

# Audio/Communication Basic Service Data

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PROSCAN



Latin America After Sales

Indianapolis IN 46290 U.S.A.

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**CAUTION:** Modification or repair of this unit by unauthorized persons is a direct violation of FCC Rules Part 68.216 and could result in risk of electric shock. You are urged to contact a qualified factory authorized service facility for repairs.

### **SAFETY NOTICE USE ISOLATION TRANSFORMER WHEN SERVICING**

Components having special safety characteristics are identified by a (Δ) on schematics and on the parts list in this Service Data and its bulletins. Before servicing this instrument, it is important that the service technician read and follow the "Safety Precautions" in the Basic Service Data.

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## RP1882B VOLTAGE CHART

### IC3-TC9318BF-001

Pin No.	1	2	3	4	5	6	7	8
AM	1.52	1.52	1.52	1.52	1.52	1.52	1.52	1.52
FM	1.52	1.52	1.52	1.52	1.52	1.52	1.52	1.52
Pin No.	9	10	11	12	13	14	15	16
AM	1.52	1.52	1.52	1.52	1.52	1.52	1.52	1.52
FM	1.52	1.52	1.52	1.52	1.52	1.52	1.52	1.52
Pin No.	17	18	19	20	21	22	23	24
AM	1.52	1.52	1.56	1.56	1.56	1.56	1.56	1.56
FM	1.52	1.52	1.56	1.56	1.56	1.56	1.56	1.56
Pin No.	25	26	27	28	29	30	31	32
AM	1.56	1.56	1.16	1.16	0.48	0.08	2.30	0
FM	1.56	1.56	1.04	1.00	0.51	0.08	0	0
Pin No.	33	34	35	36	37	38	39	40
AM	0	2.25	0	0	0	0	0	0
FM	0	2.17	0	0	0	0	0	0
Pin No.	41	42	43	44	45	46	47	48
AM	3.05	0.90	0.90	0.90	3.05	0	0	0
FM	3.05	0.66	0.66	0.66	3.05	0	0	0
Pin No.	49	50	51	52	53	54	55	56
AM	3.05	1.28	0.94	1.81	0	0	0.74	2.45
FM	3.02	1.24	0.95	2.13	0	1.32	0	2.34
Pin No.	57	58	59	60	61	62	63	64
AM	2.45	0.42	0.58	1.40	3.03	0.75	2.27	1.52
FM	2.34	0.44	0.55	1.40	3.03	0.75	2.27	1.52

### IC1-TA2104AFN

Pin No.	1	2	3	4	5	6	7	8
AM	0	0	1.15	2.90	2.94	2.26	2.94	0
FM	0	0.80	0	2.65	2.88	2.52	2.87	0
Pin No.	9	10	11	12	13	14	15	16
AM	0.24	2.40	1.16	1.16	0	0.70	0.70	1.00
FM	0.06	2.10	1.15	1.15	2.02	2.27	0.70	1.16
Pin No.	17	18	19	20	21	22	23	24
AM	1.04	2.40	2.76	2.93	2.93	2.93	2.93	2.93

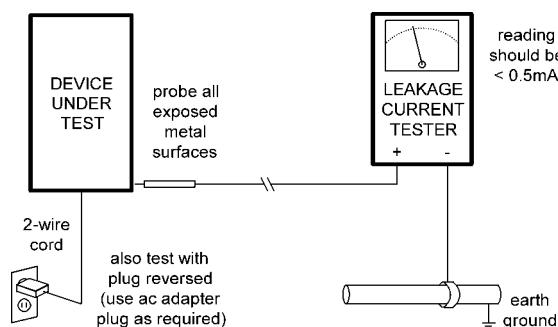
# SAFETY PRECAUTIONS

1. Before returning the instrument to the customer, always make a safety check of the entire instrument, including, but not limited to, the following items:

- a. Be sure that no built-in protective devices are defective and/or have been defeated during servicing. (1) Protective shields are provided on this instrument to protect both the technician and the customer. Correctly replace all missing protective shields, including any removed for servicing convenience. (2) When reassembling the instrument, be sure to put back in place all protective devices, including, but not limited to, nonmetallic control knobs, insulating fishpapers, adjustment and compartment covers/shields, and isolation resistor/capacitor networks. **Do not operate this instrument or permit it to be operated without all protective devices correctly installed and functioning.** Servicers who defeat safety features or fail to perform safety checks may be liable for any resulting damage, and may expose themselves and others to possible injury.
- b. Be sure that there are no cabinet openings through which an adult or child might be able to insert their fingers and contact a hazardous voltage. Such openings include, but are not limited to, (1) excessively wide cabinet ventilation slots, and (2) improperly fitted and/or incorrectly secured cabinet covers.
- c. **Leakage Cold Check** - With the instrument AC plug removed from any AC source, connect an electrical jumper across the two AC plug prongs. Place the instrument AC switch in the *on* position. Connect one lead of an ohmmeter to the AC plug prongs tied together and touch the other ohmmeter lead in turn to each push button/customer control, exposed metal screws, metallized overlays and to each cable connector. If the measured resistance is less than 1.0 megohm or greater than 5.2 megohm an abnormality exists that must be corrected before the instrument is returned to the customer. Repeat this test with the AC switch in the *off* position.

- d. **Leakage Current Hot Check**

On completely assembled instrument, plug the AC line cord directly into a 120V AC outlet. (Do not use an isolation transformer during this test.) Use a leakage current tester or a metering system that complies with American National Standards Institute (ANSI) C101.1 *Leakage Current for Appliances and Underwriters Laboratories (UL) 1492 (Section 67)*. Measure for current from a known earth ground (metal waterpipe, conduit, etc.) to all exposed metal or conductive parts of the instrument (antenna connections, handle bracket, metal cabinet, screwheads, metallic overlays, push-buttons, control shafts, etc.), especially any exposed metal parts that offer an electrical return path to the chassis. Any current measured must not exceed 0.5 milliamp. Reverse the instrument power cord plug in the outlet and repeat the test.



ANY MEASUREMENTS NOT WITHIN THE LIMITS SPECIFIED HEREIN INDICATE A POTENTIAL SHOCK HAZARD THAT MUST BE ELIMINATED BEFORE RETURNING THE INSTRUMENT TO THE CUSTOMER OR BEFORE CONNECTING TO ANTENNA OR ACCESSORIES.

2. e. **Interconnected Equipment AC Leakage Test**

Avoid shock hazards. The instrument, accessory, or cable(s) to which this instrument is connected should have the applicable sections of the leakage resistance cold check and the leakage current hot check performed. Do not connect this instrument to an antenna, cable or accessory that exhibits excessive leakage currents.

2. Read and comply with all caution and safety-related notes on or inside the instrument cabinet, and on the chassis.
3. **Design Alteration Warning** - Do not alter or add to the mechanical or electrical design of this instrument. Design alterations and additions, including, but not limited to, circuit modifications and the addition of items such as auxiliary audio output connections, cables and accessories, etc., might alter the safety characteristics of this instrument and create a hazard to the user. Any design alterations or additions will void the manufacturer's warranty and will make you, the servicer responsible for personal injury or property damage resulting therefrom.
4. Observe original lead dress. Take extra care to assure correct lead dress in the following areas: (a) near sharp edges, (b) near thermally hot parts - be sure that leads and components do not touch thermally hot parts, and (c) the AC supply. Always inspect in all areas for pinched, out-of-place, or frayed wiring. Do not change spacing between components and the printed-circuit board. Check AC power cord for damage.
5. Components, parts and/or wiring that appear to have overheated or are otherwise damaged should be replaced with components, parts or wiring that meet original specifications. Additionally, determine the cause of overheating and/or damage and, if necessary, take corrective action to remove any potential safety hazard.
6. **PRODUCT SAFETY NOTICE** - Many electrical and mechanical parts have special safety-related characteristics, some of which are often not evident from visual inspection, nor can the protection they give be obtained by replacing them with components rated for higher voltage, wattage, etc. Parts that have special safety characteristics are identified in this service data by a (Δ) on schematics and in the parts list. Use of a substitute replacement that does not have the same safety characteristics as the recommended replacement part in this service data parts list might create shock, fire and/or other hazards. Product Safety is under review continuously and new instructions are issued whenever appropriate. For the latest information, always consult the appropriate current service literature.

## REPLACEMENT PARTS

### BEFORE REPLACING PARTS, READ THE FOLLOWING:

**Approved Substitute Stock Numbers -** Before ordering stock numbers in the part list, look for an approved substitute stock number in the current Price Schedule. This will minimize your service time and avoid ordering parts you already have in stock.

**PRODUCT SAFETY NOTE:** Components marked with a critical safety symbol have special characteristics important to safety. Before replacing any of these components, carefully read the PRODUCT SAFETY NOTICE in the basic service data. Do not degrade the safety of the set through improper servicing. Although assemblies as a whole may not be marked with a critical safety symbol, replacement of assemblies with other assemblies not approved may result in a safety hazard.

 **Critical Safety Symbol**

● **Not Eligible For Warranty**

**Warranty Status of Assemblies and Parts -** All assemblies and components shown in this part list are eligible for warranty exchange or replacement except those with a dot shown to the left of the Description. Assemblies and components with a dot to the left of the Description are NOT eligible for warranty exchange or replacement.

**Warranty replacement of cabinet parts requires the approval of a Thomson Consumer Electronics Field Service Manager.**

**Warranty Status and Specifications of assemblies and components are subject to change without notice. Consult the TCE Parts Pricing Microfiche for the latest warranty status information.**

**@NOTE:** When ordering components that are listed more than once in this part list, always adhere to the serial number application guidelines given in the description column. If a serial number application guideline is not given, always select the component with a value, rating, other specification or identification marking(s) that match those of the corresponding component in the instrument you are servicing.

<b>Symbol</b>	<b>Stock</b>	<b>Drawing</b>	<b>Description</b>
<b>RP-1882B</b>			
<b>CABINET ASY</b>			
CAB	98A32596	5023383020	CABINET BACK
CAB	98A32595	5003383020	CABINET FRONT
CAS	92A32607	151E888ZA0	CASSETTE DECK MCA-888-AZ
CLI	3A32606	5563383020	CLIP BELT
CON	2A32609	6613383010	CONTACT BATTERY +
CON	2A32610	6613383020	CONTACT BATTERY -
COV	9A32599	5123383010	COVER DOOR CASSETTE
COV	9A32599	5123383010	COVER DOOR CASSETTE
DOO	9A32597	5103383010	DOOR BATTERY
DOO	9A32598	5113383020	DOOR CASSETTE
KNO	43A32602	5333383010	KNOB STOP
KNO	43A32603	5343383010	KNOB REW
KNO	43A32605	5373383010	KNOB REVERSE
KNO	43A32601	5323383010	KNOB PLAY
KNO	43A32600	5313383B10	KNOB F. FWD
KNO	43A32604	5363383010	KNOB REW. MODE
SPR	3A32608	6603383010	SPRING CASSETTE DOOR
<b>ELECTRICAL COMPONENTS</b>			
CF1	36A27386	143E107MS3	FILTER CER 10.7MHZ
CF2	36A32612	143D450NB0	FILTER CER
CF3	36A32611	143D107MA0	FILTER CER DISCRIMINATOR
D1	16A21137	114V101000	DIODE 1SV101
D10	16A31623	1144148000	DIODE 1N4148
D11	16A31623	1144148000	DIODE 1N4148
D12	16A31623	1144148000	DIODE 1N4148
D16	16A31623	1144148000	DIODE 1N4148
D17	16A31623	1144148000	DIODE 1N4148

<b>Symbol</b>	<b>Stock</b>	<b>Drawing</b>	<b>Description</b>
D19	16A31623	1144148000	DIODE 1N4148
D2	16A27382	114V149000	DIODE 1SV149
D3	16A21137	114V101000	DIODE 1SV101
D4	63A32578	1179635000	LCD DISPLAY
D5	16A31623	1144148000	DIODE 1N4148
D6	16A31623	1144148000	DIODE 1N4148
D8	16A31623	1144148000	DIODE 1N4148
D9	16A31623	1144148000	DIODE 1N4148
IC1	33A32575	1102104AFN	IC TA02104AFN
IC2	33A27379	110G668FT2	IC LAG66FT2
IC3	33A32576	1109318BF1	IC TC9318BF-001
J1	41A27389	145H005000	JACK HEADPHONE
LCD1	63A32578	1179635000	LCD DISPLAY
Q1	15A15171	1129018G00	TRANSISTOR 9018C
Q10	15A32577	1129014C00	TRANSISTOR 9014C
Q11	15A32577	1129014C00	TRANSISTOR 9014C
Q12	15A32327	1129012G00	TRANSISTOR 9012G
Q13	15A32327	1129012G00	TRANSISTOR 9012G
Q2	15A15170	1129015C00	TRANSISTOR 9015C
Q3	15A32577	1129014C00	TRANSISTOR 9014C
Q4	15A32577	1129014C00	TRANSISTOR 9014C
Q5	15A25028	1122458Y00	TRANSISTOR 2SC2458Y
Q6	15A27380	112K118R00	TRANSISTOR 2SK118-NEW-R
Q7	15A25028	1122458Y00	TRANSISTOR 2SC2458Y
Q8	15A25028	1122458Y00	TRANSISTOR 2SC2458Y
Q9	15A32577	1129014C00	TRANSISTOR 9014C
S1	39A28474	14922D3PG5	SWITCH BAND SW
T2	15A31021	1254984000	TRANSISTOR
T4	15A31023	1255207DD0	TRANSISTOR
TC1	42A32614	1486H3B302	CAPACITOR TRIMMER 10PF
TC2	42A32614	1486H3B302	CAPACITOR TRIMMER 10PF

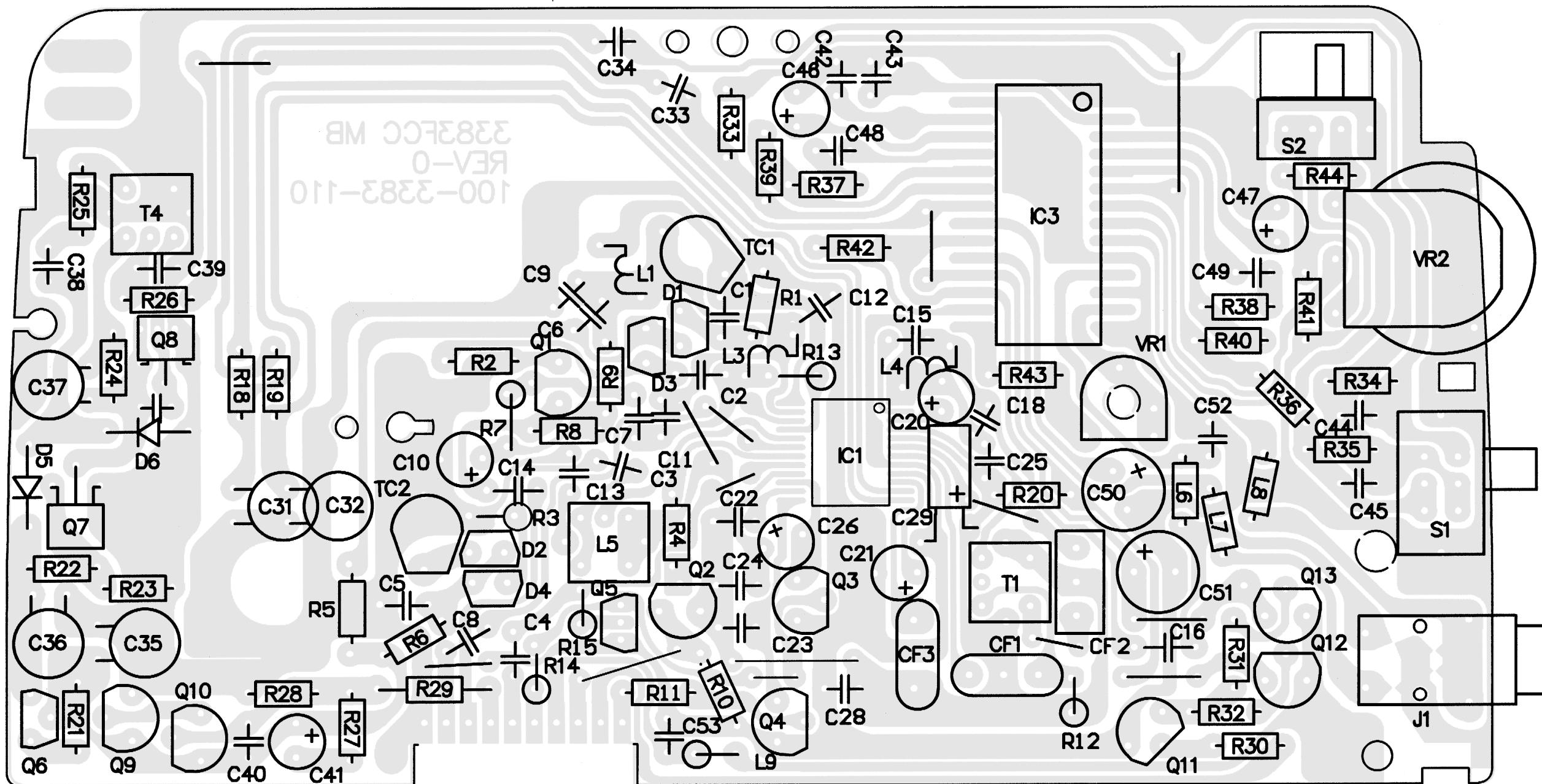
## REPLACEMENT PARTS (Continued)

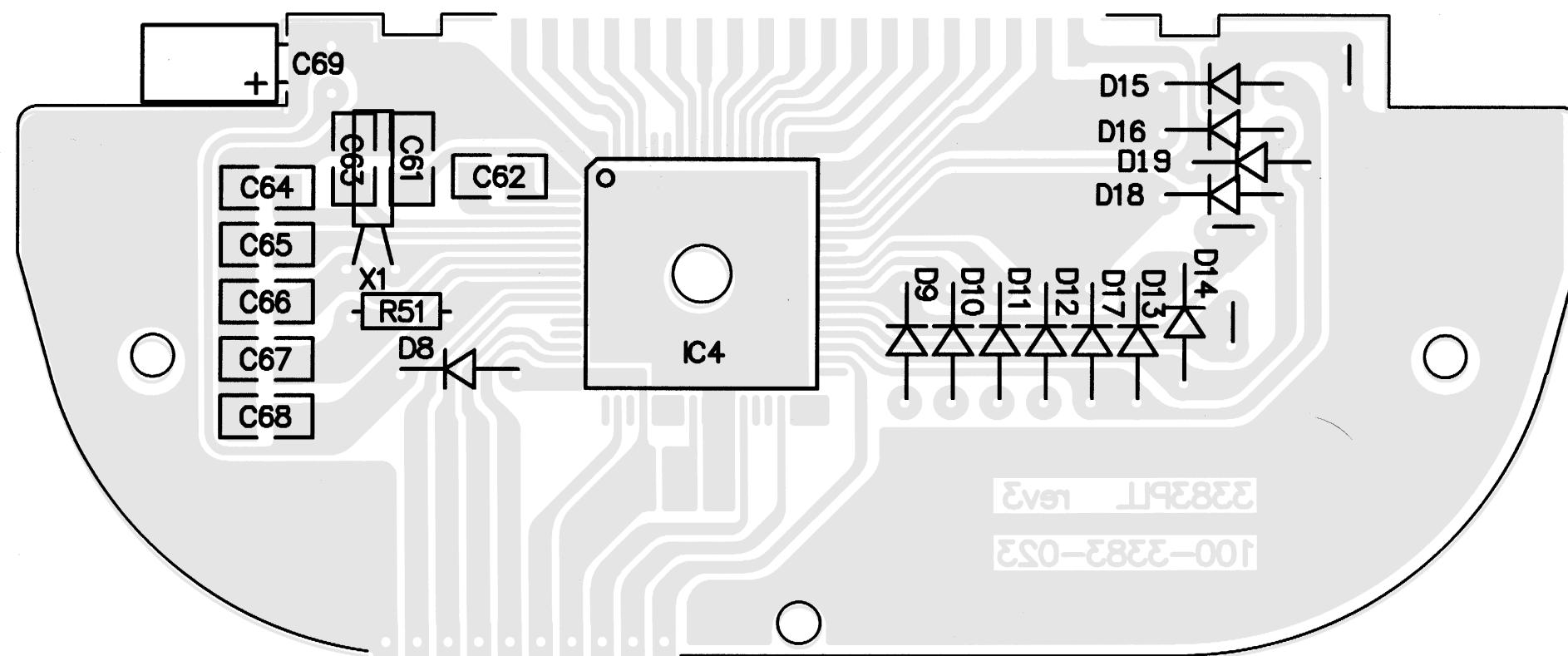
<u>Symbol</u>	<u>Stock</u>	<u>Drawing</u>	<u>Description</u>
VAR1	42A32614	1486H3B302	CAPACITOR TRIMMER 10PF
VAR2	42A32613	146IN10C54	RESISTOR VAR VOLUME
X1	41A27388	144B753C00	CRYSTAL 75KHZ

## MISCELLANEOUS

HEA	68A32615	7143383010	HEADPHONE
LAB	4A32616	POP1882	LABEL POP
USE	UCRP1882	UCRP1882	USE AND CARE GUIDE

<u>Symbol</u>	<u>Stock</u>	<u>Drawing</u>	<u>Description</u>





## RP1882B MAIN SCHEMATIC

