



Sanyo DC-PT100XE Service Manual

Dvd personal theater system

1
2
3
4
5
6
7
8
9
10
11
12
13
14
15
16
17
18

19
20
21
22
23
24
25
26
27
28
29
30
31
32
33
34
35
36
37
38
39
40
41
42
43
44

• PAGE

1

OF 44 GO

•

[Table of Contents](#)

-

Troubleshooting

•

Bookmarks

[Download this manual](#)

Quick Links



Service Manual

CONTENTS

Laser beam safety precaution	1
DVD Mechanism Replacement	1
Trouble shooting	2
Service mode	4
How to load software for MPEG P.W.Board	7
Cautions for PWB or IC Assy exchange	7
Tuner adjustment	8
Tuner setup	9
Exploded View (Cabinet & Chassis)	10
Parts List	11
Exploded View & Parts List (Sub woofer speaker)	15
LCD Display	17
IC Block Diagram & Description	18



[Block diagram](#) 34
[Wiring Connection](#) 36

This service manual consists of "JCX-PT100/XE" (Main unit : 129 674 01) ,
 "ASX-PT100W/XE" (Sub Woofer Speaker : 165 082 01) and
 "SX-PT100F/XE" (Front Speaker system : 165 083 01).

DVD Personal Theater System

FILE NO.

DC-PT100

PRODUCT CODE No.
129 675 01

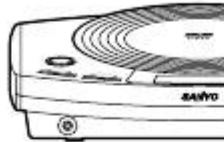
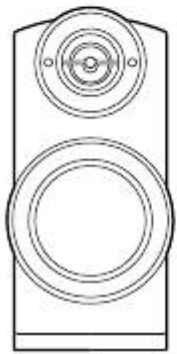
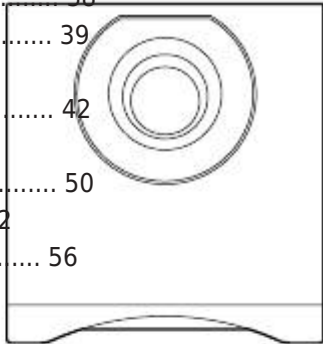
[Schematic Diagram](#)

[\(FRONT\)](#) 37
[\(TUNER\)](#) 40
 (MAIN) Loder section 44
 MPEG section 46
 Preamplifier section 48
 (SPEAKER) 54

[Wiring diagram](#)

[\(LED\) Parts Side View](#) 38
[Pattern Side View](#) 38

(FRONT) 38
 (SWITCH) Parts Side View 39
 Pattern Side View 39
 (TUNER) Parts Side View 42
 Pattern Side View 42
 (MAIN) Parts Side View 50
 Pattern Side View 52
 (SPEAKER) Power Transformer 56
 Main 56
 Terminal 56



REFERENCE No.
(XE)
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[Next Page](#)

1
2
3
4
5

Related Manuals for Sanyo DC-PT100XE

[Home Theater System Sanyo DC-PT100 Service Manual](#)

Dvd personal theater system (30 pages)

[Home Theater System Sanyo DC-PT100 Instruction Manual](#)

Dvd personal theater system (25 pages)

[Home Theater System Sanyo DC-TS760 Instruction Manual](#)

Sanyo dvd home theater system instruction manual dc-ts760 (29 pages)

[Home Theater System Sanyo DC-TS760 Service Manual](#)

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[Home Theater System Sanyo DC-TS760 Service Manual](#)

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[Home Theater System Sanyo DC-DAV821 Instruction Manual](#)

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[Home Theater System Sanyo DC-TS750 Service Manual](#)

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[Home Theater System Sanyo DCS-TS750 Service Manual](#)

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[Home Theater System Sanyo DC-TS765KR SS Service Manual](#)

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[Home Theater System Sanyo DCS-AVD8501 Service Manual](#)

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[Home Theater System SANYO DC-TS960WL Service Manual](#)

(72 pages)

[Home Theater System Sanyo FISHER DC-TS960WL Service Manual](#)

(72 pages)

[Home Theater System Sanyo DWM-4500 Service Manual](#)

(64 pages)

Summary of Contents for Sanyo DC-PT100XE

[Page 1: Table Of Contents](#)

FILE NO. Service Manual DVD Personal Theater System DC-PT100 (XE) PHONES REMOTE CONTROLLER RB-PT100RDS PRODUCT CODE No. CONTENTS 129 675 01 Laser beam safety precaution 1 Schematic Diagram DVD Mechanism Replacement1 (FRONT) 37 Trouble shooting 2 (TUNER)

[Page 2: Laser Beam Safety Precaution](#)

LASER BEAM SAFETY PRECAUTION • Pick-up that emits a laser beam is used in this CD player section. CAUTION : USE OF CONTROLS OR ADJUSTMENTS OR PERFORMANCE OF PROCEDURES OTHER THAN THOSE SPECIFIED HEREIN MAY RESULT IN HAZARDOUS RADIATION VIDEO

EXPOSURE TO SUBWOOFER LASER OUTPUT ..

[Page 3: Trouble Shooting](#)

TROUBLE SHOOTING VIDEO COMPOSITE OUT ; OK TUNER OUTPUT ; OK AUX OUTPUT ; OK DVD/CD OUTPUT ; NG NO COLOR or ABNORMAL IC470 SYSCON IC494 REG. LOADER CHANGE AC CORD PLUG LOADER CHANGE UK,XE,JP ONLY X4700 SYS-CLK IC495 REG. 5.6V,9V,±12V ;...

[Page 4: Service Mode](#)

SERVICE MODE SERVICE MODE A. Market / Region SETUP C. Setup Procedures In the initial condition for this model, Market and Region Region M a r k e t 1. Displaying SERVICE MODE screen information are undefined. Display Service Mode screen following the instructions "How to BackendVersion S21225A0 In the following cases, be sure to set up Market/Region.

[Page 5](#) LoaderVersion 16 Z08 W03 Backend version S 21225 A 0 Value Brand (S : SANYO , F : FISHER) Version (2 0 0 2 . 12 . 25) Sub Version (A,B,..Z) Region (0 : Region undefined 1 ~ 6 : Region defined)

[Page 6: How To Load Software For Mpeg P.w.board](#)

SERVICE MODE D. IMPORTANT NOTE 1. Once the "Market/Region" settings are written into EEPROM (IC801) on the DVD substrate, they cannot be reset. (However, updating the system using CD-R enables you to make new settings.) 2. While the Internal Setup screen is displayed, pushing the Power button enables you to terminate the operations without making any settings.

[Page 7: Tuner Adjustment](#)

TUNER ADJUSTMENT • Use a plastic screw driver for adjustments. • MODE : ST (Stereo) • Speaker impedance : 8 ohms • TUNING FM : 87.5 - 108MHz AM : 522 - 1611 kHz FM DET AM DET HP-R2 HP-R1 HP.GND1 HP-L2 +12V...

[Page 8: Tuner Setup](#)

TUNER SETUP 1. DESTINATION SETTING 3. RDS FUNCTION and KARAOKE FUNCTION 1.1 Press "POWER" button to turn on the power. SETTING 1.2 Change to "AUX Function" or "DVD/CD Function". 3.1 When the tuner destination selects, RDS function can 1.3 Press "SOUND" button and "POWER" button on the be selected by pressing "PRESET(PREV)"...

[Page 9: Exploded View \(Cabinet & Chassis\)](#)

EXPLODED VIEW (CABINET & CHASSIS) Y06 Y06 This is a basic exploded view. - 10 -...

[Page 10: Parts List](#)

PARTS LIST PRODUCT SAFETY NOTICE EACH PRECAUTION IN THIS MANUAL SHOULD BE FOLLOWED DURING SERVICING. COMPONENTS IDENTIFIED WITH THE IEC SYMBOL IN THE PARTS LIST AND THE SCHEMATIC DIAGRAM DESIGNATED COMPONENTS IN WHICH SAFETY AND !!! PERFORMANCE CAN BE OF SPECIAL SIGNIFICANCE. WHEN REPLACING A COMPONENT IDENTIFIED BY , USE ONLY THE !!! REPLACEMENT PARTS DESIGNATED, OR PARTS WITH THE SAME RATINGS OF RESISTANCE, WATTAGE OR VOLTAGE THAT...

[Page 11](#) PARTS LIST LED P.W.BOARD ASSY REF.NO. PART NO. DESCRIPTION S6008 645 037 2759 SWITCH,PUSH REF.NO. PART NO. DESCRIPTION 645 006 5958 SWITCH,PUSH 1P-1T 614 327 2670 ASSY,PWB,LED(Only initial) 614 220 5471 SWITCH,TACT D6901 408 052 7808 LED SECU4L01C*,AQUA BLUE 614 240 1002 SWITCH,TACT D6902 408 052 7709 LED SECU4E01C*,BLUE S6009...

[Page 12](#) PARTS LIST REF.NO. PART NO. DESCRIPTION REF.NO. PART NO. DESCRIPTION XF222 645 010 0079 CERAMIC FILTER 10.70MHZ IC472 409 543 6409 IC KRX101U 614 240 2917 FILTER,CERAM IC473 409 505 0803 IC PST3627U,RESET 614 254 3214 FILTER IC480 409 474 6103 IC LC75342M XF231 614 246 0849 FILTER IC481...

[Page 13](#) PARTS LIST REF.NO. PART NO. DESCRIPTION REF.NO. PART NO. DESCRIPTION L8202 645 034 7887 INDUCTOR,1000 OHM 405 141 5707 TR DTA114YKA 645 020 1813 INDUCTOR,1000 OHM Q4793 405 159 0503 TR KRC107S 645 045 7869 IMPEDANCE,1000 OHM P 405 141 5608 TR DTC114YKA 645 020 2001 INDUCTOR,1000 OHM Q4850 405 146 2107 TR KTC3875-Y...

[Page 14: \(Sub Woofer Speaker\)](#)

EXPLODED VIEW (SUB WOOFER SPEAKER) This is a basic exploded view. PARTS LIST (SUB WOOFER SPEAKER) SUB WOOFER SPEAKER (ASX-PT100W/XE) CABINET & CHASSIS REF.NO. PART NO. DESCRIPTION 411 021 3701 SCR S-TPG BIN 3X10, REF.NO. PART NO. DESCRIPTION HOLDER P.T-P.REAR, 614 328 9302 ASSY,BOX,SPEAKER,(PROSONIC) COVER H.S-P.REAR, 614 327 8504 HOLDER,POWER TRANS...

[Page 15](#) PARTS LIST POWER TRANSFORMER P.W.BOARD ASSY REF.NO. PART NO. DESCRIPTION Q3200 405 151 4400 TR KTD1303 REF.NO. PART NO. DESCRIPTION 405 021 0204 TR 2SD1012-F-SPA 614 327 4308 ASSY,PWB,MAIN,PT(Only initial) 405 021 0600 TR 2SD1012-G-SPA C3900 403 349 3303 CERAMIC 0.01U M 250V 405 033 6706 TR 2SD1468S-R 403 366 7803 CERAMIC 0.01U M 250V 405 033 6805 TR 2SD1468S-S...

[Page 16: Lcd Display](#)

LCD DISPLAY LCD60 PAD NO. COM1 COM2 COM3 COM4 PAD NO. COM1 COM2 COM3 COM4 COM2 MONO COM3 PROG. COM4 REP. BASS SLEEP TIME TIME - 17 -...

[Page 17: Ic Block Diagram & Description](#)

IC BLOCK DIAGRAM & DESCRIPTION IC100 LA9703WL-MPB (DVD Player Frontend Processor) PREF SREF SREF1 AGOF DVD/CD FC BST AGOF PDRF ISET XHTR DOOUT LPF1 SREF LPF2 XHTR FEBL FIN1 WO/PP LPF1 SREF PREF LPF2 SREF FIN2 FEBL XHTR SREF DPD/TE PIN1 SREF RREC...

[Page 18](#) IC BLOCK DIAGRAM & DESCRIPTION IC130 LC78663NRW (DVD/CD Servo Controller) A/D Block Servo Block D/A Block 8 bits Servo DSP (16x16+32 -> 32) RF-PH SLDO RF-BH SPDO RREC TBAL RF I/F Block 8 bits FBAL FC Counter TSTDO TR Counter TSTDI EV Counter EVENT...

[Page 19](#) IC BLOCK DIAGRAM & DESCRIPTION IC130 LC78663NRW (DVD/CD Servo Controller) BROCK NAME SUPPLEMENT BLOCK NAME SUPPLEMENT DVDD1 Survo A/D AD1 I/O power supply[Digital 3.3V] Survo A/D AD0 DVSS Digital GND Survo A/D JV CD data EMPH DE-EMP monitor Monitor 0 RREC Survo A/D RREC AV data...

[Page 20](#) IC BLOCK DIAGRAM & DESCRIPTION IC131 M11L416256SA-35T(DRAM) DATA-IN BUFFER CONTROL LOGIC CASL IO15 CASH CLOCK GENERATOR DATA-OUT BUFFER COLUMN COLUMN DECODER ADDRESS BUFFER SENSE AMPLIFIERS REFRESH I/O GATING CONTROLER 512 x 16 REFRESH COUNTER 512 x 512 x 16 MEMORY ROW.

[Page 21](#) IC BLOCK DIAGRAM & DESCRIPTION IC160 BA5937AFP (Power Driver for CD) VCC(CH1,4) VCC(CH3) LOGIC THERMAL LEVEL LEVEL SHUT SHIFT SHIFT DOWN VOLTAGE CTRL LEVEL SHIFT MUTE CH1,4 VCC(CH2) D;Drive Buffer Pin No. Pin name Function Pin No. Pin name Function Pin No.

[Page 22](#) IC BLOCK DIAGRAM & DESCRIPTION IC161 BA6849FP(CD-ROM Motor Driver) DRIVER N.C. CURRENT SENSE AMP GAIN N.C. CONTROL N.C. N.C. HALL AMP TORQUE SENSE AMP N.C. D R Q N.C. SHORT BRAKE Hall bias Description Description Pin No. Name Pin No. Name N.C.

[Page 23](#) IC BLOCK DIAGRAM & DESCRIPTION IC241 LC72121M-D(PLL Synthesizer) Vssx REFERENCE PHASE DETECTOR DIVIDER CHARGE PUMP XOUT SWALLOW COUNTER UNLOCK FMIN 1/16, 1/17 4bits DETECTOR AOUT Vssa 12bits PROGRAMMABLE AMIN DIVIDER UNIVERSAL DATA SHIFT REGISTER LATCH IFIN I / F COUNTER POWER RESET Vssd...

[Page 24](#) IC BLOCK DIAGRAM & DESCRIPTION IC251 LC72722 (RDS Signal Processor) FLOUT CIN VREF CLOCK Vddd Vdda RECOVERY REFERENCE (57kHz) (1187.5Hz) VOLTAGE Vssd Vssa VREF 57kHz DATA SMOOTHING ANTIALIASING RDS-ID (SCF) MPXIN DECODER FILTER FILTER SYNC R A M ERROR CORRECTION SYNC/EC CONTROLLER (24 BLOCK DATA) (SOFT DECISION)

[Page 25](#) IC BLOCK DIAGRAM & DESCRIPTION IC470 M38507M8-168FP(Op.Amp Micro Computer) RESET Sub- Sub- clock clock input output Ciock generating C P U circuit R A M R O N Timer 1(8) Prescaler 12(8) Timer 2(8) Prescaler X(8) Timer X(8) CNTR Timer Y(8) Prescaler Y(8) Watchdog timer...

[Page 26](#) IC BLOCK DIAGRAM & DESCRIPTION IC480 LC75342M(Function Switch / Electric Volume / 2 Band LSELO LIN LTRE LBASS1 LBASS2 LOUT TEST LVref CONTROL CIRCUIT LOGIC CIRCUIT INTERFACE CONTROL CIRCUIT RVref Vref RSELO RIN RTRE RBASS1 RBASS2 ROUT IC481

LA2610(Analog Surround IC) LEVEL ANALOG ON/OFF...

[Page 27](#) IC BLOCK DIAGRAM & DESCRIPTION IC490(STR-A6151 Switching Regulator) Startup UVLO Internal Bias LATCH DELAY Power MOS FET OFF Timer Drive PWM Latch Bias - Blanking Source/OCB Burst Discharge Buffer O.V.P= Overvoltage protection circuit FB/OLP T.S.D= Thermal shutdown circuit Function of Terminal Pin No.

[Page 28: Connection Diagram](#)

IC BLOCK DIAGRAM & DESCRIPTION IC494 PQ070XZ01Z(Regulator) IC495 PQ2L2182MS (Regulator) DC INPUT(Vin) DC OUTPUT(Vo) EXCLUSIVE IC ON/OFF OUTPUT CONTROL (Vc) VOLTAGE ADJUST (Vadj) CONTROL Pin No. Symbols Description DC INPUT ON/OFF CONTROL DC OUTPUT Vadj OUTPUT VOLTAGE ADJUSTMENT IC806 74VHCT08AMTCX (Quad 2-input and Gate) 13 A 12 B 11 O...

[Page 29](#) IC BLOCK DIAGRAM & DESCRIPTION IC601 LC75854E (LCD Driver)SEGMENT DRIVER & LATCH 48 47 46 45 44 43 42 41 40 39 38 37 36 35 34 33 COMMON TEST...

[Page 30](#) IC BLOCK DIAGRAM & DESCRIPTION IC818 LE28DW8163T-70T-MPB (8M Bit Flash) CHARGE PUMP COLUMN DECODER BYTE# & VOLTAGE DQ15/A-1 REFERENCE CIRCUIT DQ14 DQ13 128Kx16 ADDRESS BUFFER DQ12 & LOW DECODER 256Kx8 LATCH CIRCUIT FLUSH RESET# BANK2 DQ11 384Kx16 RY/BY# DQ10 788Kx8 FLUSH BANK1 A18-A0,A-1...

[Page 31](#) IC BLOCK DIAGRAM & DESCRIPTION IC822 LC3816161ET-70-MPB (Synchronous DRAM) Bank select Data input register 14 LDQM 2,3, 5,6, 512K 8,9, 11,12, 512K 39,40, 42,43, 20~24 45,46, 27~32 48,49 Column decoder Latency & burst length LCKE Programming register LRAS LCBR LDQM LCAS LWCBR Timing register...

[Page 32](#) IC BLOCK DIAGRAM & DESCRIPTION IC871 PCM1748E (Digital to Analog converter) LRCK Audio Serial Port Output Amp and DATA Low-pass Filter Oversampling Enhanced Digital Filter Multi level with Delta Sigma Function Modulator ML 15 Controller Serial MC 14 Control Output Amp and Port Low-pass Filter MD 13...

[Page 33: Block Diagram](#)

BLOCK DIAGRAM JCX-PT100 Mechanism MAIN PWB (LOADER,MPEG,PRE AMP) ASSY 3.3V 2.5V 3.3V IC131 CN803 PICK UP : SF-HD6AVST2 FOST,TOST M11L4146256SA CN360 COMPONENT 4MB DRAM CN870 D1/D2 OUT VIDEO OUT CN480 X1500 S-VIDEO OUT AUX IN D TERMINAL PWB CN400 CN871 16.9344MHZ SPDIF OUT (JP ONLY)

[Page 34: Wiring Connection](#)

WIRING CONNECTION SCHEMATIC DIAGRAM (FRONT) SUBWOOFER CN304 (4P) To Mechanism ASSY To TOP WINDOW To SW PWB MOTOR WR300 AC IN WR301 CN301 FU300 CN300 T1A L 250V CN305 (3P) TERMINAL P.W.B MAIN P.W.B 9 10 11 CN306 CN307 (10P) (10P) SPEAKER TERMINAL CN311...

[Page 35: Wiring Diagram](#)

WIRING DIAGRAM LED P.W.BOARD Pattern Side View SWITCH P.W.BOARD Pattern Side View LED P.W.BOARD Parts Side View SWITCH P.W.BOARD Parts Side View D6901 LED1 D6901 LED2 SLD+ SLD- 1AD4B10D2000B F01 94V-0 LED2 CN681 LED1 D6902 D6902 CN682 LED2 LED1 *CLS_SW DGND CN606 *OPN_SW...

[Page 36](#) SCHEMATIC DIAGRAM (TUNER) Q2310 KTC3875 U2101 XF222 R2331 C2332 Q2201 KTC3193 0.01 FM-ANT FM.GND C2306 R2306 XF221 CN201 2.7K XF231 ANT. C2322 XF233 TERMINAL 1000P C2321 R2103 0V-TP1 C2305 0.47 75ohm R2301 [1/4W] FM IF AM MIX AM IF FM DET MUTE FM/AM MONO...

[Page 37: \(Led\) Parts Side View](#)

WIRING DIAGRAM (TUNER) Parts Side View C2307 R2101 C2311 C2328 C2327 C2503 C2505 R2308 C2314 Q2451 Q2451 Q2451 C2308 R2103 R2102 C2103 U2101 1AD4B10D2014A X2501 C2324 CN291 Q2902 C2312 R2303 94V-0 F01 L2903 Q2901 C2502 C2504 C2506 R2711 IC231 C2512 C2904 D2301 LA1844...

[Page 38](#) SCHEMATIC DIAGRAM (MAIN) Loader Section PRODUCT SAFETY NOTICE R1830 Each

precaution in this manual should be followed during servicing. Components identified with the IEC symbol mark in the parts list and the schematic diagram designated components R1831 !!! <7mm>...

[Page 39](#) SCHEMATIC DIAGRAM (MAIN) MPEG Section CN871 SPDIF_SEL +12V L8582 DGND 1000 C8990 SPDIF IC859 -12V NC7SZ157 GDAC VGND DGND SPDIF 3.3V SPDIF C8590 From DG SPDIF R8580 3.3V IC881 3.3V KRX101U R8720 R8722 *MUTEC ZERO 10/50 1.8V IC806 C8720 AMUTEC 74VHCT08A L8060 16 15 14 13 12 11 10 9...

[Page 40](#) SCHEMATIC DIAGRAM (MAIN) Preamplifier Section L/R-BUFFER CN480 R4110 AUX_L IC411 NJM4556AL AUX-IN [CARBON 1/4W] R4160 R4161 C4250 C4150 R4152 R4252 HP-L AUX_R R4260 R4261 +12V -12V R4210 HP-R [CARBON 1/4W] Q4251 Q4151 CN481 KTD1304 KTD1304 C4802 C4140 HP_L-CH C4803 HP-L 100P 1/50 100P...

[Page 41](#) WIRING DIAGRAM (MAIN) Parts Side View CN481 Q4251 Q4151 TU_DO C1045 R1072 C1042 5.6V X1500 R1830 R1073 TU_CE C1890 TU_DI C1820 R1831 TU_CLK AUX-L C1047 C1822 R4110 CAN10 RFGND AMCLK R1074 C1048 HFLIO SYEQ C1046 R1076 C1040 CN480 C1043 49 50 RN100 3.3V R1402...

[Page 42](#) WIRING DIAGRAM (MAIN) Pattern Side View HP_MUTE HP_R HP_L HP_SW A_GND +12V A_GND LDTP1 LDTP2 A_GND LDTP1 LDTP2 VR-CD AMP_STB RF_GND CD/DVD VR-DVD LD-CD MUTE GND-LD LD-DVD RF_GND MGND MGND LCD_DO LCD_DO LCD_DI LCD_DI LCD_CLK LCD_CLK LCD_CE LCD_CE D.GND VOL_JOG D.GND D.GND +5.6V...

[Page 43](#) SCHEMATIC DIAGRAM (SPEAKER) C3708 C3713 C3714 SPEAKER 1000P 0.01 0.01 OUTPUT C_GND IC320 L/R-POWER LM1876TF CN371 SH_GND1 SH_GND SH_GND C_GND SH_GND C_GND L-CH C3707 SH_GND C3704 0.01 C3202 R-CH 100P R3209 C3206 100P A_GND C3706 C3207 R3208 C3709 1000P C3705 C3208 0.01 B_GND...

[Page 44: Main](#)

C3707 C3707 C3707 C3704 C3704 C3704 C3706 C3706 C3706 C3705 C3705 C3705 CN371 C3708 C3708 C3708 CN372 This is a basic wiring diagram. SANYO Electric Co., Ltd. Osaka, Japan Mar./ '04 Printed in Japan - 56 - - 57 -...

This manual is also suitable for:

Dc-pt100