/16W | 5%   | RMC1/16S 105JTH | J24189061 |       | 1-   | A    | B1       |
| R 2059 | CHIP RES.   | 220k  | 1/16W | 5%   | RMC1/16S 224JTH | J24189053 |       | 1-   | B    | a1       |
| R 2060 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH | J24189013 |       | 1-   | B    | a1       |
| R 2061 | CHIP RES.   | 4.7k  | 1/16W | 5%   | RMC1/16S 472JTH | J24189033 |       | 1-   | B    | a1       |
| R 2062 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |       | 1-   | B    | a1       |
| R 2063 | CHIP RES.   | 56k   | 1/16W | 5%   | RMC1/16S 563JTH | J24189046 |       | 1-   | B    | a1       |
| R 2064 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |       | 1-   | B    | a2       |
| R 2065 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | B    | b1       |
| R 2066 | CHIP RES.   | 1k    | 1/16W | 5%   | RMC1/16S 102JTH | J24189025 |       | 1-   | B    | b1       |
| R 2067 | CHIP RES.   | 330k  | 1/16W | 5%   | RMC1/16S 334JTH | J24189055 |       | 1-   | B    | a2       |
| R 2068 | CHIP RES.   | 15k   | 1/16W | 5%   | RMC1/16S 153JTH | J24189039 |       | 1-   | B    | a2       |
| R 2069 | CHIP RES.   | 4.7k  | 1/16W | 5%   | RMC1/16S 472JTH | J24189033 |       | 1-   | B    | a2       |
| R 2070 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | B    | a1       |
| R 2071 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | A    | C1       |
| R 2072 | CHIP RES.   | 330k  | 1/16W | 5%   | RMC1/16S 334JTH | J24189055 |       | 1-   | B    | a2       |
| R 2073 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |       | 1-   | A    | B2       |
| R 2074 | CHIP RES.   | 1k    | 1/16W | 5%   | RMC1/16S 102JTH | J24189025 |       | 1-   | B    | a2       |

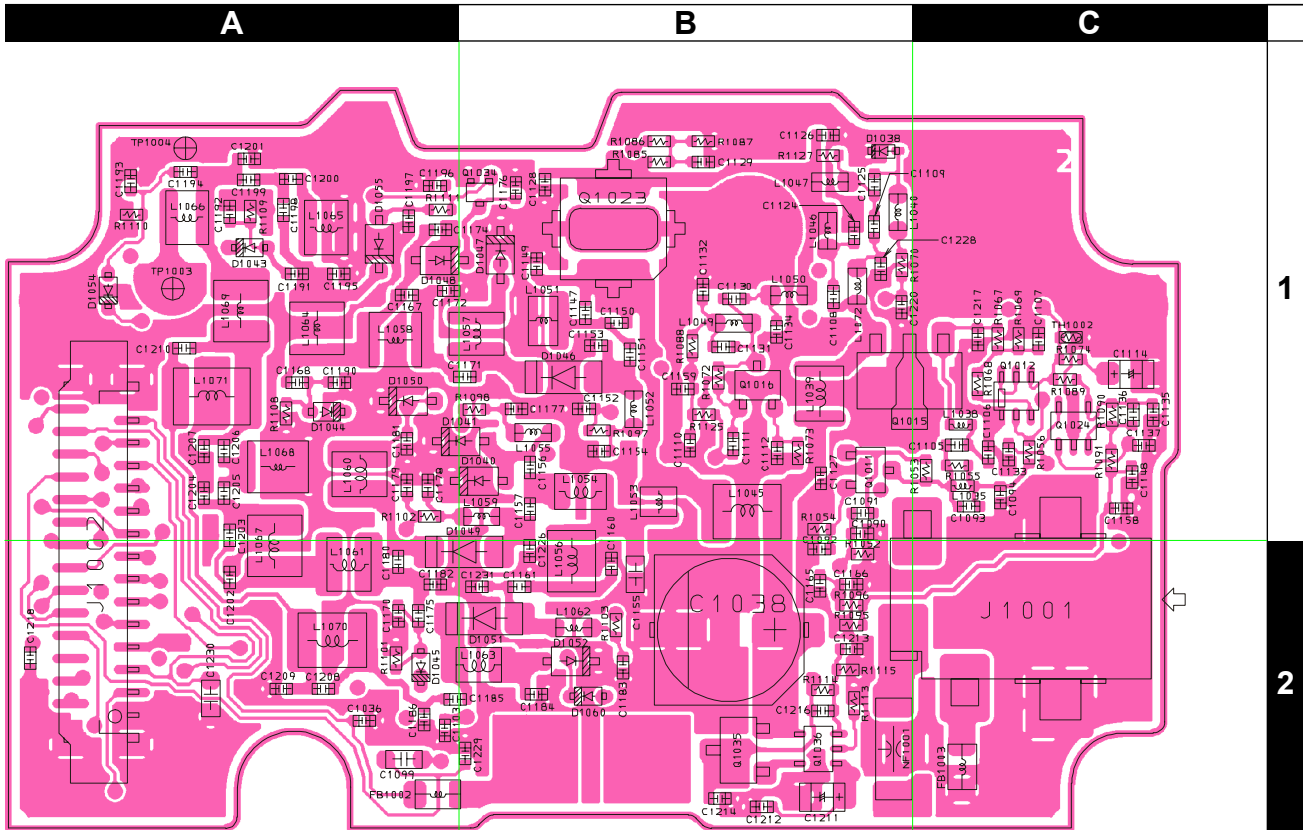
| REF.   | DESCRIPTION    | VALUE    | V/W   | TOL. | MFR'S DESIG          | VXSTD P/N | VERS. | LOT. | SIDE | LAY ADR. |
|--------|----------------|----------|-------|------|----------------------|-----------|-------|------|------|----------|
| R 2075 | CHIP RES.      | 10k      | 1/16W | 5%   | RMC1/16S 103JTH      | J24189037 |       | 1-   | B    | a2       |
| R 2076 | CHIP RES.      | 0        | 1/16W | 5%   | RMC1/16S JPTH        | J24189070 |       | 1-   | A    | C1       |
| R 2077 | CHIP RES.      | 470k     | 1/16W | 5%   | RMC1/16S 474JTH      | J24189057 |       | 1-   | B    | a1       |
| R 2078 | CHIP RES.      | 10k      | 1/16W | 5%   | RMC1/16S 103JTH      | J24189037 |       | 1-   | A    | A1       |
| R 2079 | CHIP RES.      | 2.7k     | 1/16W | 5%   | RMC1/16S 272JTH      | J24189030 |       | 1-   | B    | a1       |
| R 2080 | CHIP RES.      | 10k      | 1/16W | 5%   | RMC1/16S 103JTH      | J24189037 |       | 1-   | B    | a1       |
| R 2081 | CHIP RES.      | 33k      | 1/16W | 5%   | RMC1/16S 333JTH      | J24189043 |       | 1-   | B    | a1       |
| R 2082 | CHIP RES.      | 100      | 1/16W | 5%   | RMC1/16S 101JTH      | J24189013 |       | 1-   | B    | a1       |
| R 2083 | CHIP RES.      | 47k      | 1/16W | 5%   | RMC1/16S 473JTH      | J24189045 |       | 1-   | A    | C1       |
| R 2084 | CHIP RES.      | 47k      | 1/16W | 5%   | RMC1/16S 473JTH      | J24189045 |       | 1-   | A    | C1       |
| R 2085 | CHIP RES.      | 100k     | 1/16W | 5%   | RMC1/16S 104JTH      | J24189049 |       | 1-   | A    | C1       |
| R 2086 | CHIP RES.      | 10       | 1/16W | 5%   | RMC1/16S 100JTH      | J24189001 |       | 1-   | A    | B1       |
| R 2087 | CHIP RES.      | 2.2M     | 1/16W | 5%   | RMC1/16S 225JTH      | J24189065 |       | 1-   | B    | a1       |
| R 2088 | CHIP RES.      | 2.2k     | 1/16W | 5%   | RMC1/16S 222JTH      | J24189029 |       | 1-   | B    | a1       |
| R 2089 | CHIP RES.      | 150k     | 1/16W | 5%   | RMC1/16S 154JTH      | J24189051 |       | 1-   | B    | a1       |
| R 2090 | CHIP RES.      | 10k      | 1/16W | 5%   | RMC1/16S 103JTH      | J24189037 |       | 1-   | B    | a1       |
| R 2091 | CHIP RES.      | 47k      | 1/16W | 5%   | RMC1/16S 473JTH      | J24189045 |       | 1-   | B    | c2       |
| R 2092 | CHIP RES.      | 1M       | 1/16W | 5%   | RMC1/16S 105JTH      | J24189061 |       | 1-   | A    | B1       |
| R 2093 | CHIP RES.      | 1.5k     | 1/16W | 5%   | RMC1/16S 152JTH      | J24189027 |       | 1-   | A    | C1       |
| R 2095 | CHIP RES.      | 470k     | 1/16W | 5%   | RMC1/16S 474JTH      | J24189057 |       | 1-   | A    | C1       |
| R 2096 | CHIP RES.      | 100k     | 1/16W | 5%   | RMC1/16S 104JTH      | J24189049 |       | 1-   | A    | B2       |
| R 2097 | CHIP RES.      | 100k     | 1/16W | 5%   | RMC1/16S 104JTH      | J24189049 |       | 1-   | A    | A1       |
| R 2098 | CHIP RES.      | 4.7k     | 1/16W | 5%   | RMC1/16S 472JTH      | J24189033 |       | 1-   | B    | c1       |
| R 2099 | CHIP RES.      | 33k      | 1/16W | 5%   | RMC1/16S 333JTH      | J24189043 |       | 1-   | A    | C1       |
| R 2100 | CHIP RES.      | 22k      | 1/16W | 5%   | RMC1/16S 223JTH      | J24189041 |       | 1-   | B    | b1       |
| R 2101 | CHIP RES.      | 0        | 1/16W | 5%   | RMC1/16S JPTH        | J24189070 |       | 3-   | B    | a1       |
| S 2001 | TACT SWITCH    |          |       |      | SKQTLA               | N5090110  |       | 1-   | B    | c1       |
| S 2002 | TACT SWITCH    |          |       |      | SKQTLA               | N5090110  |       | 1-   | B    | c2       |
| S 2003 | ROTARY ENCODER |          |       |      | TP70D270E20 20F A203 | Q9000789A |       | 1-   | B    | a1       |
| XF2001 | XTAL FILTER    | 47.25MHz |       |      | MF47R2 47.25MHZ      | H1102347  |       | 1-   | B    | b2       |

***AF Unit***  
***Note:***

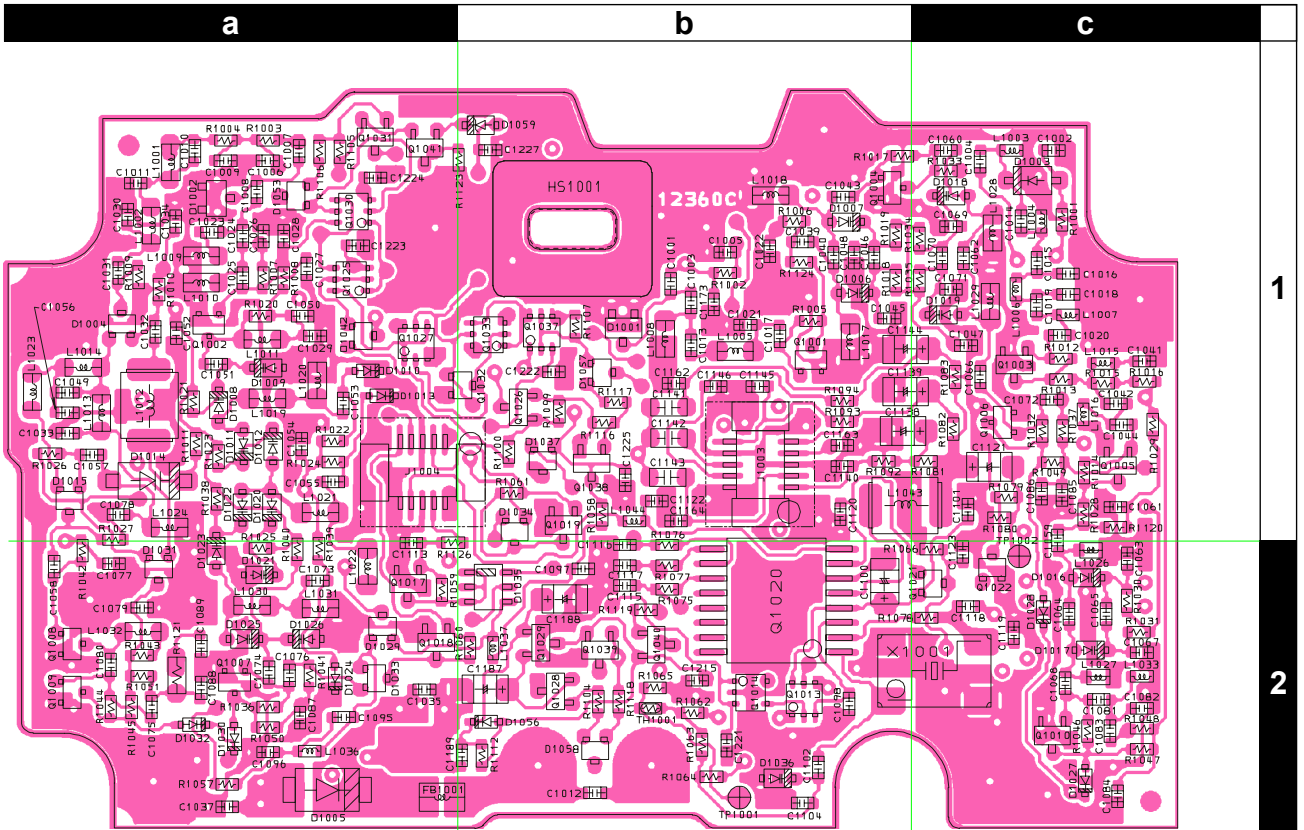


RF Unit (Lot. 1~2)

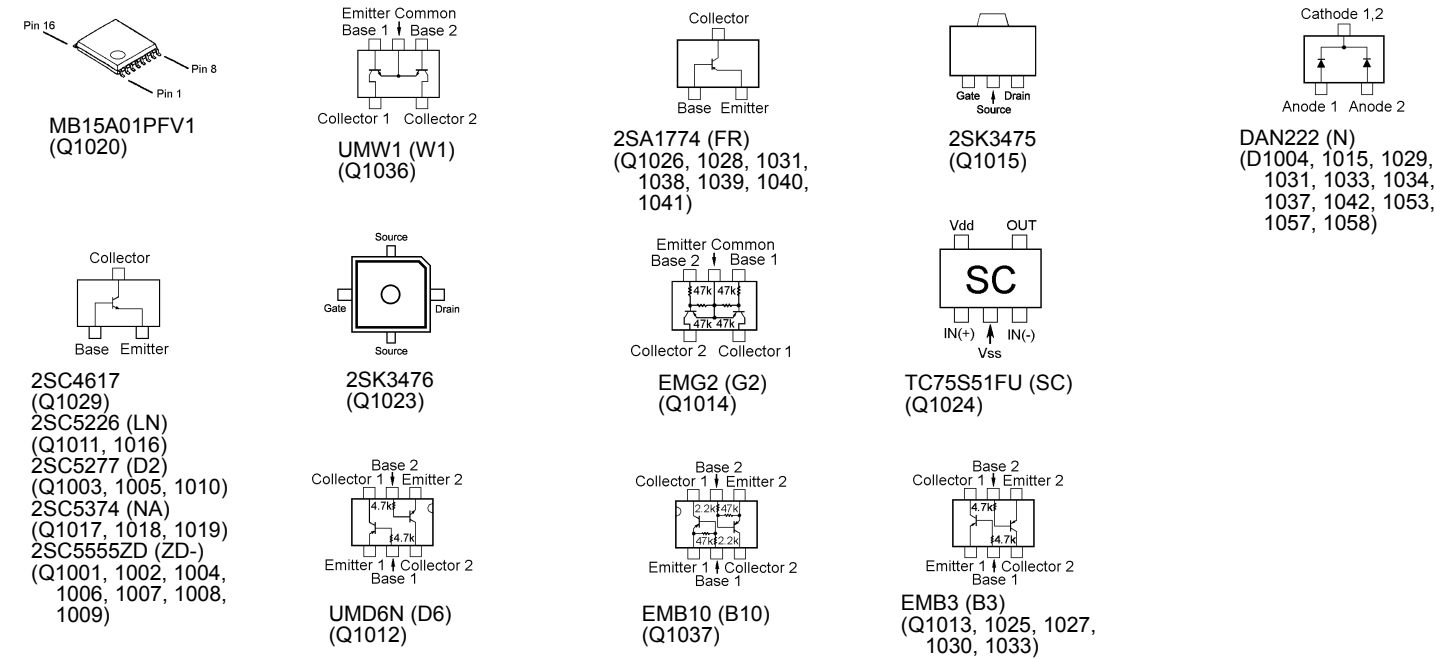
Parts Layout

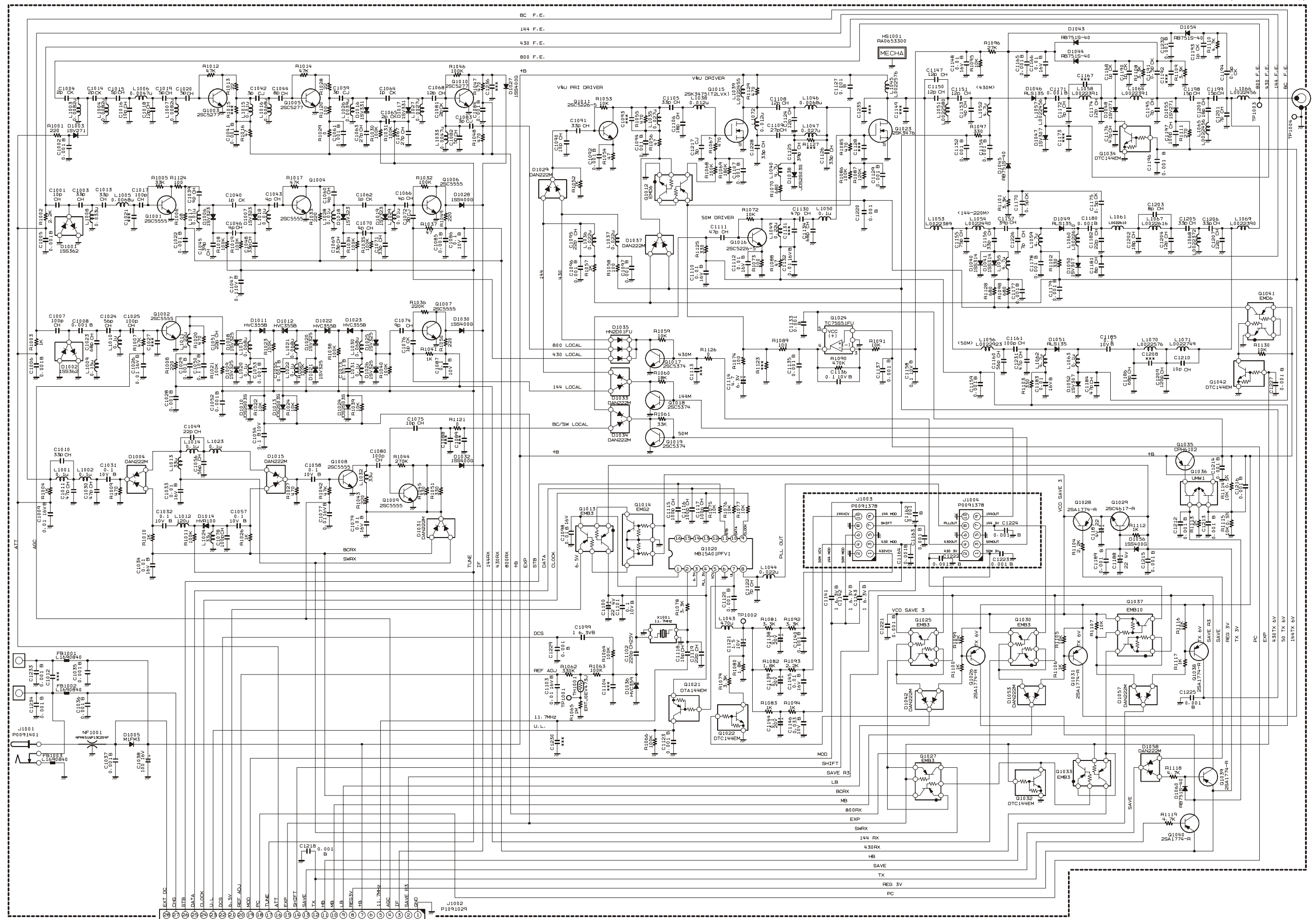


Side A



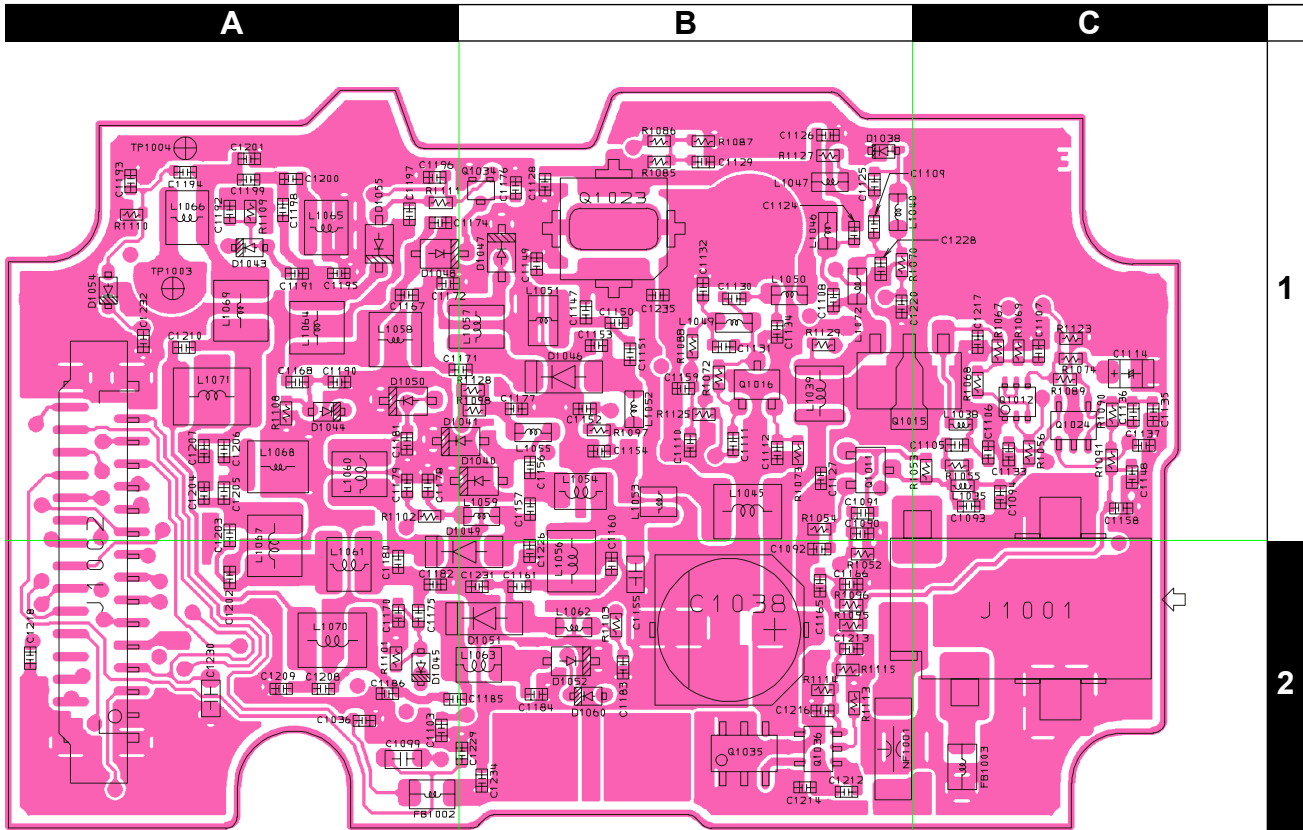
Side B



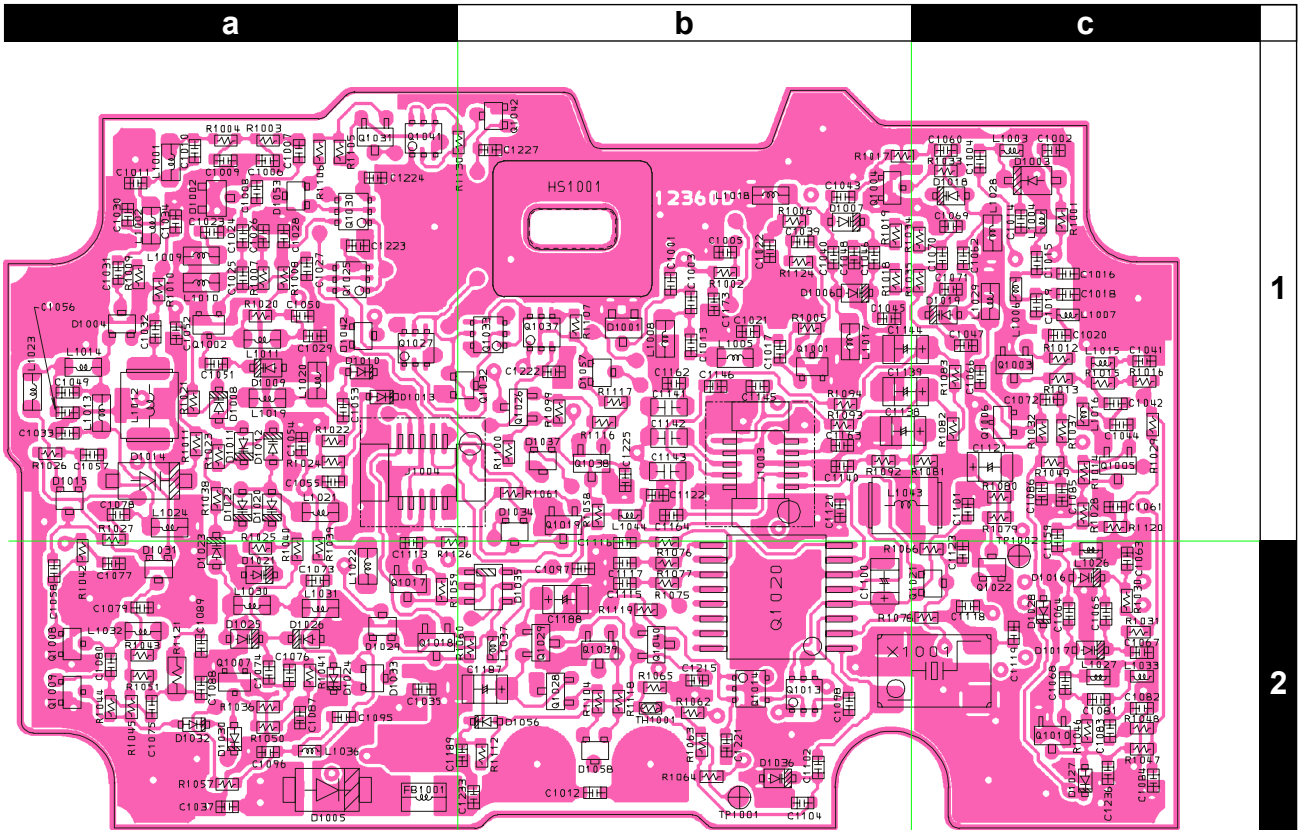


RF Unit (Lot. 3~)

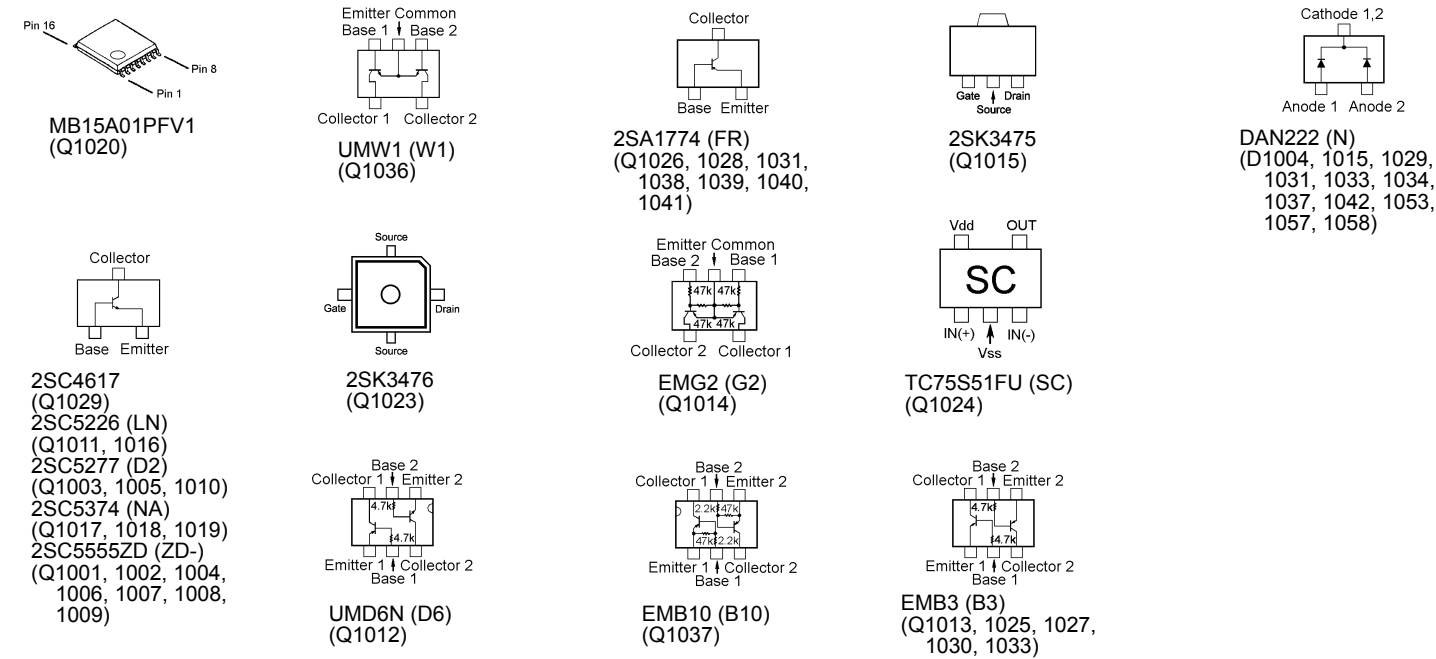
Parts Layout



Side A



Side B



## Parts List

| REF.                                | DESCRIPTION     | VALUE   | V/W | TOL. | MFR'S DESIG     | VXSTD P/N | VERS.                                | LOT. | SIDE | LAY ADR. |
|-------------------------------------|-----------------|---------|-----|------|-----------------|-----------|--------------------------------------|------|------|----------|
| *** RF UNIT ***                     |                 |         |     |      |                 |           |                                      |      |      |          |
| PCB with Components (with VCO Unit) |                 |         |     |      |                 | CP8150002 | DST:USA                              |      |      |          |
|                                     |                 |         |     |      |                 | CP8150003 | DST:EXP                              |      |      |          |
|                                     |                 |         |     |      |                 | CP8150004 | DST:EU                               |      |      |          |
|                                     |                 |         |     |      |                 | CP8150005 | DST:AUS                              |      |      |          |
| Printed Circuit Board               |                 |         |     |      |                 | FR012360C |                                      | 1-   |      |          |
|                                     |                 |         |     |      |                 | FR012360D |                                      | 3-   |      |          |
| C 1001                              | CHIP CAP.       | 10pF    | 50V | CH   | UMK105CH100DW-F | K22178258 | AUSTRALIA<br>EUROPE<br>EXPORT<br>USA | 1-   | B    | b1       |
| C 1002                              | CHIP CAP.       | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |                                      | 1-   | B    | c1       |
| C 1003                              | CHIP CAP.       | 33pF    | 50V | CH   | GRM36CH330J50PT | K22178224 |                                      | 1-   | B    | b1       |
| C 1004                              | CHIP CAP.       | 2pF     | 50V | CK   | UMK105CK020CW-F | K22178250 |                                      | 1-   | B    | c1       |
| C 1005                              | CHIP CAP.       | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |                                      | 1-   | B    | b1       |
| C 1006                              | CHIP CAP.       | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |                                      | 1-   | B    | a1       |
| C 1007                              | CHIP CAP.       | 100pF   | 50V | CH   | GRM36CH101J50PT | K22178236 |                                      | 1-   | B    | a1       |
| C 1008                              | CHIP CAP.       | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |                                      | 1-   | B    | a1       |
| C 1009                              | CHIP CAP.       | 0.01uF  | 16V | B    | GRM36B103K16PT  | K22128804 |                                      | 1-   | B    | a1       |
| C 1010                              | CHIP CAP.       | 33pF    | 50V | CH   | GRM36CH330J50PT | K22178224 |                                      | 1-   | B    | a1       |
| C 1011                              | CHIP CAP.       | 47pF    | 50V | CH   | GRM36CH470J50PT | K22178228 |                                      | 1-   | B    | a1       |
| C 1013                              | CHIP CAP.       | 33pF    | 50V | CH   | GRM36CH330J50PT | K22178224 |                                      | 1-   | B    | b1       |
| C 1014                              | CHIP CAP.       | 2pF     | 50V | CK   | GRM36CK020C50PT | K22178204 |                                      | 1-   | B    | c1       |
| C 1015                              | CHIP CAP.       | 5pF     | 50V | CH   | UMK105CH050CW-F | K22178253 |                                      | 1-   | B    | c1       |
| C 1016                              | CHIP CAP.       | 10pF    | 50V | CH   | UMK105CH100DW-F | K22178258 |                                      | 1-   | B    | c1       |
| C 1017                              | CHIP CAP.       | 100pF   | 50V | CH   | GRM36CH101J50PT | K22178236 |                                      | 1-   | B    | b1       |
| C 1018                              | CHIP CAP.       | 12pF    | 50V | CH   | GRM36CH120J50PT | K22178214 |                                      | 1-   | B    | c1       |
| C 1019                              | CHIP CAP.       | 5pF     | 50V | CH   | UMK105CH050CW-F | K22178253 |                                      | 1-2  | B    | c1       |
| C 1019                              | CHIP CAP.       | 5pF     | 50V | CH   | UMK105CH050CW-F | K22178253 |                                      | 3-   | B    | c1       |
| C 1019                              | CHIP CAP.       | 7pF     | 50V | CH   | UMK105CH070DW-F | K22178255 |                                      | 3-   | B    | c1       |
| C 1019                              | CHIP CAP.       | 5pF     | 50V | CH   | UMK105CH050CW-F | K22178253 |                                      | 3-   | B    | c1       |
| C 1019                              | CHIP CAP.       | 5pF     | 50V | CH   | UMK105CH050CW-F | K22178253 |                                      | 3-   | B    | c1       |
| C 1020                              | CHIP CAP.       | 5pF     | 50V | CH   | UMK105CH050CW-F | K22178253 |                                      | 1-   | B    | c1       |
| C 1022                              | CHIP CAP.       | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |                                      | 1-   | B    | b1       |
| C 1023                              | CHIP CAP.       | 68pF    | 50V | CH   | GRM36CH680J50PT | K22178232 |                                      | 1-   | B    | a1       |
| C 1024                              | CHIP CAP.       | 56pF    | 50V | CH   | GRM36CH560J50PT | K22178230 |                                      | 1-   | B    | a1       |
| C 1025                              | CHIP CAP.       | 100pF   | 50V | CH   | GRM36CH101J50PT | K22178236 |                                      | 1-   | B    | a1       |
| C 1026                              | CHIP CAP.       | 0.01uF  | 16V | B    | GRM36B103K16PT  | K22128804 |                                      | 1-   | B    | a1       |
| C 1028                              | CHIP CAP.       | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |                                      | 1-   | B    | a1       |
| C 1029                              | CHIP CAP.       | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |                                      | 1-   | B    | a1       |
| C 1030                              | CHIP CAP.       | 47pF    | 50V | CH   | GRM36CH470J50PT | K22178228 |                                      | 1-   | B    | a1       |
| C 1031                              | CHIP CAP.       | 0.1uF   | 10V | B    | GRM36B104K10PT  | K22108802 |                                      | 1-   | B    | a1       |
| C 1032                              | CHIP CAP.       | 0.1uF   | 10V | B    | GRM36B104K10PT  | K22108802 |                                      | 1-   | B    | a1       |
| C 1033                              | CHIP CAP.       | 0.01uF  | 16V | B    | GRM36B103K16PT  | K22128804 |                                      | 1-   | B    | a1       |
| C 1034                              | CHIP CAP.       | 0.01uF  | 16V | B    | GRM36B103K16PT  | K22128804 |                                      | 1-   | B    | a1       |
| C 1035                              | CHIP CAP.       | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |                                      | 1-   | B    | a2       |
| C 1036                              | CHIP CAP.       | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |                                      | 1-   | A    | A2       |
| C 1037                              | CHIP CAP.       | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |                                      | 1-   | B    | a2       |
| C 1038                              | AL.ELECTRO.CAP. | 100uF   | 16V |      | ECEV1CA101WP    | K48120012 |                                      | 1-   | A    | B2       |
| C 1039                              | CHIP CAP.       | 4pF     | 50V | CH   | UMK105CH040CW-F | K22178252 |                                      | 1-   | B    | b1       |
| C 1040                              | CHIP CAP.       | 1pF     | 50V | CK   | GRM36CK010B50PT | K22178287 |                                      | 1-   | B    | b1       |
| C 1041                              | CHIP CAP.       | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |                                      | 1-   | B    | c1       |
| C 1042                              | CHIP CAP.       | 3pF     | 50V | CJ   | UMK105CJ030CW-F | K22178251 |                                      | 1-   | B    | c1       |
| C 1043                              | CHIP CAP.       | 4pF     | 50V | CH   | UMK105CH040CW-F | K22178252 | AUSTRALIA<br>EUROPE<br>EXPORT<br>USA | 1-2  | B    | b1       |
| C 1043                              | CHIP CAP.       | 4pF     | 50V | CH   | UMK105CH040CW-F | K22178252 |                                      | 3-   | B    | b1       |
| C 1043                              | CHIP CAP.       | 3pF     | 50V | CJ   | UMK105CJ030CW-F | K22178251 |                                      | 3-   | B    | b1       |
| C 1043                              | CHIP CAP.       | 4pF     | 50V | CH   | UMK105CH040CW-F | K22178252 |                                      | 3-   | B    | b1       |
| C 1043                              | CHIP CAP.       | 4pF     | 50V | CH   | UMK105CH040CW-F | K22178252 |                                      | 3-   | B    | b1       |
| C 1044                              | CHIP CAP.       | 8pF     | 50V | CH   | GRM36CH080D50PT | K22178210 |                                      | 1-   | B    | c1       |
| C 1045                              | CHIP CAP.       | 39pF    | 50V | CH   | GRM36CH390J50PT | K22178226 |                                      | 1-   | B    | b1       |
| C 1046                              | CHIP CAP.       | 4pF     | 50V | CH   | UMK105CH040CW-F | K22178252 |                                      | 1-   | B    | b1       |
| C 1047                              | CHIP CAP.       | 0.1uF   | 10V | B    | GRM36B104K10PT  | K22108802 |                                      | 1-   | B    | c1       |
| C 1048                              | CHIP CAP.       | 33pF    | 50V | CH   | GRM36CH330J50PT | K22178224 |                                      | 1-   | B    | b1       |
| C 1049                              | CHIP CAP.       | 22pF    | 50V | CH   | GRM36CH220J50PT | K22178220 |                                      | 1-   | B    | a1       |
| C 1050                              | CHIP CAP.       | 0.1uF   | 10V | B    | GRM36B104K10PT  | K22108802 |                                      | 1-   | B    | a1       |

# RF Unit

| REF.   | DESCRIPTION | VALUE   | V/W | TOL. | MFR'S DESIG     | VXSTD P/N | VERS.     | LOT. | SIDE | LAY ADR. |
|--------|-------------|---------|-----|------|-----------------|-----------|-----------|------|------|----------|
| C 1051 | CHIP CAP.   | 22pF    | 50V | CH   | GRM36CH220J50PT | K22178220 |           | 1-   | B    | a1       |
| C 1052 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 1-   | B    | a1       |
| C 1053 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 1-   | B    | a1       |
| C 1054 | CHIP CAP.   | 0.1uF   | 10V | B    | GRM36B104K10PT  | K22108802 |           | 1-   | B    | a1       |
| C 1055 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 1-   | B    | a1       |
| C 1056 | CHIP CAP.   | 56pF    | 50V | CH   | GRM36CH560J50PT | K22178230 |           | 1-   | B    | a1       |
| C 1057 | CHIP CAP.   | 0.1uF   | 10V | B    | GRM36B104K10PT  | K22108802 |           | 1-   | B    | a1       |
| C 1058 | CHIP CAP.   | 0.1uF   | 10V | B    | GRM36B104K10PT  | K22108802 |           | 1-   | B    | a2       |
| C 1059 | CHIP CAP.   | 3pF     | 50V | CJ   | UMK105CJ030CW-F | K22178251 |           | 1-   | B    | c1       |
| C 1060 | CHIP CAP.   | 4pF     | 50V | CH   | UMK105CH040CW-F | K22178252 |           | 1-2  | B    | c1       |
| C 1060 | CHIP CAP.   | 4pF     | 50V | CH   | UMK105CH040CW-F | K22178252 | AUSTRALIA | 3-   | B    | c1       |
| C 1060 | CHIP CAP.   | 3pF     | 50V | CJ   | UMK105CJ030CW-F | K22178251 | EUROPE    | 3-   | B    | c1       |
| C 1060 | CHIP CAP.   | 4pF     | 50V | CH   | UMK105CH040CW-F | K22178252 | EXPORT    | 3-   | B    | c1       |
| C 1060 | CHIP CAP.   | 4pF     | 50V | CH   | UMK105CH040CW-F | K22178252 | USA       | 3-   | B    | c1       |
| C 1061 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 1-   | B    | c1       |
| C 1062 | CHIP CAP.   | 1pF     | 50V | CK   | GRM36CK010B50PT | K22178287 |           | 1-   | B    | c1       |
| C 1063 | CHIP CAP.   | 27pF    | 50V | CH   | GRM36CH270J50PT | K22178222 |           | 1-   | B    | c2       |
| C 1064 | CHIP CAP.   | 1pF     | 50V | CK   | UMK105CK010CW-F | K22178248 |           | 1-   | B    | c2       |
| C 1065 | CHIP CAP.   | 2pF     | 50V | CK   | GRM36CK020C50PT | K22178204 |           | 1-   | B    | c2       |
| C 1066 | CHIP CAP.   | 4pF     | 50V | CH   | UMK105CH040CW-F | K22178252 |           | 1-2  | B    | c1       |
| C 1066 | CHIP CAP.   | 4pF     | 50V | CH   | UMK105CH040CW-F | K22178252 | AUSTRALIA | 3-   | B    | c1       |
| C 1066 | CHIP CAP.   | 3pF     | 50V | CJ   | UMK105CJ030CW-F | K22178251 | EUROPE    | 3-   | B    | c1       |
| C 1066 | CHIP CAP.   | 4pF     | 50V | CH   | UMK105CH040CW-F | K22178252 | EXPORT    | 3-   | B    | c1       |
| C 1066 | CHIP CAP.   | 4pF     | 50V | CH   | UMK105CH040CW-F | K22178252 | USA       | 3-   | B    | c1       |
| C 1067 | CHIP CAP.   | 27pF    | 50V | CH   | GRM36CH270J50PT | K22178222 |           | 1-   | B    | c2       |
| C 1068 | CHIP CAP.   | 12pF    | 50V | CH   | GRM36CH120J50PT | K22178214 |           | 1-   | B    | c2       |
| C 1069 | CHIP CAP.   | 33pF    | 50V | CH   | GRM36CH330J50PT | K22178224 |           | 1-   | B    | c1       |
| C 1070 | CHIP CAP.   | 4pF     | 50V | CH   | UMK105CH040CW-F | K22178252 |           | 1-   | B    | c1       |
| C 1071 | CHIP CAP.   | 33pF    | 50V | CH   | GRM36CH330J50PT | K22178224 |           | 1-   | B    | c1       |
| C 1072 | CHIP CAP.   | 3pF     | 50V | CJ   | UMK105CJ030CW-F | K22178251 |           | 1-2  | B    | c1       |
| C 1072 | CHIP CAP.   | 3pF     | 50V | CJ   | UMK105CJ030CW-F | K22178251 | AUSTRALIA | 3-   | B    | c1       |
| C 1072 | CHIP CAP.   | 1pF     | 50V | CK   | UMK105CK010CW-F | K22178248 | EUROPE    | 3-   | B    | c1       |
| C 1072 | CHIP CAP.   | 3pF     | 50V | CJ   | UMK105CJ030CW-F | K22178251 | EXPORT    | 3-   | B    | c1       |
| C 1072 | CHIP CAP.   | 3pF     | 50V | CJ   | UMK105CJ030CW-F | K22178251 | USA       | 3-   | B    | c1       |
| C 1073 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 1-   | B    | a2       |
| C 1074 | CHIP CAP.   | 9pF     | 50V | CH   | GRM36CH090D50PT | K22178211 |           | 1-   | B    | a2       |
| C 1075 | CHIP CAP.   | 10pF    | 50V | CH   | UMK105CH100DW-F | K22178258 |           | 1-   | B    | a2       |
| C 1076 | CHIP CAP.   | 1pF     | 50V | CK   | UMK105CK010CW-F | K22178248 |           | 1-   | B    | a2       |
| C 1077 | CHIP CAP.   | 0.01uF  | 16V | B    | GRM36B103K16PT  | K22128804 |           | 1-   | B    | a2       |
| C 1078 | CHIP CAP.   | 100pF   | 50V | CH   | GRM36CH101J50PT | K22178236 |           | 1-   | B    | a1       |
| C 1079 | CHIP CAP.   | 0.01uF  | 16V | B    | GRM36B103K16PT  | K22128804 |           | 1-   | B    | a2       |
| C 1080 | CHIP CAP.   | 100pF   | 50V | CH   | GRM36CH101J50PT | K22178236 |           | 1-   | B    | a2       |
| C 1081 | CHIP CAP.   | 2pF     | 50V | CK   | GRM36CK020C50PT | K22178204 |           | 1-   | B    | c2       |
| C 1082 | CHIP CAP.   | 5pF     | 50V | CH   | UMK105CH050CW-F | K22178253 |           | 1-   | B    | c2       |
| C 1083 | CHIP CAP.   | 3pF     | 50V | CJ   | UMK105CJ030CW-F | K22178251 |           | 1-   | B    | c2       |
| C 1084 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 1-   | B    | c2       |
| C 1085 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 1-   | B    | c1       |
| C 1086 | CHIP CAP.   | 0.1uF   | 10V | B    | GRM36B104K10PT  | K22108802 |           | 1-   | B    | c1       |
| C 1087 | CHIP CAP.   | 0.1uF   | 10V | B    | GRM36B104K10PT  | K22108802 |           | 1-   | B    | a2       |
| C 1090 | CHIP CAP.   | 10pF    | 50V | CH   | UMK105CH100DW-F | K22178258 |           | 1    | A    | B1       |
| C 1090 | CHIP CAP.   | 10pF    | 50V | CH   | UMK105CH100DW-F | K22178258 | AUSTRALIA | 2-   | A    | B1       |
| C 1090 | CHIP CAP.   | 10pF    | 50V | CH   | UMK105CH100DW-F | K22178258 | EUROPE    | 2-   | A    | B1       |
| C 1090 | CHIP CAP.   | 10pF    | 50V | CH   | UMK105CH100DW-F | K22178258 | EXPORT    | 2-   | A    | B1       |
| C 1091 | CHIP CAP.   | 33pF    | 50V | CH   | GRM36CH330J50PT | K22178224 |           | 1    | A    | B1       |
| C 1091 | CHIP CAP.   | 39pF    | 50V | CH   | GRM36CH390J50PT | K22178226 | AUSTRALIA | 2-   | A    | B1       |
| C 1091 | CHIP CAP.   | 39pF    | 50V | CH   | GRM36CH390J50PT | K22178226 | EUROPE    | 2-   | A    | B1       |
| C 1091 | CHIP CAP.   | 39pF    | 50V | CH   | GRM36CH390J50PT | K22178226 | EXPORT    | 2-   | A    | B1       |
| C 1091 | CHIP CAP.   | 39pF    | 50V | CH   | GRM36CH390J50PT | K22178226 | USA       | 2-   | A    | B1       |
| C 1092 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 1-   | A    | B2       |
| C 1094 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 1-   | A    | C1       |
| C 1095 | CHIP CAP.   | 22pF    | 50V | CH   | GRM36CH220J50PT | K22178220 |           | 1-   | B    | a2       |
| C 1096 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 1-   | B    | a2       |

| REF.   | DESCRIPTION  | VALUE   | V/W  | TOL. | MFR'S DESIG     | VXSTD P/N | VERS.     | LOT. | SIDE | LAY ADR. |
|--------|--------------|---------|------|------|-----------------|-----------|-----------|------|------|----------|
| C 1097 | CHIP CAP.    | 0.001uF | 50V  | B    | GRM36B102K50PT  | K22178809 |           | 1-   | B    | b2       |
| C 1098 | CHIP CAP.    | 0.01uF  | 16V  | B    | GRM36B103K16PT  | K22128804 |           | 1-   | B    | b2       |
| C 1099 | CHIP CAP.    | 1uF     | 6.3V | B    | GRM39B105K6.3PT | K22084801 |           | 1-   | A    | A2       |
| C 1100 | CHIP TA.CAP. | 22uF    | 4V   |      | TESVSP0G226M-8R | K78060047 |           | 1-   | B    | b2       |
| C 1101 | CHIP CAP.    | 0.1uF   | 10V  | B    | GRM36B104K10PT  | K22108802 |           | 1-   | B    | c1       |
| C 1102 | CHIP CAP.    | 220pF   | 25V  | CH   | TMK105CH221JW-F | K22148246 |           | 1-   | B    | b2       |
| C 1103 | CHIP CAP.    | 0.01uF  | 16V  | B    | GRM36B103K16PT  | K22128804 |           | 1-   | A    | A2       |
| C 1105 | CHIP CAP.    | 33pF    | 50V  | CH   | GRM36CH330J50PT | K22178224 |           | 1    | A    | C1       |
| C 1105 | CHIP CAP.    | 33pF    | 50V  | CH   | GRM36CH330J50PT | K22178224 | AUSTRALIA | 2-   | A    | C1       |
| C 1105 | CHIP CAP.    | 33pF    | 50V  | CH   | GRM36CH330J50PT | K22178224 | EUROPE    | 2-   | A    | C1       |
| C 1105 | CHIP CAP.    | 33pF    | 50V  | CH   | GRM36CH330J50PT | K22178224 | EXPORT    | 2-   | A    | C1       |
| C 1105 | CHIP CAP.    | 33pF    | 50V  | CH   | GRM36CH330J50PT | K22178224 | USA       | 2-   | A    | C1       |
| C 1106 | CHIP CAP.    | 18pF    | 50V  | CH   | GRM36CH180J50PT | K22178218 |           | 1    | A    | C1       |
| C 1106 | CHIP CAP.    | 18pF    | 50V  | CH   | GRM36CH180J50PT | K22178218 | AUSTRALIA | 2-   | A    | C1       |
| C 1106 | CHIP CAP.    | 18pF    | 50V  | CH   | GRM36CH180J50PT | K22178218 | EUROPE    | 2-   | A    | C1       |
| C 1106 | CHIP CAP.    | 18pF    | 50V  | CH   | GRM36CH180J50PT | K22178218 | EXPORT    | 2-   | A    | C1       |
| C 1106 | CHIP CAP.    | 18pF    | 50V  | CH   | GRM36CH180J50PT | K22178218 | USA       | 2-   | A    | C1       |
| C 1107 | CHIP CAP.    | 0.001uF | 50V  | B    | GRM36B102K50PT  | K22178809 |           | 1-   | A    | C1       |
| C 1108 | CHIP CAP.    | 12pF    | 50V  | CH   | GRM36CH120J50PT | K22178214 |           | 1    | A    | B1       |
| C 1108 | CHIP CAP.    | 12pF    | 50V  | CH   | GRM36CH120J50PT | K22178214 | AUSTRALIA | 2-   | A    | B1       |
| C 1108 | CHIP CAP.    | 12pF    | 50V  | CH   | GRM36CH120J50PT | K22178214 | EUROPE    | 2-   | A    | B1       |
| C 1108 | CHIP CAP.    | 12pF    | 50V  | CH   | GRM36CH120J50PT | K22178214 | EXPORT    | 2-   | A    | B1       |
| C 1108 | CHIP CAP.    | 10pF    | 50V  | CH   | GRM36CH100D50PT | K22178212 | USA       | 2-   | A    | B1       |
| C 1109 | CHIP CAP.    | 27pF    | 50V  | CH   | GRM36CH270J50PT | K22178222 |           | 1    | A    | B1       |
| C 1109 | CHIP CAP.    | 27pF    | 50V  | CH   | GRM36CH270J50PT | K22178222 | AUSTRALIA | 2-   | A    | B1       |
| C 1109 | CHIP CAP.    | 27pF    | 50V  | CH   | GRM36CH270J50PT | K22178222 | EUROPE    | 2-   | A    | B1       |
| C 1109 | CHIP CAP.    | 27pF    | 50V  | CH   | GRM36CH270J50PT | K22178222 | EXPORT    | 2-   | A    | B1       |
| C 1109 | CHIP CAP.    | 27pF    | 50V  | CH   | GRM36CH270J50PT | K22178222 | USA       | 2-   | A    | B1       |
| C 1110 | CHIP CAP.    | 0.01uF  | 16V  | B    | GRM36B103K16PT  | K22128804 |           | 1-   | A    | B1       |
| C 1111 | CHIP CAP.    | 47pF    | 50V  | CH   | GRM36CH470J50PT | K22178228 |           | 1-   | A    | B1       |
| C 1112 | CHIP CAP.    | 0.01uF  | 16V  | B    | GRM36B103K16PT  | K22128804 |           | 1-   | A    | B1       |
| C 1113 | CHIP CAP.    | 2pF     | 50V  | CK   | GRM36CK020C50PT | K22178204 | EUROPE    | 3-   | B    | a1       |
| C 1114 | CHIP TA.CAP. | 4.7uF   | 6.3V |      | TESVSP0J475M-8R | K78080053 |           | 1-   | A    | C1       |
| C 1115 | CHIP CAP.    | 100pF   | 50V  | CH   | GRM36CH101J50PT | K22178236 |           | 1-   | B    | b2       |
| C 1116 | CHIP CAP.    | 100pF   | 50V  | CH   | GRM36CH101J50PT | K22178236 |           | 1-   | B    | b1       |
| C 1117 | CHIP CAP.    | 100pF   | 50V  | CH   | GRM36CH101J50PT | K22178236 |           | 1-   | B    | b2       |
| C 1118 | CHIP CAP.    | 10pF    | 50V  | CH   | UMK105CH100DW-F | K22178258 |           | 1-   | B    | c2       |
| C 1119 | CHIP CAP.    | 22pF    | 50V  | CH   | GRM36CH220J50PT | K22178220 |           | 1-   | B    | c2       |
| C 1120 | CHIP CAP.    | 0.001uF | 50V  | B    | GRM36B102K50PT  | K22178809 |           | 1-   | B    | b1       |
| C 1121 | CHIP TA.CAP. | 1.5uF   | 10V  |      | TESVSP1A155M-8R | K78100050 |           | 1-   | B    | c1       |
| C 1122 | CHIP CAP.    | 7pF     | 50V  | CH   | UMK105CH070DW-F | K22178255 |           | 1-   | B    | b1       |
| C 1123 | CHIP CAP.    | 0.001uF | 50V  | B    | GRM36B102K50PT  | K22178809 |           | 1-   | B    | c2       |
| C 1124 | CHIP CAP.    | 12pF    | 50V  | CH   | GRM36CH120J50PT | K22178214 |           | 1    | A    | B1       |
| C 1124 | CHIP CAP.    | 10pF    | 50V  | CH   | UMK105CH100DW-F | K22178258 | AUSTRALIA | 2-   | A    | B1       |
| C 1124 | CHIP CAP.    | 10pF    | 50V  | CH   | UMK105CH100DW-F | K22178258 | EUROPE    | 2-   | A    | B1       |
| C 1124 | CHIP CAP.    | 10pF    | 50V  | CH   | UMK105CH100DW-F | K22178258 | EXPORT    | 2-   | A    | B1       |
| C 1124 | CHIP CAP.    | 10pF    | 50V  | CH   | UMK105CH100DW-F | K22178258 | USA       | 2-   | A    | B1       |
| C 1125 | CHIP CAP.    | 39pF    | 50V  | CH   | GRM36CH390J50PT | K22178226 |           | 1    | A    | B1       |
| C 1125 | CHIP CAP.    | 39pF    | 50V  | CH   | GRM36CH390J50PT | K22178226 | AUSTRALIA | 2-   | A    | B1       |
| C 1125 | CHIP CAP.    | 39pF    | 50V  | CH   | GRM36CH390J50PT | K22178226 | EUROPE    | 2-   | A    | B1       |
| C 1125 | CHIP CAP.    | 39pF    | 50V  | CH   | GRM36CH390J50PT | K22178226 | EXPORT    | 2-   | A    | B1       |
| C 1125 | CHIP CAP.    | 39pF    | 50V  | CH   | GRM36CH390J50PT | K22178226 | USA       | 2-   | A    | B1       |
| C 1126 | CHIP CAP.    | 33pF    | 50V  | CH   | GRM36CH330J50PT | K22178224 |           | 1-   | A    | B1       |
| C 1127 | CHIP CAP.    | 0.001uF | 50V  | B    | GRM36B102K50PT  | K22178809 |           | 1-   | A    | B1       |
| C 1129 | CHIP CAP.    | 0.001uF | 50V  | B    | GRM36B102K50PT  | K22178809 |           | 1-   | A    | B1       |
| C 1130 | CHIP CAP.    | 47pF    | 50V  | CH   | GRM36CH470J50PT | K22178228 |           | 1-   | A    | B1       |
| C 1132 | CHIP CAP.    | 0.01uF  | 16V  | B    | GRM36B103K16PT  | K22128804 |           | 1-   | A    | B1       |
| C 1133 | CHIP CAP.    | 0.001uF | 50V  | B    | GRM36B102K50PT  | K22178809 |           | 1-   | A    | C1       |
| C 1134 | CHIP CAP.    | 68pF    | 50V  | CH   | GRM36CH680J50PT | K22178232 |           | 1-   | A    | B1       |
| C 1136 | CHIP CAP.    | 0.1uF   | 10V  | B    | GRM36B104K10PT  | K22108802 |           | 1-   | A    | C1       |
| C 1137 | CHIP CAP.    | 0.001uF | 50V  | B    | GRM36B102K50PT  | K22178809 |           | 1-   | A    | C1       |
| C 1138 | CHIP TA.CAP. | 0.1uF   | 20V  |      | SKF-1D104M-RP   | K78130049 |           | 1-   | B    | b1       |

# RF Unit

| REF.   | DESCRIPTION  | VALUE   | V/W  | TOL. | MFR'S DESIG     | VXSTD P/N | VERS.     | LOT. | SIDE | LAY ADR. |
|--------|--------------|---------|------|------|-----------------|-----------|-----------|------|------|----------|
| C 1139 | CHIP TA.CAP. | 0.1uF   | 20V  |      | SKF-1D104M-RP   | K78130049 |           | 1-   | B    | b1       |
| C 1140 | CHIP CAP.    | 0.001uF | 50V  | B    | GRM36B102K50PT  | K22178809 |           | 1-   | B    | b1       |
| C 1141 | CHIP CAP.    | 1uF     | 6.3V | B    | GRM39B105K6.3PT | K22084801 |           | 1-   | B    | b1       |
| C 1142 | CHIP CAP.    | 1uF     | 6.3V | B    | GRM39B105K6.3PT | K22084801 |           | 1-   | B    | b1       |
| C 1143 | CHIP CAP.    | 1uF     | 6.3V | B    | GRM39B105K6.3PT | K22084801 |           | 1-   | B    | b1       |
| C 1144 | CHIP TA.CAP. | 0.1uF   | 20V  |      | SKF-1D104M-RP   | K78130049 |           | 1-   | B    | b1       |
| C 1145 | CHIP CAP.    | 0.01uF  | 16V  | B    | GRM36B103K16PT  | K22128804 |           | 1-   | B    | b1       |
| C 1146 | CHIP CAP.    | 0.033uF | 10V  | B    | GRM36B333K10PT  | K22108803 |           | 1-   | B    | b1       |
| C 1147 | CHIP CAP.    | 12pF    | 50V  | CH   | GRM36CH120J50PT | K22178214 |           | 1-   | A    | B1       |
| C 1148 | CHIP CAP.    | 0.01uF  | 16V  | B    | GRM36B103K16PT  | K22128804 |           | 1-   | A    | C1       |
| C 1150 | CHIP CAP.    | 12pF    | 50V  | CH   | GRM36CH120J50PT | K22178214 |           | 1-   | A    | B1       |
| C 1151 | CHIP CAP.    | 12pF    | 50V  | CH   | GRM36CH120J50PT | K22178214 |           | 1-   | A    | B1       |
| C 1152 | CHIP CAP.    | 0.001uF | 50V  | B    | GRM36B102K50PT  | K22178809 |           | 1-   | A    | B1       |
| C 1153 | CHIP CAP.    | 4pF     | 50V  | CH   | UMK105CH040CW-F | K22178252 |           | 1-   | A    | B1       |
| C 1154 | CHIP CAP.    | 0.001uF | 50V  | B    | GRM36B102K50PT  | K22178809 |           | 1-   | A    | B1       |
| C 1155 | CHIP CAP.    | 75pF    | 50V  | CH   | GRM39CH750J50PT | K22174232 |           | 1-   | A    | B2       |
| C 1156 | CHIP CAP.    | 33pF    | 50V  | CH   | GRM36CH330J50PT | K22178224 |           | 1-   | A    | B1       |
| C 1157 | CHIP CAP.    | 39pF    | 50V  | CH   | GRM36CH390J50PT | K22178226 |           | 1-   | A    | B1       |
| C 1158 | CHIP CAP.    | 0.1uF   | 10V  | B    | GRM36B104K10PT  | K22108802 |           | 1-   | A    | C1       |
| C 1159 | CHIP CAP.    | 0.001uF | 50V  | B    | GRM36B102K50PT  | K22178809 |           | 1-   | A    | B1       |
| C 1160 | CHIP CAP.    | 56pF    | 50V  | CH   | GRM36CH560J50PT | K22178230 |           | 1-   | A    | B2       |
| C 1161 | CHIP CAP.    | 100pF   | 50V  | CH   | GRM36CH101J50PT | K22178236 |           | 1-   | A    | B2       |
| C 1162 | CHIP CAP.    | 0.001uF | 50V  | B    | GRM36B102K50PT  | K22178809 |           | 1-   | B    | b1       |
| C 1163 | CHIP CAP.    | 0.001uF | 50V  | B    | GRM36B102K50PT  | K22178809 |           | 1-   | B    | b1       |
| C 1164 | CHIP CAP.    | 0.001uF | 50V  | B    | GRM36B102K50PT  | K22178809 |           | 1-   | B    | b1       |
| C 1165 | CHIP CAP.    | 0.001uF | 50V  | B    | GRM36B102K50PT  | K22178809 |           | 1-   | A    | B2       |
| C 1166 | CHIP CAP.    | 0.01uF  | 16V  | B    | GRM36B103K16PT  | K22128804 |           | 1-   | A    | B2       |
| C 1168 | CHIP CAP.    | 1pF     | 50V  | CK   | GRM36CK010B50PT | K22178287 |           | 1-   | A    | A1       |
| C 1170 | CHIP CAP.    | 0.5pF   | 50V  | CK   | GRM36CK0R5B50PT | K22178285 |           | 1    | A    | A2       |
| C 1170 | CHIP CAP.    | 0.5pF   | 50V  | CK   | GRM36CK0R5B50PT | K22178285 | AUSTRALIA | 2-   | A    | A2       |
| C 1170 | CHIP CAP.    | 0.5pF   | 50V  | CK   | GRM36CK0R5B50PT | K22178285 | EUROPE    | 2-   | A    | A2       |
| C 1170 | CHIP CAP.    | 0.5pF   | 50V  | CK   | GRM36CK0R5B50PT | K22178285 | EXPORT    | 2-   | A    | A2       |
| C 1170 | CHIP CAP.    | 2pF     | 50V  | CK   | GRM36CK020B50PT | K22178289 | USA       | 2-   | A    | A2       |
| C 1171 | CHIP CAP.    | 0.001uF | 50V  | B    | GRM36B102K50PT  | K22178809 |           | 1-   | A    | A1       |
| C 1172 | CHIP CAP.    | 7pF     | 50V  | CH   | UMK105CH070DW-F | K22178255 |           | 1-   | A    | A1       |
| C 1174 | CHIP CAP.    | 12pF    | 50V  | CH   | GRM36CH120J50PT | K22178214 |           | 1-   | A    | A1       |
| C 1175 | CHIP CAP.    | 0.5pF   | 50V  | CK   | GRM36CK0R5B50PT | K22178285 |           | 1-   | A    | A2       |
| C 1176 | CHIP CAP.    | 47pF    | 50V  | CH   | GRM36CH470J50PT | K22178228 |           | 1-   | A    | B1       |
| C 1177 | CHIP CAP.    | 0.001uF | 50V  | B    | GRM36B102K50PT  | K22178809 |           | 1-   | A    | B1       |
| C 1178 | CHIP CAP.    | 0.001uF | 50V  | B    | GRM36B102K50PT  | K22178809 |           | 1-   | A    | A1       |
| C 1179 | CHIP CAP.    | 0.001uF | 50V  | B    | GRM36B102K50PT  | K22178809 |           | 1-   | A    | A1       |
| C 1180 | CHIP CAP.    | 0.001uF | 50V  | B    | GRM36B102K50PT  | K22178809 |           | 1-   | A    | A2       |
| C 1181 | CHIP CAP.    | 8pF     | 50V  | CH   | GRM36CH080D50PT | K22178210 |           | 1-   | A    | A1       |
| C 1182 | CHIP CAP.    | 22pF    | 50V  | CH   | GRM36CH220J50PT | K22178220 |           | 1-   | A    | A2       |
| C 1183 | CHIP CAP.    | 0.01uF  | 16V  | B    | GRM36B103K16PT  | K22128804 |           | 1-   | A    | B2       |
| C 1184 | CHIP CAP.    | 100pF   | 50V  | CH   | GRM36CH101J50PT | K22178236 |           | 1-   | A    | B2       |
| C 1185 | CHIP CAP.    | 0.1uF   | 10V  | B    | GRM36B104K10PT  | K22108802 |           | 1-   | A    | A2       |
| C 1186 | CHIP CAP.    | 68pF    | 50V  | CH   | GRM36CH680J50PT | K22178232 |           | 1-   | A    | A2       |
| C 1187 | CHIP TA.CAP. | 22uF    | 4V   |      | TESVSP0G226M-8R | K78060047 |           | 1-   | B    | b2       |
| C 1188 | CHIP TA.CAP. | 22uF    | 4V   |      | TESVSP0G226M-8R | K78060047 |           | 1-   | B    | b2       |
| C 1189 | CHIP CAP.    | 0.001uF | 50V  | B    | GRM36B102K50PT  | K22178809 |           | 1-   | B    | b2       |
| C 1190 | CHIP CAP.    | 1pF     | 50V  | CK   | GRM36CK010B50PT | K22178287 |           | 1-   | A    | A1       |
| C 1191 | CHIP CAP.    | 0.5pF   | 50V  | CK   | GRM36CK0R5B50PT | K22178285 |           | 1-   | A    | A1       |
| C 1193 | CHIP CAP.    | 1pF     | 50V  | CK   | GRM36CK010B50PT | K22178287 |           | 1-   | A    | A1       |
| C 1194 | CHIP CAP.    | 0.5pF   | 50V  | CK   | GRM36CK0R5B50PT | K22178285 |           | 1-   | A    | A1       |
| C 1195 | CHIP CAP.    | 7pF     | 50V  | CH   | UMK105CH070DW-F | K22178255 |           | 1-   | A    | A1       |
| C 1196 | CHIP CAP.    | 0.001uF | 50V  | B    | GRM36B102K50PT  | K22178809 |           | 1-   | A    | A1       |
| C 1197 | CHIP CAP.    | 100pF   | 50V  | CH   | GRM36CH101J50PT | K22178236 |           | 1-   | A    | A1       |
| C 1198 | CHIP CAP.    | 15pF    | 50V  | CH   | GRM36CH150J50PT | K22178216 |           | 1-   | A    | A1       |
| C 1199 | CHIP CAP.    | 15pF    | 50V  | CH   | GRM36CH150J50PT | K22178216 |           | 1-   | A    | A1       |
| C 1200 | CHIP CAP.    | 18pF    | 50V  | CH   | GRM36CH180J50PT | K22178218 |           | 1-   | A    | A1       |
| C 1201 | CHIP CAP.    | 7pF     | 50V  | CH   | UMK105CH070DW-F | K22178255 |           | 1-   | A    | A1       |

| REF.   | DESCRIPTION | VALUE   | V/W | TOL. | MFR'S DESIG     | VXSTD P/N | VERS.     | LOT. | SIDE | LAY ADR. |
|--------|-------------|---------|-----|------|-----------------|-----------|-----------|------|------|----------|
| C 1202 | CHIP CAP.   | 18pF    | 50V | CH   | GRM36CH180J50PT | K22178218 |           | 1-   | A    | A2       |
| C 1203 | CHIP CAP.   | 8pF     | 50V | CH   | GRM36CH080D50PT | K22178210 |           | 1-   | A    | A1       |
| C 1204 | CHIP CAP.   | 12pF    | 50V | CH   | GRM36CH120J50PT | K22178214 |           | 1-   | A    | A1       |
| C 1205 | CHIP CAP.   | 33pF    | 50V | CH   | GRM36CH330J50PT | K22178224 |           | 1-   | A    | A1       |
| C 1206 | CHIP CAP.   | 33pF    | 50V | CH   | GRM36CH330J50PT | K22178224 |           | 1-   | A    | A1       |
| C 1207 | CHIP CAP.   | 12pF    | 50V | CH   | GRM36CH120J50PT | K22178214 |           | 1-   | A    | A1       |
| C 1209 | CHIP CAP.   | 120pF   | 50V | CH   | UMK105CH121JW-F | K22178284 |           | 1-   | A    | A2       |
| C 1210 | CHIP CAP.   | 10pF    | 50V | CH   | UMK105CH100DW-F | K22178258 |           | 1-   | A    | A1       |
| C 1212 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 1-   | A    | B2       |
| C 1213 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 1-   | A    | B2       |
| C 1214 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 1-   | A    | B2       |
| C 1215 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 1-   | B    | b2       |
| C 1216 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 1-   | A    | B2       |
| C 1217 | CHIP CAP.   | 3pF     | 50V | CJ   | UMK105CJ030CW-F | K22178251 |           | 1-   | A    | C1       |
| C 1218 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 1-   | A    | A2       |
| C 1220 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 1-   | A    | B1       |
| C 1221 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 1-   | B    | b2       |
| C 1222 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 1-   | B    | b1       |
| C 1223 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 1-   | B    | a1       |
| C 1224 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 1-   | B    | a1       |
| C 1225 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 1-   | B    | b1       |
| C 1226 | CHIP CAP.   | 7pF     | 50V | CH   | UMK105CH070DW-F | K22178255 |           | 1-   | A    | B2       |
| C 1227 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 1-   | B    | b1       |
| C 1228 | CHIP CAP.   | 33pF    | 50V | CH   | GRM36CH330J50PT | K22178224 |           | 1    | A    | B1       |
| C 1228 | CHIP CAP.   | 33pF    | 50V | CH   | GRM36CH330J50PT | K22178224 | AUSTRALIA | 2-   | A    | B1       |
| C 1228 | CHIP CAP.   | 33pF    | 50V | CH   | GRM36CH330J50PT | K22178224 | EUROPE    | 2-   | A    | B1       |
| C 1228 | CHIP CAP.   | 33pF    | 50V | CH   | GRM36CH330J50PT | K22178224 | EXPORT    | 2-   | A    | B1       |
| C 1228 | CHIP CAP.   | 33pF    | 50V | CH   | GRM36CH330J50PT | K22178224 | USA       | 2-   | A    | B1       |
| C 1229 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 1-   | A    | A2       |
| C 1231 | CHIP CAP.   | 47pF    | 50V | CH   | GRM36CH470J50PT | K22178228 |           | 1-   | A    | B2       |
| C 1232 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 1-   | A    | A1       |
| C 1233 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 3-   | B    | b2       |
| C 1234 | CHIP CAP.   | 0.001uF | 50V | B    | GRM36B102K50PT  | K22178809 |           | 3-   | A    | B2       |
| C 1240 | CHIP CAP.   | 0.01uF  | 16V | B    | GRM36B103K16PT  | K22128804 | USA       | 2-   |      |          |
| D 1001 | DIODE       |         |     |      | 1SS362 TE85R    | G2070268  |           | 1-   | B    | b1       |
| D 1002 | DIODE       |         |     |      | 1SS362 TE85R    | G2070268  |           | 1-   | B    | a1       |
| D 1003 | DIODE       |         |     |      | 1SV271 TPH3     | G2070476  |           | 1-   | B    | c1       |
| D 1004 | DIODE       |         |     |      | DAN222M T2L     | G2070936  |           | 1-   | B    | a1       |
| D 1005 | DIODE       |         |     |      | M1FM3-4063      | G2070804  |           | 1-   | B    | a2       |
| D 1006 | DIODE       |         |     |      | 1SV323(TPH3)    | G2071006  |           | 1-   | B    | b1       |
| D 1007 | DIODE       |         |     |      | 1SV323(TPH3)    | G2071006  |           | 1-   | B    | b1       |
| D 1008 | DIODE       |         |     |      | 1SV325(TPH3)    | G2070848  |           | 1-   | B    | a1       |
| D 1009 | DIODE       |         |     |      | 1SV325(TPH3)    | G2070848  |           | 1-   | B    | a1       |
| D 1010 | DIODE       |         |     |      | JDS2S03S(TAPE)  | G2071062  |           | 1-   | B    | a1       |
| D 1011 | DIODE       |         |     |      | HVC355B(TAPE)   | G2070588  |           | 1-   | B    | a1       |
| D 1012 | DIODE       |         |     |      | HVC355B(TAPE)   | G2070588  |           | 1-   | B    | a1       |
| D 1013 | DIODE       |         |     |      | JDS2S03S(TAPE)  | G2071062  |           | 1-   | B    | a1       |
| D 1014 | DIODE       |         |     |      | HVR100-8TRU     | G2070540  |           | 1-   | B    | a1       |
| D 1015 | DIODE       |         |     |      | DAN222M T2L     | G2070936  |           | 1-   | B    | a1       |
| D 1016 | DIODE       |         |     |      | 1SV331(TPH3,F)  | G2071044  |           | 1-   | B    | c2       |
| D 1017 | DIODE       |         |     |      | 1SV331(TPH3,F)  | G2071044  |           | 1-   | B    | c2       |
| D 1018 | DIODE       |         |     |      | 1SV323(TPH3)    | G2071006  |           | 1-   | B    | c1       |
| D 1019 | DIODE       |         |     |      | 1SV323(TPH3)    | G2071006  |           | 1-   | B    | c1       |
| D 1020 | DIODE       |         |     |      | 1SV325(TPH3)    | G2070848  |           | 1-   | B    | a1       |
| D 1021 | DIODE       |         |     |      | 1SV325(TPH3)    | G2070848  |           | 1-   | B    | a2       |
| D 1022 | DIODE       |         |     |      | HVC355B(TAPE)   | G2070588  |           | 1-   | B    | a1       |
| D 1023 | DIODE       |         |     |      | HVC355B(TAPE)   | G2070588  |           | 1-   | B    | a2       |
| D 1024 | DIODE       |         |     |      | JDS2S03S(TAPE)  | G2071062  |           | 1-   | B    | a2       |
| D 1025 | DIODE       |         |     |      | 1SV325(TPH3)    | G2070848  |           | 1-   | B    | a2       |
| D 1026 | DIODE       |         |     |      | 1SV325(TPH3)    | G2070848  |           | 1-   | B    | a2       |
| D 1027 | DIODE       |         |     |      | 1SS400G T2R     | G2070934  |           | 1-   | B    | c2       |
| D 1028 | DIODE       |         |     |      | 1SS400G T2R     | G2070934  |           | 1-   | B    | c2       |

# RF Unit

| REF.   | DESCRIPTION    | VALUE    | V/W | TOL. | MFR'S DESIG         | VXSTD P/N | VERS.     | LOT. | SIDE | LAY ADR. |
|--------|----------------|----------|-----|------|---------------------|-----------|-----------|------|------|----------|
| D 1029 | DIODE          |          |     |      | DAN222M T2L         | G2070936  |           | 1-   | B    | a2       |
| D 1030 | DIODE          |          |     |      | 1SS400G T2R         | G2070934  |           | 1-   | B    | a2       |
| D 1031 | DIODE          |          |     |      | DAN222M T2L         | G2070936  |           | 1-   | B    | a2       |
| D 1032 | DIODE          |          |     |      | 1SS400G T2R         | G2070934  |           | 1-   | B    | a2       |
| D 1033 | DIODE          |          |     |      | DAN222M T2L         | G2070936  |           | 1-   | B    | a2       |
| D 1034 | DIODE          |          |     |      | DAN222M T2L         | G2070936  |           | 1-   | B    | b1       |
| D 1035 | DIODE          |          |     |      | HN2D01FUTE85R       | G2070348  |           | 1-   | B    | b2       |
| D 1036 | DIODE          |          |     |      | HVC359 TRF          | G2070708  |           | 1-   | B    | b2       |
| D 1037 | DIODE          |          |     |      | DAN222M T2L         | G2070936  |           | 1-   | B    | b1       |
| D 1038 | DIODE          |          |     |      | JDS2S03S(TAPE)      | G2071062  |           | 1-   | A    | B1       |
| D 1040 | DIODE          |          |     |      | 1SS314 TPH3         | G2070122  |           | 1-   | A    | B1       |
| D 1041 | DIODE          |          |     |      | 1SS314 TPH3         | G2070122  |           | 1-   | A    | A1       |
| D 1042 | DIODE          |          |     |      | DAN222M T2L         | G2070936  |           | 1-   | B    | a1       |
| D 1043 | DIODE          |          |     |      | RB751S-40TE61       | G2070850  |           | 1-   | A    | A1       |
| D 1044 | DIODE          |          |     |      | RB751S-40TE61       | G2070850  |           | 1-   | A    | A1       |
| D 1045 | DIODE          |          |     |      | RB751S-40TE61       | G2070850  |           | 1-   | A    | A2       |
| D 1046 | DIODE          |          |     |      | RLS135 TE-11        | G2070128  |           | 1-   | A    | B1       |
| D 1047 | DIODE          |          |     |      | 1SV307(TPH3)        | G2070638  |           | 1-   | A    | B1       |
| D 1048 | DIODE          |          |     |      | 1SV271 TPH3         | G2070476  |           | 1-   | A    | A1       |
| D 1049 | DIODE          |          |     |      | RLS135 TE-11        | G2070128  |           | 1-   | A    | B2       |
| D 1050 | DIODE          |          |     |      | 1SV307(TPH3)        | G2070638  |           | 1-   | A    | A1       |
| D 1051 | DIODE          |          |     |      | RLS135 TE-11        | G2070128  |           | 1-   | A    | B2       |
| D 1052 | DIODE          |          |     |      | 1SV307(TPH3)        | G2070638  |           | 1-   | A    | B2       |
| D 1053 | DIODE          |          |     |      | DAN222M T2L         | G2070936  |           | 1-   | B    | a1       |
| D 1054 | DIODE          |          |     |      | RB751S-40TE61       | G2070850  |           | 1-   | A    | A1       |
| D 1055 | DIODE          |          |     |      | 1SV271 TPH3         | G2070476  |           | 1    | A    | A1       |
| D 1055 | DIODE          |          |     |      | 1SV271 TPH3         | G2070476  | AUSTRALIA | 2-   | A    | A1       |
| D 1055 | DIODE          |          |     |      | 1SV271 TPH3         | G2070476  | EUROPE    | 2-   | A    | A1       |
| D 1055 | DIODE          |          |     |      | 1SV271 TPH3         | G2070476  | EXPORT    | 2-   | A    | A1       |
| D 1055 | DIODE          |          |     |      | RLS135 TE-11        | G2070128  | USA       | 2-   | A    | A1       |
| D 1056 | DIODE          |          |     |      | 1SS400G T2R         | G2070934  |           | 1-   | B    | b2       |
| D 1057 | DIODE          |          |     |      | DAN222M T2L         | G2070936  |           | 1-   | B    | b1       |
| D 1058 | DIODE          |          |     |      | DAN222M T2L         | G2070936  |           | 1-   | B    | b2       |
| D 1059 | DIODE          |          |     |      | EDZ TE61 3.9B       | G2071004  |           | 1    |      |          |
| D 1059 | DIODE          |          |     |      | EDZ TE61 5.1B       | G2070998  | AUSTRALIA | 2    |      |          |
| D 1059 | DIODE          |          |     |      | EDZ TE61 5.1B       | G2070998  | EUROPE    | 2    |      |          |
| D 1059 | DIODE          |          |     |      | EDZ TE61 5.1B       | G2070998  | EXPORT    | 2    |      |          |
| D 1059 | DIODE          |          |     |      | EDZ TE61 5.1B       | G2070998  | USA       | 2    |      |          |
| D 1060 | DIODE          |          |     |      | RB751S-40TE61       | G2070850  |           | 1-   | A    | B2       |
| D 1061 | DIODE          |          |     |      | 1SS400 TE61         | G2070634  | USA       | 2-   |      |          |
| FB1001 | CHIP COIL      |          |     |      | BLM21PG300SN1D      | L1690840  |           | 1-   | B    | a2       |
| FB1002 | CHIP COIL      |          |     |      | BLM21PG300SN1D      | L1690840  |           | 1-   | A    | A2       |
| FB1003 | CHIP COIL      |          |     |      | BLM21PG300SN1D      | L1690840  |           | 1-   | A    | C2       |
| HS1001 | HEATSINK PLATE |          |     |      |                     | RA0653300 |           | 1-   | B    | b1       |
| J 1001 | CONNECTOR      |          |     |      | MJC-040-T           | P0091401  |           | 1-   | A    | C2       |
| J 1002 | CONNECTOR      |          |     |      | IL-FPR-28S-VF-E1500 | P1091029  |           | 1-   | A    | A2       |
| J 1003 | CONNECTOR      |          |     |      | AXK6F10345YP        | P0091378  |           | 1-   | B    | b1       |
| J 1004 | CONNECTOR      |          |     |      | AXK6F10345YP        | P0091378  |           | 1-   | B    | a1       |
| L 1001 | M.RFC          | 0.1uH    |     |      | LK1608 R10K-T       | L1690407  |           | 1-   | B    | a1       |
| L 1002 | M.RFC          | 0.1uH    |     |      | LK1608 R10K-T       | L1690407  |           | 1-   | B    | a1       |
| L 1003 | M.RFC          | 0.0082uH |     |      | TFL0510-8N2         | L1690810  |           | 1-   | B    | c1       |
| L 1004 | M.RFC          | 0.0082uH |     |      | TFL0510-8N2         | L1690810  |           | 1-   | B    | c1       |
| L 1005 | CHIP COIL      | 0.0068uH |     |      | LQW1608A6N8C00      | L1690879  |           | 1-   | B    | b1       |
| L 1006 | M.RFC          | 0.0047uH |     |      | TFL0510-4N7         | L1690807  |           | 1-   | B    | c1       |
| L 1007 | M.RFC          | 0.0082uH |     |      | TFL0510-8N2         | L1690810  |           | 1-   | B    | c1       |
| L 1008 | CHIP COIL      | 0.033uH  |     |      | LQW1608A33NG00      | L1690886  |           | 1-   | B    | b1       |
| L 1008 | M.RFC          | 0.033uH  |     |      | HK1608 33NJ-T       | L1690522  |           | 3-   | B    | b1       |
| L 1009 | M.RFC          | 0.15uH   |     |      | LK1608 R15K-T       | L1690409  |           | 1-   | B    | a1       |
| L 1010 | M.RFC          | 0.1uH    |     |      | HK1608 R10J-T       | L1690528  |           | 1-   | B    | a1       |
| L 1011 | M.RFC          | 0.22uH   |     |      | LK1608 R22K-T       | L1690410  |           | 1-   | B    | a1       |
| L 1012 | M.RFC          | 120uH    |     |      | FLC32T-121J         | L1690228  |           | 1-   | B    | a1       |
| L 1013 | M.RFC          | 33uH     |     |      | LK1608 330M-T       | L1690690  |           | 1-   | B    | a1       |

| REF.   | DESCRIPTION | VALUE    | V/W | TOL. | MFR'S DESIG         | VXSTD P/N | VERS.     | LOT. | SIDE | LAY ADR. |
|--------|-------------|----------|-----|------|---------------------|-----------|-----------|------|------|----------|
| L 1014 | M.RFC       | 0.1uH    |     |      | LK1608 R10K-T       | L1690407  |           | 1-   | B    | a1       |
| L 1015 | M.RFC       | 0.01uH   |     |      | TFL0510-10N         | L1690811  |           | 1-   | B    | c1       |
| L 1016 | M.RFC       | 0.0068uH |     |      | TFL0510-6N8         | L1690809  |           | 1-   | B    | c1       |
| L 1017 | CHIP COIL   | 0.01uH   |     |      | LQW1608A10NG00      | L1690880  |           | 1-   | B    | b1       |
| L 1018 | CHIP COIL   | 0.01uH   |     |      | LQW1608A10NG00      | L1690880  |           | 1-   | B    | b1       |
| L 1019 | CHIP COIL   | 0.068uH  |     |      | LQW1608A68NG00      | L1690890  |           | 1-   | B    | a1       |
| L 1020 | CHIP COIL   | 0.1uH    |     |      | LQW1608AR10G00      | L1690892  |           | 1-   | B    | a1       |
| L 1021 | CHIP COIL   | 0.068uH  |     |      | LQW1608A68NG00      | L1690890  |           | 1-   | B    | a1       |
| L 1022 | CHIP COIL   | 0.1uH    |     |      | LQW1608AR10G00      | L1690892  |           | 1-   | B    | a2       |
| L 1023 | M.RFC       | 0.1uH    |     |      | LK1608 R10K-T       | L1690407  |           | 1-   | B    | a1       |
| L 1024 | M.RFC       | 33uH     |     |      | LK1608 330M-T       | L1690690  |           | 1-   | B    | a1       |
| L 1026 | M.RFC       | 0.0039uH |     |      | C1005C-3N9K         | L1691339  |           | 1-   | B    | c2       |
| L 1027 | M.RFC       | 0.0027uH |     |      | C1005C-2N7K         | L1691338  |           | 1-   | B    | c2       |
| L 1028 | CHIP COIL   | 0.01uH   |     |      | LQW1608A10NG00      | L1690880  |           | 1-   | B    | c1       |
| L 1029 | CHIP COIL   | 0.01uH   |     |      | LQW1608A10NG00      | L1690880  |           | 1-   | B    | c1       |
| L 1030 | CHIP COIL   | 0.068uH  |     |      | LQW1608A68NG00      | L1690890  |           | 1-   | B    | a2       |
| L 1031 | CHIP COIL   | 0.1uH    |     |      | LQW1608AR10G00      | L1690892  |           | 1-   | B    | a2       |
| L 1032 | M.RFC       | 33uH     |     |      | LK1608 330M-T       | L1690690  |           | 1-   | B    | a2       |
| L 1033 | M.RFC       | 0.0047uH |     |      | TFL0510-4N7         | L1690807  |           | 1-   | B    | c2       |
| L 1035 | M.RFC       | 0.027uH  |     |      | TFL0510-27N         | L1690816  |           | 1-   | A    | C1       |
| L 1036 | M.RFC       | 0.022uH  |     |      | TFL0510-22N         | L1690815  |           | 1-   | B    | a2       |
| L 1037 | M.RFC       | 0.022uH  |     |      | TFL0510-22N         | L1690815  |           | 1-   | B    | b2       |
| L 1038 | M.RFC       | 0.012uH  |     |      | TFL0510-12N         | L1690812  |           | 1-   | A    | C1       |
| L 1039 | COIL        |          |     |      | E2 0.3-1.4-6T-L     | L0022455  |           | 1-   | A    | B1       |
| L 1040 | M.RFC       | 4.7uH    |     |      | LK1608 4R7K-T       | L1690688  |           | 1    | A    | B1       |
| L 1040 | M.RFC       | 4.7uH    |     |      | LK1608 4R7K-T       | L1690688  | AUSTRALIA | 2-   | A    | B1       |
| L 1040 | M.RFC       | 4.7uH    |     |      | LK1608 4R7K-T       | L1690688  | EUROPE    | 2-   | A    | B1       |
| L 1040 | M.RFC       | 4.7uH    |     |      | LK1608 4R7K-T       | L1690688  | EXPORT    | 2-   | A    | B1       |
| L 1043 | M.RFC       | 470uH    |     |      | FLC32T-471J         | L1690235  |           | 1    | B    | b1       |
| L 1043 | M.RFC       | 470uH    |     |      | FLC32T-471J         | L1690235  | AUSTRALIA | 2-   | B    | b1       |
| L 1043 | M.RFC       | 470uH    |     |      | FLC32T-471J         | L1690235  | EUROPE    | 2-   | B    | b1       |
| L 1043 | M.RFC       | 470uH    |     |      | FLC32T-471J         | L1690235  | EXPORT    | 2-   | B    | b1       |
| L 1044 | M.RFC       | 0.022uH  |     |      | TFL0510-22N         | L1690815  |           | 1-   | B    | b1       |
| L 1045 | COIL        |          |     |      | E2 0.25-1.85-8.5T-L | L0022576  |           | 1-   | A    | B1       |
| L 1046 | CHIP COIL   | 0.0068uH |     |      | LQW1608A6N8C00      | L1690879  |           | 1    | A    | B1       |
| L 1046 | CHIP COIL   | 0.0068uH |     |      | LQW1608A6N8C00      | L1690879  | AUSTRALIA | 2-   | A    | B1       |
| L 1046 | CHIP COIL   | 0.0068uH |     |      | LQW1608A6N8C00      | L1690879  | EUROPE    | 2-   | A    | B1       |
| L 1046 | CHIP COIL   | 0.0068uH |     |      | LQW1608A6N8C00      | L1690879  | EXPORT    | 2-   | A    | B1       |
| L 1046 | CHIP COIL   | 0.0068uH |     |      | LQW1608A6N8C00      | L1690879  | USA       | 2-   | A    | B1       |
| L 1047 | CHIP COIL   | 0.027uH  |     |      | LQW1608A27NG00      | L1690885  |           | 1    | A    | B1       |
| L 1047 | CHIP COIL   | 0.027uH  |     |      | LQW1608A27NG00      | L1690885  | AUSTRALIA | 2-   | A    | B1       |
| L 1047 | CHIP COIL   | 0.027uH  |     |      | LQW1608A27NG00      | L1690885  | EUROPE    | 2-   | A    | B1       |
| L 1047 | CHIP COIL   | 0.027uH  |     |      | LQW1608A27NG00      | L1690885  | EXPORT    | 2-   | A    | B1       |
| L 1047 | CHIP COIL   | 0.027uH  |     |      | LQW1608A27NG00      | L1690885  | USA       | 2-   | A    | B1       |
| L 1049 | M.RFC       | 0.22uH   |     |      | LK1608 R22K-T       | L1690410  |           | 1-   | A    | B1       |
| L 1050 | CHIP COIL   | 0.1uH    |     |      | LQW1608AR10G00      | L1690892  |           | 1-   | A    | B1       |
| L 1051 | COIL        |          |     |      | E2 0.4-1.3-2T-L     | L0022580  |           | 1-   | A    | B1       |
| L 1052 | M.RFC       | 4.7uH    |     |      | LK1608 4R7K-T       | L1690688  |           | 1-   | A    | B1       |
| L 1053 | COIL        |          |     |      | E2 0.3-0.9-3T-R     | L0022389  |           | 1    | A    | B1       |
| L 1053 | COIL        |          |     |      | E2 0.3-0.9-3T-R     | L0022389  | AUSTRALIA | 2-   | A    | B1       |
| L 1053 | COIL        |          |     |      | E2 0.3-0.9-3T-R     | L0022389  | EUROPE    | 2-   | A    | B1       |
| L 1053 | COIL        |          |     |      | E2 0.3-0.9-3T-R     | L0022389  | EXPORT    | 2-   | A    | B1       |
| L 1053 | COIL        |          |     |      | E2 0.4-1.3-2T-L     | L0022580  | USA       | 2-   | A    | B1       |
| L 1054 | COIL        |          |     |      | E2 0.3-1.0-6T-L     | L0022490  |           | 1-   | A    | B1       |
| L 1055 | M.RFC       | 4.7uH    |     |      | LK1608 4R7K-T       | L1690688  |           | 1    | A    | B1       |
| L 1055 | M.RFC       | 4.7uH    |     |      | LK1608 4R7K-T       | L1690688  | AUSTRALIA | 2-   | A    | B1       |
| L 1055 | M.RFC       | 4.7uH    |     |      | LK1608 4R7K-T       | L1690688  | EUROPE    | 2-   | A    | B1       |
| L 1055 | M.RFC       | 4.7uH    |     |      | LK1608 4R7K-T       | L1690688  | EXPORT    | 2-   | A    | B1       |
| L 1056 | COIL        |          |     |      | E2 0.3-1.4-7T       | L0022923  |           | 1-   | A    | B2       |
| L 1057 | COIL        |          |     |      | E2 0.35-1.6-4T-L    | L0022456  |           | 1-   | A    | B1       |
| L 1058 | COIL        |          |     |      | E2 0.45-1.4-4T-L    | L0022391  |           | 1-   | A    | A1       |
| L 1059 | M.RFC       | 4.7uH    |     |      | LK1608 4R7K-T       | L1690688  |           | 1-   | A    | B1       |

# RF Unit

| REF.   | DESCRIPTION | VALUE                                                         | V/W | TOL. | MFR'S DESIG          | VXSTD P/N | VERS.                                          | LOT. | SIDE | LAY ADR. |
|--------|-------------|---------------------------------------------------------------|-----|------|----------------------|-----------|------------------------------------------------|------|------|----------|
| L 1060 | COIL        | 4.7uH<br>0.1uH                                                |     |      | E2 0.25-1.9-5.5T-R   | L0022610  |                                                | 1-   | A    | A1       |
| L 1061 | COIL        |                                                               |     |      | E2 0.25-1.9-5.5T-R   | L0022610  |                                                | 1-   | A    | A2       |
| L 1062 | M.RFC       |                                                               |     |      | LK1608 4R7K-T        | L1690688  |                                                | 1-   | A    | B2       |
| L 1063 | CHIP COIL   |                                                               |     |      | LQN21AR10J04         | L1690620  |                                                | 1-   | A    | B2       |
| L 1064 | COIL        |                                                               |     |      | E2 0.45-1.4-4T-L     | L0022391  |                                                | 1-   | A    | A1       |
| L 1065 | COIL        |                                                               |     |      | E2 0.35-1.6-4T-L     | L0022456  |                                                | 1-   | A    | A1       |
| L 1066 | COIL        |                                                               |     |      | E2 0.35-1.6-4T-L     | L0022456  |                                                | 1-   | A    | A1       |
| L 1067 | COIL        |                                                               |     |      | E2 0.35-1.6-5.5T-L   | L0022616  |                                                | 1-   | A    | A2       |
| L 1068 | COIL        |                                                               |     |      | E2 0.3-1.7-7T-R      | L0022372  |                                                | 1-   | A    | A1       |
| L 1069 | COIL        |                                                               |     |      | E2 0.35-1.6-7T-L     | L0022390  |                                                | 1-   | A    | A1       |
| L 1070 | COIL        | 0.012uH<br>0.012uH<br>0.012uH<br>0.012uH<br>0.012uH<br>0.01uH |     |      | E2 0.25-1.85-8.5T-L  | L0022576  | AUSTRALIA<br>EUROPE<br>EXPORT<br>USA<br>EUROPE | 1-   | A    | A2       |
| L 1071 | COIL        |                                                               |     |      | E2 0.25-1.9-10.5T-L  | L0022749  |                                                | 1-   | A    | A1       |
| L 1072 | M.RFC       |                                                               |     |      | ELJ-RE12NJF2         | L1690715  |                                                | 1    | A    | B1       |
| L 1072 | M.RFC       |                                                               |     |      | ELJ-RE12NJF2         | L1690715  |                                                | 2-   | A    | B1       |
| L 1072 | M.RFC       |                                                               |     |      | ELJ-RE12NJF2         | L1690715  |                                                | 2-   | A    | B1       |
| L 1072 | M.RFC       |                                                               |     |      | ELJ-RE12NJF2         | L1690715  |                                                | 2-   | A    | B1       |
| L 1072 | M.RFC       |                                                               |     |      | ELJ-RE12NJF2         | L1690715  |                                                | 2-   | A    | B1       |
| L 1073 | M.RFC       |                                                               |     |      | TFL0510-10N          | L1690811  |                                                | 3-   | A    | B1       |
| NF1001 | EMI FILTER  |                                                               |     |      | NFM4516P13C204FT1    | Q9000759  |                                                | 1-   | A    | B2       |
| Q 1001 | TRANSISTOR  |                                                               |     |      | 2SC5555ZD-TR         | G3355557  |                                                | 1-   | B    | b1       |
| Q 1002 | TRANSISTOR  |                                                               |     |      | 2SC5555ZD-TR         | G3355557  |                                                | 1-   | B    | a1       |
| Q 1003 | TRANSISTOR  |                                                               |     |      | 2SC5277-D2-TL        | G3352778B |                                                | 1-   | B    | c1       |
| Q 1004 | TRANSISTOR  |                                                               |     |      | 2SC5555ZD-TR         | G3355557  |                                                | 1-   | B    | b1       |
| Q 1005 | TRANSISTOR  |                                                               |     |      | 2SC5277-D2-TL        | G3352778B |                                                | 1-   | B    | c1       |
| Q 1006 | TRANSISTOR  |                                                               |     |      | 2SC5555ZD-TR         | G3355557  |                                                | 1-   | B    | c1       |
| Q 1007 | TRANSISTOR  |                                                               |     |      | 2SC5555ZD-TR         | G3355557  |                                                | 1-   | B    | a2       |
| Q 1008 | TRANSISTOR  |                                                               |     |      | 2SC5555ZD-TR         | G3355557  |                                                | 1-   | B    | a2       |
| Q 1009 | TRANSISTOR  |                                                               |     |      | 2SC5555ZD-TR         | G3355557  |                                                | 1-   | B    | a2       |
| Q 1010 | TRANSISTOR  |                                                               |     |      | 2SC5277-D2-TL        | G3352778B |                                                | 1-   | B    | c2       |
| Q 1011 | TRANSISTOR  |                                                               |     |      | 2SC5226-5-TL         | G3352268E |                                                | 1-   | A    | B1       |
| Q 1012 | TRANSISTOR  |                                                               |     |      | UMD6N TR             | G3070215  |                                                | 1-   | A    | C1       |
| Q 1012 | TRANSISTOR  |                                                               |     |      | EMD6-T2R             | G3070346  |                                                | 3-   | A    | C1       |
| Q 1013 | TRANSISTOR  |                                                               |     |      | EMB3 T2R             | G3070303  |                                                | 1-   | B    | b2       |
| Q 1014 | TRANSISTOR  |                                                               |     |      | EMG2 T2R             | G3070304  |                                                | 1-   | B    | b2       |
| Q 1015 | FET         |                                                               |     |      | 2SK3475(T2LVX)       | G3070318  |                                                | 1-   | A    | B1       |
| Q 1016 | TRANSISTOR  |                                                               |     |      | 2SC5226-5-TL         | G3352268E |                                                | 1-   | A    | B1       |
| Q 1017 | TRANSISTOR  |                                                               |     |      | 2SC5374-TL           | G3353748  |                                                | 1-   | B    | a2       |
| Q 1018 | TRANSISTOR  |                                                               |     |      | 2SC5374-TL           | G3353748  |                                                | 1-   | B    | a2       |
| Q 1019 | TRANSISTOR  |                                                               |     |      | 2SC5374-TL           | G3353748  |                                                | 1-   | B    | b1       |
| Q 1020 | IC          |                                                               |     |      | MB15A01PFV1-G-BND-EF | G1092545  |                                                | 1-   | B    | b2       |
| Q 1021 | TRANSISTOR  |                                                               |     |      | DTA144EM T2L         | G3070310  |                                                | 1-   | B    | c2       |
| Q 1022 | TRANSISTOR  |                                                               |     |      | DTC144EM T2L         | G3070309  |                                                | 1-   | B    | c2       |
| Q 1023 | FET         |                                                               |     |      | 2SK3476(TE12L)       | G3834768  |                                                | 1-   | A    | B1       |
| Q 1024 | IC          |                                                               |     |      | TC75S51FU-TE85L      | G1094194  |                                                | 1-   | A    | C1       |
| Q 1025 | TRANSISTOR  |                                                               |     |      | EMB3 T2R             | G3070303  |                                                | 1-   | B    | a1       |
| Q 1026 | TRANSISTOR  |                                                               |     |      | 2SA1774 TL R         | G3117748R |                                                | 1-   | B    | b1       |
| Q 1027 | TRANSISTOR  |                                                               |     |      | EMB3 T2R             | G3070303  |                                                | 1-   | B    | a1       |
| Q 1028 | TRANSISTOR  |                                                               |     |      | 2SA1774 TL R         | G3117748R |                                                | 1-   | B    | b2       |
| Q 1029 | TRANSISTOR  |                                                               |     |      | 2SC4617 TL R         | G3346178R |                                                | 1-   | B    | b2       |
| Q 1030 | TRANSISTOR  |                                                               |     |      | EMB3 T2R             | G3070303  |                                                | 1-   | B    | a1       |
| Q 1031 | TRANSISTOR  |                                                               |     |      | 2SA1774 TL R         | G3117748R |                                                | 1-   | B    | a1       |
| Q 1032 | TRANSISTOR  |                                                               |     |      | DTC144EM T2L         | G3070309  |                                                | 1-   | B    | b1       |
| Q 1033 | TRANSISTOR  |                                                               |     |      | EMB3 T2R             | G3070303  |                                                | 1-   | B    | b1       |
| Q 1034 | TRANSISTOR  |                                                               |     |      | DTC144EM T2L         | G3070309  |                                                | 1-   | A    | B1       |
| Q 1035 | TRANSISTOR  |                                                               |     |      | FMMTL718TA           | G3070335  |                                                | 1-   | A    | B2       |
| Q 1035 | TRANSISTOR  |                                                               |     |      | CPH6102-TL           | G3070223  |                                                | 3-   | A    | B2       |
| Q 1036 | TRANSISTOR  |                                                               |     |      | UMW1 TR              | G3070078  |                                                | 1-   | A    | B2       |
| Q 1037 | TRANSISTOR  |                                                               |     |      | EMB10 T2R            | G3070302  |                                                | 1-   | B    | b1       |
| Q 1038 | TRANSISTOR  |                                                               |     |      | 2SA1774 TL R         | G3117748R |                                                | 1-   | B    | b1       |
| Q 1039 | TRANSISTOR  |                                                               |     |      | 2SA1774 TL R         | G3117748R |                                                | 1-   | B    | b2       |
| Q 1040 | TRANSISTOR  |                                                               |     |      | 2SA1774 TL R         | G3117748R |                                                | 1-   | B    | b2       |
| Q 1041 | TRANSISTOR  |                                                               |     |      | 2SA1774 TL R         | G3117748R |                                                | 1-   | B    | a1       |

| REF.   | DESCRIPTION | VALUE | V/W   | TOL. | MFR'S DESIG     | VXSTD P/N | VERS.     | LOT. | SIDE | LAY ADR. |
|--------|-------------|-------|-------|------|-----------------|-----------|-----------|------|------|----------|
| Q 1041 | TRANSISTOR  |       |       |      | EMD6-T2R        | G3070346  |           | 3-   | B    | a1       |
| Q 1042 | TRANSISTOR  |       |       |      | DTC144EM T2L    | G3070309  |           | 3-   | B    | b1       |
| R 1001 | CHIP RES.   | 220   | 1/16W | 5%   | RMC1/16S 221JTH | J24189017 |           | 1-   | B    | c1       |
| R 1002 | CHIP RES.   | 2.2k  | 1/16W | 5%   | RMC1/16S 222JTH | J24189029 |           | 1-   | B    | b1       |
| R 1003 | CHIP RES.   | 1k    | 1/16W | 5%   | RMC1/16S 102JTH | J24189025 |           | 1-   | B    | a1       |
| R 1004 | CHIP RES.   | 1k    | 1/16W | 5%   | RMC1/16S 102JTH | J24189025 |           | 1-   | B    | a1       |
| R 1005 | CHIP RES.   | 33k   | 1/16W | 5%   | RMC1/16S 333JTH | J24189043 |           | 1-   | B    | b1       |
| R 1006 | CHIP RES.   | 68    | 1/16W | 5%   | RMC1/16S 680JTH | J24189011 |           | 1    | B    | b1       |
| R 1006 | CHIP RES.   | 220   | 1/16W | 5%   | RMC1/16S 221JTH | J24189017 |           | 2-   | B    | b1       |
| R 1007 | CHIP RES.   | 47k   | 1/16W | 5%   | RMC1/16S 473JTH | J24189045 |           | 1-   | B    | a1       |
| R 1008 | CHIP RES.   | 220   | 1/16W | 5%   | RMC1/16S 221JTH | J24189017 |           | 1-   | B    | a1       |
| R 1009 | CHIP RES.   | 470   | 1/16W | 5%   | RMC1/16S 471JTH | J24189021 |           | 1-   | B    | a1       |
| R 1010 | CHIP RES.   | 1k    | 1/16W | 5%   | RMC1/16S 102JTH | J24189025 |           | 1-   | B    | a1       |
| R 1011 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |           | 1-   | B    | a1       |
| R 1012 | CHIP RES.   | 47k   | 1/16W | 5%   | RMC1/16S 473JTH | J24189045 |           | 1-   | B    | c1       |
| R 1013 | CHIP RES.   | 22    | 1/16W | 5%   | RMC1/16S 220JTH | J24189005 |           | 1-   | B    | c1       |
| R 1014 | CHIP RES.   | 47k   | 1/16W | 5%   | RMC1/16S 473JTH | J24189045 |           | 1-   | B    | c1       |
| R 1016 | CHIP RES.   | 47    | 1/16W | 5%   | RMC1/16S 470JTH | J24189009 |           | 1-   | B    | c1       |
| R 1017 | CHIP RES.   | 47k   | 1/16W | 5%   | RMC1/16S 473JTH | J24189045 |           | 1-   | B    | b1       |
| R 1018 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |           | 1-   | B    | b1       |
| R 1019 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |           | 1-   | B    | b1       |
| R 1020 | CHIP RES.   | 470   | 1/16W | 5%   | RMC1/16S 471JTH | J24189021 |           | 1-   | B    | a1       |
| R 1021 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |           | 1-   | B    | a1       |
| R 1022 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |           | 1-   | B    | a1       |
| R 1023 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |           | 1-   | B    | a1       |
| R 1024 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |           | 1-   | B    | a1       |
| R 1025 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |           | 1-   | B    | a2       |
| R 1026 | CHIP RES.   | 1k    | 1/16W | 5%   | RMC1/16S 102JTH | J24189025 |           | 1-   | B    | a1       |
| R 1027 | CHIP RES.   | 470   | 1/16W | 5%   | RMC1/16S 471JTH | J24189021 |           | 1-   | B    | a1       |
| R 1028 | CHIP RES.   | 22    | 1/16W | 5%   | RMC1/16S 220JTH | J24189005 |           | 1-   | B    | c1       |
| R 1029 | CHIP RES.   | 0     | 1/16W | 5%   | RMC1/16S JPTH   | J24189070 |           | 1-   | B    | c1       |
| R 1030 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |           | 1-   | B    | c2       |
| R 1031 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |           | 1-   | B    | c2       |
| R 1032 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |           | 1-   | B    | c1       |
| R 1033 | CHIP RES.   | 220   | 1/16W | 5%   | RMC1/16S 221JTH | J24189017 |           | 1    | B    | c1       |
| R 1033 | CHIP RES.   | 470   | 1/16W | 5%   | RMC1/16S 471JTH | J24189021 |           | 2    | B    | c1       |
| R 1033 | CHIP RES.   | 470   | 1/16W | 5%   | RMC1/16S 471JTH | J24189021 | AUSTRALIA | 3-   | B    | c1       |
| R 1033 | CHIP RES.   | 220   | 1/16W | 5%   | RMC1/16S 221JTH | J24189017 | EUROPE    | 3-   | B    | c1       |
| R 1033 | CHIP RES.   | 470   | 1/16W | 5%   | RMC1/16S 471JTH | J24189021 | EXPORT    | 3-   | B    | c1       |
| R 1033 | CHIP RES.   | 470   | 1/16W | 5%   | RMC1/16S 471JTH | J24189021 | USA       | 3-   | B    | c1       |
| R 1034 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |           | 1-   | B    | c1       |
| R 1035 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |           | 1-   | B    | c1       |
| R 1036 | CHIP RES.   | 220k  | 1/16W | 5%   | RMC1/16S 224JTH | J24189053 |           | 1-   | B    | a2       |
| R 1037 | CHIP RES.   | 47    | 1/16W | 5%   | RMC1/16S 470JTH | J24189009 |           | 1-2  | B    | c1       |
| R 1037 | CHIP RES.   | 47    | 1/16W | 5%   | RMC1/16S 470JTH | J24189009 | AUSTRALIA | 3-   | B    | c1       |
| R 1037 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH | J24189013 | EUROPE    | 3-   | B    | c1       |
| R 1037 | CHIP RES.   | 47    | 1/16W | 5%   | RMC1/16S 470JTH | J24189009 | EXPORT    | 3-   | B    | c1       |
| R 1037 | CHIP RES.   | 47    | 1/16W | 5%   | RMC1/16S 470JTH | J24189009 | USA       | 3-   | B    | c1       |
| R 1038 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |           | 1-   | B    | a1       |
| R 1039 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |           | 1-   | B    | a2       |
| R 1040 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |           | 1-   | B    | a2       |
| R 1041 | CHIP RES.   | 1k    | 1/16W | 5%   | RMC1/16S 102JTH | J24189025 |           | 1-   | B    | a2       |
| R 1042 | CHIP RES.   | 47k   | 1/16W | 5%   | RMC1/16S 473JTH | J24189045 |           | 1-   | B    | a2       |
| R 1043 | CHIP RES.   | 220   | 1/16W | 5%   | RMC1/16S 221JTH | J24189017 |           | 1-   | B    | a2       |
| R 1044 | CHIP RES.   | 270k  | 1/16W | 5%   | RMC1/16S 274JTH | J24189054 |           | 1-   | B    | a2       |
| R 1045 | CHIP RES.   | 330   | 1/16W | 5%   | RMC1/16S 331JTH | J24189019 |           | 1-   | B    | a2       |
| R 1046 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |           | 1-   | B    | c2       |
| R 1047 | CHIP RES.   | 470   | 1/16W | 5%   | RMC1/16S 471JTH | J24189021 |           | 1-   | B    | c2       |
| R 1048 | CHIP RES.   | 470   | 1/16W | 5%   | RMC1/16S 471JTH | J24189021 |           | 1-   | B    | c2       |
| R 1049 | CHIP RES.   | 220   | 1/16W | 5%   | RMC1/16S 221JTH | J24189017 |           | 1-   | B    | c1       |
| R 1050 | CHIP RES.   | 220   | 1/16W | 5%   | RMC1/16S 221JTH | J24189017 |           | 1-   | B    | a2       |
| R 1051 | CHIP RES.   | 330   | 1/16W | 5%   | RMC1/16S 331JTH | J24189019 |           | 1-   | B    | a2       |

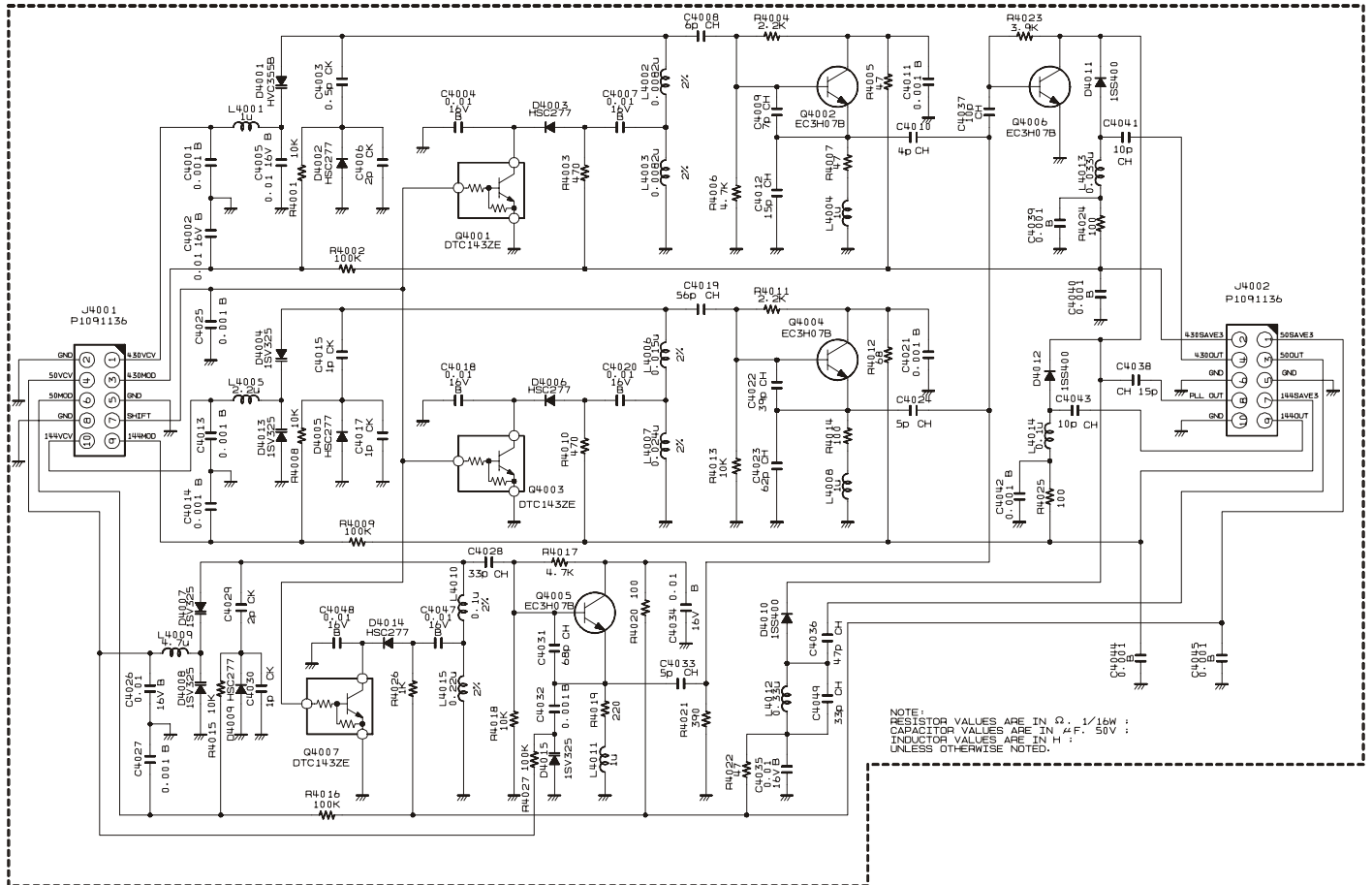
# RF Unit

| REF.   | DESCRIPTION | VALUE | V/W   | TOL. | MFR'S DESIG     | VXSTD P/N | VERS.     | LOT. | SIDE | LAY ADR. |
|--------|-------------|-------|-------|------|-----------------|-----------|-----------|------|------|----------|
| R 1052 | CHIP RES.   | 1k    | 1/16W | 5%   | RMC1/16S 102JTH | J24189025 |           | 1-   | A    | B2       |
| R 1053 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |           | 1-   | A    | C1       |
| R 1054 | CHIP RES.   | 47    | 1/16W | 5%   | RMC1/16S 470JTH | J24189009 |           | 1-   | A    | B1       |
| R 1055 | CHIP RES.   | 470   | 1/16W | 5%   | RMC1/16S 471JTH | J24189021 |           | 1-   | A    | C1       |
| R 1056 | CHIP RES.   | 47    | 1/16W | 5%   | RMC1/16S 470JTH | J24189009 |           | 1-   | A    | C1       |
| R 1057 | CHIP RES.   | 1k    | 1/16W | 5%   | RMC1/16S 102JTH | J24189025 |           | 1-   | B    | a2       |
| R 1058 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH | J24189013 |           | 1-   | B    | b1       |
| R 1059 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |           | 1-   | B    | a2       |
| R 1060 | CHIP RES.   | 18k   | 1/16W | 5%   | RMC1/16S 183JTH | J24189040 |           | 1-   | B    | b2       |
| R 1061 | CHIP RES.   | 33k   | 1/16W | 5%   | RMC1/16S 333JTH | J24189043 |           | 1-   | B    | b1       |
| R 1062 | CHIP RES.   | 330k  | 1/16W | 5%   | RMC1/16S 334JTH | J24189055 |           | 1-   | B    | b2       |
| R 1063 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |           | 1-   | B    | b2       |
| R 1064 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |           | 1-   | B    | b2       |
| R 1065 | CHIP RES.   | 1M    | 1/16W | 5%   | RMC1/16S 105JTH | J24189061 |           | 1-   | B    | b2       |
| R 1066 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |           | 1-   | B    | c2       |
| R 1067 | CHIP RES.   | 470   | 1/16W | 5%   | RMC1/16S 471JTH | J24189021 |           | 1    | A    | C1       |
| R 1067 | CHIP RES.   | 470   | 1/16W | 5%   | RMC1/16S 471JTH | J24189021 | AUSTRALIA | 2-   | A    | C1       |
| R 1067 | CHIP RES.   | 470   | 1/16W | 5%   | RMC1/16S 471JTH | J24189021 | EUROPE    | 2-   | A    | C1       |
| R 1067 | CHIP RES.   | 470   | 1/16W | 5%   | RMC1/16S 471JTH | J24189021 | EXPORT    | 2-   | A    | C1       |
| R 1067 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH | J24189013 | USA       | 2-   | A    | C1       |
| R 1068 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |           | 1-   | A    | C1       |
| R 1069 | CHIP RES.   | 180k  | 1/16W | 5%   | RMC1/16S 184JTH | J24189052 |           | 1-   | A    | C1       |
| R 1070 | CHIP RES.   | 680   | 1/16W | 5%   | RMC1/16S 681JTH | J24189023 |           | 1    | A    | B1       |
| R 1070 | CHIP RES.   | 680   | 1/16W | 5%   | RMC1/16S 681JTH | J24189023 | AUSTRALIA | 2-   | A    | B1       |
| R 1070 | CHIP RES.   | 680   | 1/16W | 5%   | RMC1/16S 681JTH | J24189023 | EUROPE    | 2-   | A    | B1       |
| R 1070 | CHIP RES.   | 680   | 1/16W | 5%   | RMC1/16S 681JTH | J24189023 | EXPORT    | 2-   | A    | B1       |
| R 1070 | CHIP RES.   | 0     | 1/16W | 5%   | RMC1/16S JPTH   | J24189070 | USA       | 2-   | A    | B1       |
| R 1072 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |           | 1-   | A    | B1       |
| R 1073 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH | J24189013 |           | 1-   | A    | B1       |
| R 1074 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH | J24189013 |           | 1-   | A    | C1       |
| R 1075 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |           | 1-   | B    | b2       |
| R 1076 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |           | 1-   | B    | b1       |
| R 1077 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |           | 1-   | B    | b2       |
| R 1078 | CHIP RES.   | 3.3k  | 1/16W | 5%   | RMC1/16S 332JTH | J24189031 |           | 1-   | B    | c2       |
| R 1079 | CHIP RES.   | 3.3k  | 1/16W | 5%   | RMC1/16S 332JTH | J24189031 |           | 1-   | B    | c1       |
| R 1080 | CHIP RES.   | 1.8k  | 1/16W | 5%   | RMC1/16S 182JTH | J24189028 |           | 1-   | B    | c1       |
| R 1081 | CHIP RES.   | 3.3k  | 1/16W | 5%   | RMC1/16S 332JTH | J24189031 |           | 1-   | B    | c1       |
| R 1082 | CHIP RES.   | 1.8k  | 1/16W | 5%   | RMC1/16S 182JTH | J24189028 |           | 1-   | B    | c1       |
| R 1083 | CHIP RES.   | 1k    | 1/16W | 5%   | RMC1/16S 102JTH | J24189025 |           | 1-   | B    | c1       |
| R 1085 | CHIP RES.   | 470   | 1/16W | 5%   | RMC1/16S 471JTH | J24189021 |           | 1-   | A    | B1       |
| R 1086 | CHIP RES.   | 100k  | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |           | 1-   | A    | B1       |
| R 1087 | CHIP RES.   | 120k  | 1/16W | 5%   | RMC1/16S 124JTH | J24189050 |           | 1-   | A    | B1       |
| R 1088 | CHIP RES.   | 47    | 1/16W | 5%   | RMC1/16S 470JTH | J24189009 |           | 1-   | A    | B1       |
| R 1089 | CHIP RES.   | 100   | 1/16W | 5%   | RMC1/16S 101JTH | J24189013 |           | 1-   | A    | C1       |
| R 1090 | CHIP RES.   | 470k  | 1/16W | 5%   | RMC1/16S 474JTH | J24189057 |           | 1-   | A    | C1       |
| R 1091 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |           | 1-   | A    | C1       |
| R 1092 | CHIP RES.   | 3.3k  | 1/16W | 5%   | RMC1/16S 332JTH | J24189031 |           | 1-   | B    | b1       |
| R 1093 | CHIP RES.   | 2.2k  | 1/16W | 5%   | RMC1/16S 222JTH | J24189029 |           | 1-   | B    | b1       |
| R 1094 | CHIP RES.   | 1k    | 1/16W | 5%   | RMC1/16S 102JTH | J24189025 |           | 1-   | B    | b1       |
| R 1095 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |           | 1-   | A    | B2       |
| R 1096 | CHIP RES.   | 27k   | 1/16W | 5%   | RMC1/16S 273JTH | J24189042 |           | 1-   | A    | B2       |
| R 1097 | CHIP RES.   | 330   | 1/16W | 5%   | RMC1/16S 331JTH | J24189019 |           | 1-   | A    | B1       |
| R 1098 | CHIP RES.   | 680   | 1/16W | 5%   | RMC1/16S 681JTH | J24189023 |           | 1-   | A    | B1       |
| R 1099 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |           | 1-   | B    | b1       |
| R 1100 | CHIP RES.   | 1k    | 1/16W | 5%   | RMC1/16S 102JTH | J24189025 |           | 1-   | B    | b1       |
| R 1101 | CHIP RES.   | 3.3k  | 1/16W | 5%   | RMC1/16S 332JTH | J24189031 |           | 1-   | A    | A2       |
| R 1102 | CHIP RES.   | 330   | 1/16W | 5%   | RMC1/16S 331JTH | J24189019 |           | 1-   | A    | A1       |
| R 1103 | CHIP RES.   | 330   | 1/16W | 5%   | RMC1/16S 331JTH | J24189019 |           | 1-   | A    | B2       |
| R 1104 | CHIP RES.   | 2.2k  | 1/16W | 5%   | RMC1/16S 222JTH | J24189029 |           | 1-   | B    | b2       |
| R 1105 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |           | 1-   | B    | a1       |
| R 1106 | CHIP RES.   | 1k    | 1/16W | 5%   | RMC1/16S 102JTH | J24189025 |           | 1-   | B    | a1       |
| R 1107 | CHIP RES.   | 10k   | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |           | 1-   | B    | b1       |

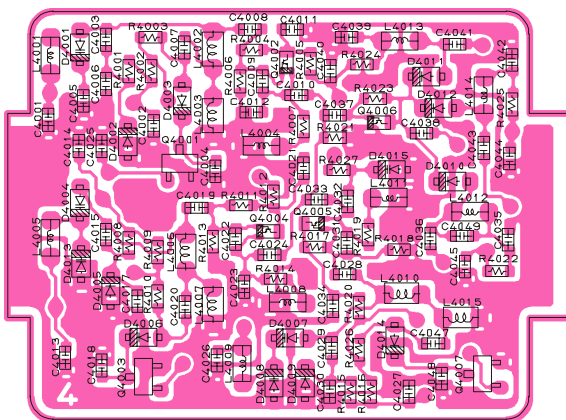
| REF.   | DESCRIPTION    | VALUE   | V/W   | TOL. | MFR'S DESIG     | VXSTD P/N | VERS.     | LOT. | SIDE | LAY ADR. |
|--------|----------------|---------|-------|------|-----------------|-----------|-----------|------|------|----------|
| R 1108 | CHIP RES.      | 3.3k    | 1/16W | 5%   | RMC1/16S 332JTH | J24189031 |           | 1-   | A    | A1       |
| R 1109 | CHIP RES.      | 3.3k    | 1/16W | 5%   | RMC1/16S 332JTH | J24189031 |           | 1-   | A    | A1       |
| R 1110 | CHIP RES.      | 4.7k    | 1/16W | 5%   | RMC1/16S 472JTH | J24189033 |           | 1-   | A    | A1       |
| R 1111 | CHIP RES.      | 270     | 1/16W | 5%   | RMC1/16S 271JTH | J24189018 |           | 1-   | A    | A1       |
| R 1112 | CHIP RES.      | 1k      | 1/16W | 5%   | RMC1/16S 102JTH | J24189025 |           | 1-   | B    | b2       |
| R 1113 | CHIP RES.      | 1k      | 1/16W | 5%   | RMC1/16S 102JTH | J24189025 |           | 1-   | A    | B2       |
| R 1114 | CHIP RES.      | 10k     | 1/16W | 0.5% | MCR01MZPD1002   | J24189374 |           | 1-   | A    | B2       |
| R 1115 | CHIP RES.      | 10k     | 1/16W | 0.5% | MCR01MZPD1002   | J24189374 |           | 1-   | A    | B2       |
| R 1116 | CHIP RES.      | 10k     | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |           | 1-   | B    | b1       |
| R 1117 | CHIP RES.      | 1k      | 1/16W | 5%   | RMC1/16S 102JTH | J24189025 |           | 1-   | B    | b1       |
| R 1118 | CHIP RES.      | 4.7k    | 1/16W | 5%   | RMC1/16S 472JTH | J24189033 |           | 1-   | B    | b2       |
| R 1119 | CHIP RES.      | 4.7k    | 1/16W | 5%   | RMC1/16S 472JTH | J24189033 |           | 1-   | B    | b2       |
| R 1120 | CHIP RES.      | 100     | 1/16W | 5%   | RMC1/16S 101JTH | J24189013 |           | 1-   | B    | c1       |
| R 1121 | CHIP RES.      | 330     | 1/16W | 5%   | RMC1/16 331JATP | J24185331 |           | 1-   | B    | a2       |
| R 1124 | CHIP RES.      | 100     | 1/16W | 5%   | RMC1/16S 101JTH | J24189013 |           | 1-   | B    | b1       |
| R 1125 | CHIP RES.      | 330     | 1/16W | 5%   | RMC1/16S 331JTH | J24189019 |           | 1-   | A    | B1       |
| R 1126 | CHIP RES.      | 0       | 1/16W | 5%   | RMC1/16S JPTH   | J24189070 |           | 1-2  | B    | a1       |
| R 1126 | CHIP RES.      | 0       | 1/16W | 5%   | RMC1/16S JPTH   | J24189070 | AUSTRALIA | 3-   | B    | a1       |
| R 1126 | CHIP RES.      | 0       | 1/16W | 5%   | RMC1/16S JPTH   | J24189070 | EXPORT    | 3-   | B    | a1       |
| R 1126 | CHIP RES.      | 0       | 1/16W | 5%   | RMC1/16S JPTH   | J24189070 | USA       | 3-   | B    | a1       |
| R 1128 | CHIP RES.      | 680     | 1/16W | 5%   | RMC1/16S 681JTH | J24189023 |           | 1-   | A    | B1       |
| R 1129 | CHIP RES.      | 470     | 1/16W | 5%   | RMC1/16 471JATP | J24185471 |           | 1-   | A    | B1       |
| R 1129 | CHIP RES.      | 470     | 1/16W | 5%   | RMC1/16S 471JTH | J24189021 |           | 3-   | A    | B1       |
| R 1130 | CHIP RES.      | 10k     | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |           | 3-   | B    | b1       |
| R 1131 | CHIP RES.      | 560     | 1/16W | 5%   | RMC1/16 561JATP | J24185561 | USA       | 2-   |      |          |
| R 1132 | CHIP RES.      | 470     | 1/10W | 5%   | RMC1/10T 471J   | J24205471 | USA       | 2-   |      |          |
| TH1001 | THERMISTOR     |         |       |      | ERTJ0EV473J     | G9090120  |           | 1-   | B    | b2       |
| X 1001 | XTAL XVNBAI    | 11.7MHz |       |      | 11.7MHz         | H0103311  |           | 1-   | B    | c2       |
|        | TERMINAL PLATE |         |       |      |                 | RA0287100 |           | 1-   |      |          |

***RF Unit***  
***Note:***

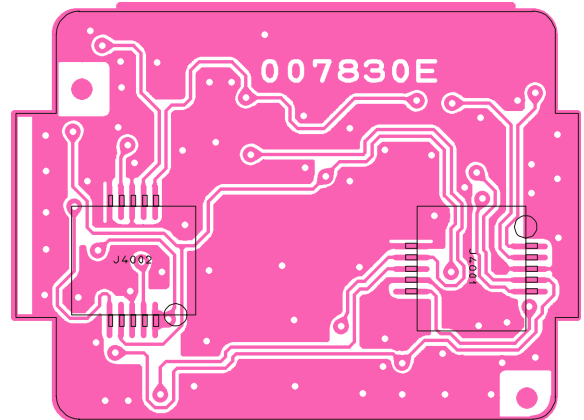
## Circuit Diagram



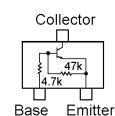
## Parts Layout



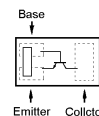
Side A



Side B



DTC143ZE (E23)  
(Q4001, 4003, 4007)



EC3H07B (G)  
(Q4002, 4004, 4005,  
4006)

# VCO Unit

## Parts List

| REF.                                         | DESCRIPTION | VALUE   | V/W | TOL. | MFR'S DESIG     | VXSTD P/N              | VERS. | LOT. | SIDE | LAY ADR. |
|----------------------------------------------|-------------|---------|-----|------|-----------------|------------------------|-------|------|------|----------|
| *** VCO UNIT ***                             |             |         |     |      |                 |                        |       |      |      |          |
| PCB with Components<br>Printed Circuit Board |             |         |     |      |                 | CB3028001<br>FR007830D |       | 1-   |      |          |
| C 4001                                       | CHIP CAP.   | 0.001uF | 50V | B    | UMK105B102KW-F  | K22178829              |       | 1-   | A    | A1       |
| C 4002                                       | CHIP CAP.   | 0.01uF  | 16V | B    | GRM36B103K16PT  | K22128804              |       | 1-   | A    | A1       |
| C 4003                                       | CHIP CAP.   | 0.5pF   | 50V | CK   | UMK105CK0R5CW-F | K22178247              |       | 1-   | A    | A1       |
| C 4004                                       | CHIP CAP.   | 0.01uF  | 16V | B    | GRM36B103K16PT  | K22128804              |       | 1-   | A    | A1       |
| C 4005                                       | CHIP CAP.   | 0.01uF  | 16V | B    | GRM36B103K16PT  | K22128804              |       | 1-   | A    | A1       |
| C 4006                                       | CHIP CAP.   | 2pF     | 50V | CK   | UMK105CK020CW-F | K22178250              |       | 1-   | A    | A1       |
| C 4007                                       | CHIP CAP.   | 0.01uF  | 16V | B    | GRM36B103K16PT  | K22128804              |       | 1-   | A    | A1       |
| C 4008                                       | CHIP CAP.   | 6pF     | 50V | CH   | GRM36CH060B50PT | K22178293              |       | 1-   | A    | A1       |
| C 4009                                       | CHIP CAP.   | 10pF    | 50V | CH   | UMK105CH100DW-F | K22178258              |       | 1-   | A    | A1       |
| C 4010                                       | CHIP CAP.   | 4pF     | 50V | CH   | UMK105CH040CW-F | K22178252              |       | 1-   | A    | A1       |
| C 4011                                       | CHIP CAP.   | 0.001uF | 50V | B    | UMK105B102KW-F  | K22178829              |       | 1-   | A    | A1       |
| C 4012                                       | CHIP CAP.   | 15pF    | 50V | CH   | UMK105CH150JW-F | K22178262              |       | 1-   | A    | A1       |
| C 4013                                       | CHIP CAP.   | 0.001uF | 50V | B    | UMK105B102KW-F  | K22178829              |       | 1-   | A    | A1       |
| C 4014                                       | CHIP CAP.   | 0.001uF | 50V | B    | UMK105B102KW-F  | K22178829              |       | 1-   | A    | A1       |
| C 4015                                       | CHIP CAP.   | 1pF     | 50V | CK   | UMK105CK010CW-F | K22178248              |       | 1-   | A    | A1       |
| C 4017                                       | CHIP CAP.   | 1pF     | 50V | CK   | UMK105CK010CW-F | K22178248              |       | 1-   | A    | A1       |
| C 4018                                       | CHIP CAP.   | 0.01uF  | 16V | B    | GRM36B103K16PT  | K22128804              |       | 1-   | A    | A1       |
| C 4019                                       | CHIP CAP.   | 56pF    | 50V | CH   | UMK105CH560JW-F | K22178276              |       | 1-   | A    | A1       |
| C 4020                                       | CHIP CAP.   | 0.01uF  | 16V | B    | GRM36B103K16PT  | K22128804              |       | 1-   | A    | A1       |
| C 4021                                       | CHIP CAP.   | 0.001uF | 50V | B    | UMK105B102KW-F  | K22178829              |       | 1-   | A    | A1       |
| C 4022                                       | CHIP CAP.   | 39pF    | 50V | CH   | UMK105CH390JW-F | K22178272              |       | 1-   | A    | A1       |
| C 4023                                       | CHIP CAP.   | 62pF    | 50V | CH   | UMK105CH620JW-F | K22178277              |       | 1-   | A    | A1       |
| C 4024                                       | CHIP CAP.   | 5pF     | 50V | CH   | UMK105CH050CW-F | K22178253              |       | 1-   | A    | A1       |
| C 4025                                       | CHIP CAP.   | 0.001uF | 50V | B    | UMK105B102KW-F  | K22178829              |       | 1-   | A    | A1       |
| C 4026                                       | CHIP CAP.   | 0.01uF  | 16V | B    | GRM36B103K16PT  | K22128804              |       | 1-   | A    | A1       |
| C 4027                                       | CHIP CAP.   | 0.001uF | 50V | B    | UMK105B102KW-F  | K22178829              |       | 1-   | A    | A1       |
| C 4028                                       | CHIP CAP.   | 33pF    | 50V | CH   | UMK105CH330JW-F | K22178270              |       | 1-   | A    | A1       |
| C 4029                                       | CHIP CAP.   | 2pF     | 50V | CK   | UMK105CK020CW-F | K22178250              |       | 1-   | A    | A1       |
| C 4030                                       | CHIP CAP.   | 1pF     | 50V | CK   | UMK105CK010CW-F | K22178248              |       | 1-   | A    | A1       |
| C 4031                                       | CHIP CAP.   | 68pF    | 50V | CH   | UMK105CH680JW-F | K22178278              |       | 1-   | A    | A1       |
| C 4032                                       | CHIP CAP.   | 0.001uF | 50V | B    | UMK105B102KW-F  | K22178829              |       | 1-   | A    | A1       |
| C 4033                                       | CHIP CAP.   | 5pF     | 50V | CH   | UMK105CH050CW-F | K22178253              |       | 1-   | A    | A1       |
| C 4034                                       | CHIP CAP.   | 0.01uF  | 16V | B    | GRM36B103K16PT  | K22128804              |       | 1-   | A    | A1       |
| C 4035                                       | CHIP CAP.   | 0.01uF  | 16V | B    | GRM36B103K16PT  | K22128804              |       | 1-   | A    | B1       |
| C 4036                                       | CHIP CAP.   | 47pF    | 50V | CH   | UMK105CH470JW-F | K22178274              |       | 1-   | A    | A1       |
| C 4037                                       | CHIP CAP.   | 10pF    | 50V | CH   | UMK105CH100DW-F | K22178258              |       | 1-   | A    | A1       |
| C 4038                                       | CHIP CAP.   | 15pF    | 50V | CH   | UMK105CH150JW-F | K22178262              |       | 1-   | A    | A1       |
| C 4039                                       | CHIP CAP.   | 0.001uF | 50V | B    | UMK105B102KW-F  | K22178829              |       | 1-   | A    | A1       |
| C 4040                                       | CHIP CAP.   | 0.001uF | 50V | B    | UMK105B102KW-F  | K22178829              |       | 1-   | A    | A1       |
| C 4041                                       | CHIP CAP.   | 10pF    | 50V | CH   | UMK105CH100DW-F | K22178258              |       | 1-   | A    | A1       |
| C 4042                                       | CHIP CAP.   | 0.001uF | 50V | B    | UMK105B102KW-F  | K22178829              |       | 1-   | A    | B1       |
| C 4043                                       | CHIP CAP.   | 10pF    | 50V | CH   | UMK105CH100DW-F | K22178258              |       | 1-   | A    | B1       |
| C 4044                                       | CHIP CAP.   | 0.001uF | 50V | B    | UMK105B102KW-F  | K22178829              |       | 1-   | A    | B1       |
| C 4045                                       | CHIP CAP.   | 0.001uF | 50V | B    | UMK105B102KW-F  | K22178829              |       | 1-   | A    | A1       |
| C 4047                                       | CHIP CAP.   | 0.01uF  | 16V | B    | GRM36B103K16PT  | K22128804              |       | 1-   | A    | A1       |
| C 4048                                       | CHIP CAP.   | 0.01uF  | 16V | B    | GRM36B103K16PT  | K22128804              |       | 1-   | A    | A1       |
| C 4049                                       | CHIP CAP.   | 33pF    | 50V | CH   | UMK105CH330JW-F | K22178270              |       | 1-   | A    | A1       |
| D 4001                                       | DIODE       |         |     |      | HVC355B(TAPE)   | G2070588               |       | 1-   | A    | A1       |
| D 4002                                       | DIODE       |         |     |      | HSC277TRF       | G2070584               |       | 1-   | A    | A1       |
| D 4003                                       | DIODE       |         |     |      | HSC277TRF       | G2070584               |       | 1-   | A    | A1       |
| D 4004                                       | DIODE       |         |     |      | 1SV325(TPH3)    | G2070848               |       | 1-   | A    | A1       |
| D 4005                                       | DIODE       |         |     |      | HSC277TRF       | G2070584               |       | 1-   | A    | A1       |
| D 4006                                       | DIODE       |         |     |      | HSC277TRF       | G2070584               |       | 1-   | A    | A1       |
| D 4007                                       | DIODE       |         |     |      | 1SV325(TPH3)    | G2070848               |       | 1-   | A    | A1       |
| D 4008                                       | DIODE       |         |     |      | 1SV325(TPH3)    | G2070848               |       | 1-   | A    | A1       |
| D 4009                                       | DIODE       |         |     |      | HSC277TRF       | G2070584               |       | 1-   | A    | A1       |
| D 4010                                       | DIODE       |         |     |      | 1SS400 TE61     | G2070634               |       | 1-   | A    | A1       |
| D 4011                                       | DIODE       |         |     |      | 1SS400 TE61     | G2070634               |       | 1-   | A    | A1       |
| D 4012                                       | DIODE       |         |     |      | 1SS400 TE61     | G2070634               |       | 1-   | A    | A1       |

| REF.   | DESCRIPTION     | VALUE    | V/W   | TOL. | MFR'S DESIG     | VXSTD P/N | VERS. | LOT. | SIDE | LAY ADR. |
|--------|-----------------|----------|-------|------|-----------------|-----------|-------|------|------|----------|
| D 4013 | DIODE           |          |       |      | 1SV325(TPH3)    | G2070848  |       | 1-   | A    | A1       |
| D 4014 | DIODE           |          |       |      | HSC277TRF       | G2070584  |       | 1-   | A    | A1       |
| D 4015 | DIODE           |          |       |      | 1SV325(TPH3)    | G2070848  |       | 1-   | A    | A1       |
| J 4001 | CONNECTOR       |          |       |      | AXK5F10335YP    | P1091136  |       | 1-   | B    | b1       |
| J 4002 | CONNECTOR       |          |       |      | AXK5F10335YP    | P1091136  |       | 1-   | B    | a1       |
| L 4001 | M.RFC           | 1uH      |       |      | LK1608 1R0K-T   | L1690687  |       | 1-   | A    | A1       |
| L 4002 | M.RFC           | 0.0068uH |       | 5%   | C1608CB-6N8J    | L1691093  |       | 1-   | A    | A1       |
| L 4003 | M.RFC           | 0.0082uH |       | 2%   | C1608CB-8N2G    | L1691226  |       | 1-   | A    | A1       |
| L 4004 | M.RFC           | 1uH      |       |      | LK1608 1R0K-T   | L1690687  |       | 1-   | A    | A1       |
| L 4005 | M.RFC           | 2.2uH    |       |      | LK1608 2R2K-T   | L1690634  |       | 1-   | A    | A1       |
| L 4006 | M.RFC           | 0.015uH  |       | 2%   | C1608CB-15NG    | L1691034  |       | 1-   | A    | A1       |
| L 4007 | M.RFC           | 0.024uH  |       | 2%   | C1608CB-24NG    | L1691281  |       | 1-   | A    | A1       |
| L 4008 | M.RFC           | 1uH      |       |      | LK1608 1R0K-T   | L1690687  |       | 1-   | A    | A1       |
| L 4009 | M.RFC           | 4.7uH    |       |      | LK1608 4R7K-T   | L1690688  |       | 1-   | A    | A1       |
| L 4010 | M.RFC           | 0.1uH    |       | 2%   | C1608CB-R10G    | L1691045  |       | 1-   | A    | A1       |
| L 4011 | M.RFC           | 1uH      |       |      | LK1608 1R0K-T   | L1690687  |       | 1-   | A    | A1       |
| L 4012 | M.RFC           | 0.33uH   |       |      | LK1608 R33K-T   | L1690412  |       | 1-   | A    | A1       |
| L 4013 | M.RFC           | 0.033uH  |       |      | HK1608 33NJ-T   | L1690522  |       | 1-   | A    | A1       |
| L 4014 | M.RFC           | 0.1uH    |       |      | LK1608 R10K-T   | L1690407  |       | 1-   | A    | B1       |
| L 4015 | M.RFC           | 0.22uH   |       | 2%   | C1608CB-R22G    | L1691103  |       | 1-   | A    | A1       |
| Q 4001 | TRANSISTOR      |          |       |      | DTC143ZE TL     | G3070102  |       | 1-   | A    | A1       |
| Q 4002 | TRANSISTOR      |          |       |      | EC3H07B-TL      | G3070286  |       | 1-   | A    | A1       |
| Q 4003 | TRANSISTOR      |          |       |      | DTC143ZE TL     | G3070102  |       | 1-   | A    | A1       |
| Q 4004 | TRANSISTOR      |          |       |      | EC3H07B-TL      | G3070286  |       | 1-   | A    | A1       |
| Q 4005 | TRANSISTOR      |          |       |      | EC3H07B-TL      | G3070286  |       | 1-   | A    | A1       |
| Q 4006 | TRANSISTOR      |          |       |      | EC3H07B-TL      | G3070286  |       | 1-   | A    | A1       |
| Q 4007 | TRANSISTOR      |          |       |      | DTC143ZE TL     | G3070102  |       | 1-   | A    | A1       |
| R 4001 | CHIP RES.       | 10k      | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | A    | A1       |
| R 4002 | CHIP RES.       | 100k     | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |       | 1-   | A    | A1       |
| R 4003 | CHIP RES.       | 470      | 1/16W | 5%   | RMC1/16S 471JTH | J24189021 |       | 1-   | A    | A1       |
| R 4004 | CHIP RES.       | 2.2k     | 1/16W | 5%   | RMC1/16S 222JTH | J24189029 |       | 1-   | A    | A1       |
| R 4005 | CHIP RES.       | 47       | 1/16W | 5%   | RMC1/16S 470JTH | J24189009 |       | 1-   | A    | A1       |
| R 4006 | CHIP RES.       | 4.7k     | 1/16W | 5%   | RMC1/16S 472JTH | J24189033 |       | 1-   | A    | A1       |
| R 4007 | CHIP RES.       | 47       | 1/16W | 5%   | RMC1/16S 470JTH | J24189009 |       | 1-   | A    | A1       |
| R 4008 | CHIP RES.       | 10k      | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | A    | A1       |
| R 4009 | CHIP RES.       | 100k     | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |       | 1-   | A    | A1       |
| R 4010 | CHIP RES.       | 470      | 1/16W | 5%   | RMC1/16S 471JTH | J24189021 |       | 1-   | A    | A1       |
| R 4011 | CHIP RES.       | 2.2k     | 1/16W | 5%   | RMC1/16S 222JTH | J24189029 |       | 1-   | A    | A1       |
| R 4012 | CHIP RES.       | 68       | 1/16W | 5%   | RMC1/16S 680JTH | J24189011 |       | 1-   | A    | A1       |
| R 4013 | CHIP RES.       | 10k      | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | A    | A1       |
| R 4014 | CHIP RES.       | 100      | 1/16W | 5%   | RMC1/16S 101JTH | J24189013 |       | 1-   | A    | A1       |
| R 4015 | CHIP RES.       | 10k      | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | A    | A1       |
| R 4016 | CHIP RES.       | 100k     | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |       | 1-   | A    | A1       |
| R 4017 | CHIP RES.       | 4.7k     | 1/16W | 5%   | RMC1/16S 472JTH | J24189033 |       | 1-   | A    | A1       |
| R 4018 | CHIP RES.       | 10k      | 1/16W | 5%   | RMC1/16S 103JTH | J24189037 |       | 1-   | A    | A1       |
| R 4019 | CHIP RES.       | 220      | 1/16W | 5%   | RMC1/16S 221JTH | J24189017 |       | 1-   | A    | A1       |
| R 4020 | CHIP RES.       | 100      | 1/16W | 5%   | RMC1/16S 101JTH | J24189013 |       | 1-   | A    | A1       |
| R 4021 | CHIP RES.       | 390      | 1/16W | 5%   | RMC1/16S 391JTH | J24189020 |       | 1-   | A    | A1       |
| R 4022 | CHIP RES.       | 47       | 1/16W | 5%   | RMC1/16S 470JTH | J24189009 |       | 1-   | A    | B1       |
| R 4023 | CHIP RES.       | 3.9k     | 1/16W | 5%   | RMC1/16S 392JTH | J24189032 |       | 1-   | A    | A1       |
| R 4024 | CHIP RES.       | 100      | 1/16W | 5%   | RMC1/16S 101JTH | J24189013 |       | 1-   | A    | A1       |
| R 4025 | CHIP RES.       | 100      | 1/16W | 5%   | RMC1/16S 101JTH | J24189013 |       | 1-   | A    | B1       |
| R 4026 | CHIP RES.       | 1k       | 1/16W | 5%   | RMC1/16S 102JTH | J24189025 |       | 1-   | A    | A1       |
| R 4027 | CHIP RES.       | 100k     | 1/16W | 5%   | RMC1/16S 104JTH | J24189049 |       | 1-   | A    | A1       |
|        | SHIELD CASE VCO |          |       |      |                 | RA0400300 |       | 1-   |      |          |
|        | SHIELD SHEET    |          |       |      |                 | RA043430B |       | 1-   |      |          |



Copyright 2005  
VERTEX STANDARD CO., LTD.  
All rights reserved

No portion of this manual  
may be reproduced without  
the permission of  
VERTEX STANDARD CO., LTD.