radiomuseum.org: Sound Level Calibrator - Kalibrator für Schallpegelmesser 4230

BRÜEL & KJÆR
Nærum – Denmark

Service Instructions

Sound Level Calibrator

4230

Trouble Shooting

If any faults should occur please check the instrument according to the procedure outlined below.

When a fault has been traced and corrected the voltages and adjustments influenced by the correction must be re-checked. The complete instrument should then be tested according to the "Checking Procedure" to make sure that all basic functions are operative.

The tolerances given in these notes are intended for use as a guide for adjustments.

Before correcting any apparent deviation make sure that the measuring instrument has tolerances small enough not to affect the measurements.

Each Calibrator is individually temperature compensated. ZI 0026 is not interchangeable from one calibrator to another. The repair of a damaged membrane or the piezoelectric bender require special control equipment, and in these cases it is necessary to send the Calibrator to the factory.

Spare Parts

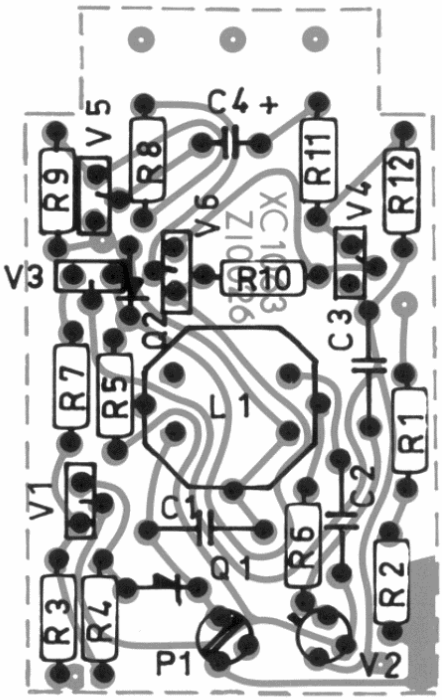
Please state the serial no. of the Calibrator when ordering spare parts.

Replacement of Parts

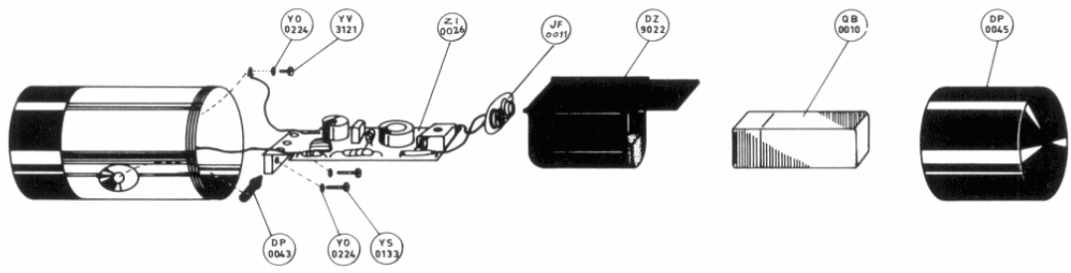
Due to the high requirement for frequency-and temperature stability only spare parts recommended by the factory should be used.

C 1	Polystyrene		0,1 µF/100 V	CS	0411
C 2	–		0,1 µF/250 V	CS	0402
C 3	–		22 µF/250 V	CS	0400
C 4	Electrolytic		100 µF/ 10 V	CE	0313
L 1	Coil		250 mH 20%	LB	0665
N 1	Switch			NT	0201
P 1	Trim. pot		200 kΩ	PG	4205
	Battery		9 V	QB	0010
Q 1	Zenerdiode	BZX 79	5 V/50 mA	QV	1339
Q 2	–	BZX 83	5,6 V/50 mA	QV	1335
R 1	Metal	1/4 W 10%	249 kΩ	RF	5249
R 2	NTC resistor	20%	15 kΩ	RN	0009
R 3	Carbon	1/4 W 5%	270 Ω	RB	2270
R 4	–	– –	33 kΩ	RB	4330
R 5	–	– –	470 kΩ	RB	5470
R 6	Metal	– 1%	665 Ω	RF	2665
R 7	NTC resistor	– 20%	15 kΩ	RN	0009
R 8	Carbon	1/4 W 5%	22 kΩ	RB	4220
R 9	–	– –	2,7 kΩ	RB	3270
R 10	–	– –	820 Ω	RB	2820
R 11	–	– –	330 kΩ	RB	5330
R 12	–	– –	68 kΩ	RB	4680
V 1	Si. transistor	NPN	BCW 82 B	VB	0055
V 2	– –	–	BC 107	VB	0032
V 3	– –	–	BCW 82 B	VB	0055
V 4	– –	PNP	BCW 62 B	VB	0049
V 5	– –	NPN	BCW 82 B	VB	0055
V 6	– –	PNP	BCW 62 B	VB	0049
	Printed Circuit Board			XC	1063
	– – –		with comp.	ZI	0026
	Leather Case			KE	0065

Position of Components



Exploded view



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