
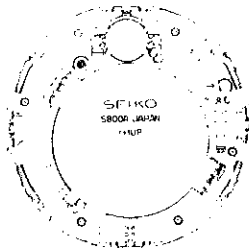


PARTS CATALOGUE/TECHNICAL GUIDE

Cal. S800A

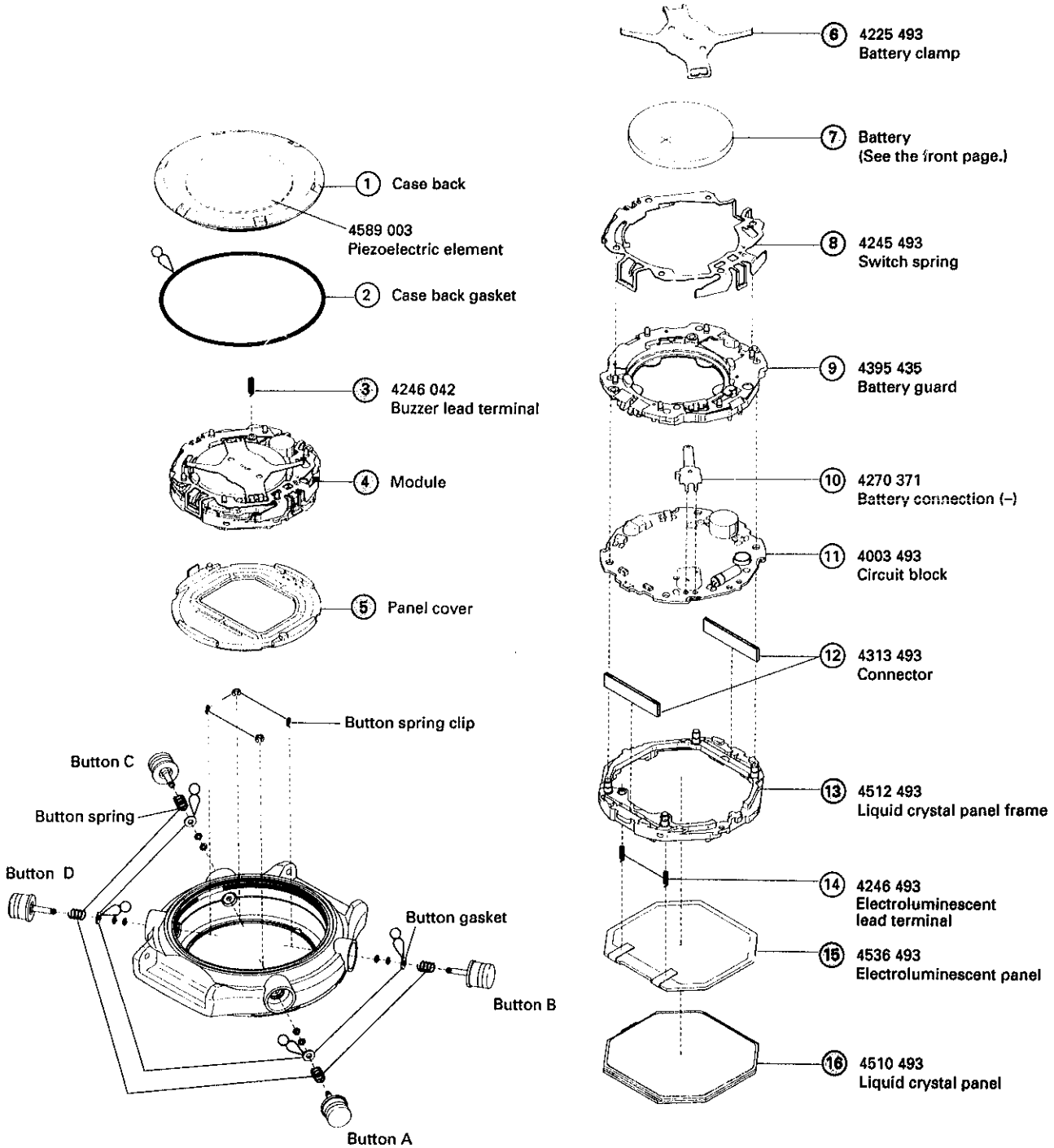
[SPECIFICATIONS]

Item		Cal. No.	S800A
Module			  <p style="text-align: center;">(x 1.0)</p>
Module size	Outside diameter	31.7 mm between 6 o'clock and 12 o'clock sides 31.6 mm between 3 o'clock and 9 o'clock sides	
	Casing diameter	-	
	Height	7.3 mm	
Display medium		Nematic Liquid Crystal, FEM (Field Effect Mode)	
Liquid crystal driving system		Multiplex driving system	
Display system		<ul style="list-style-type: none"> • Time/calendar display <ul style="list-style-type: none"> • Automatic calendar (from 1993 to 2042 including February of leap years) • Scuba chronograph display <ul style="list-style-type: none"> • Up to 10 hours in 1 second increments • Log data of up to 9 dives can be recorded in a day. • Auto signal (Beeps every 10 minutes) • Log data recall display <ul style="list-style-type: none"> • Log data of up to 20 dives (Month and date of dive, dive starting time, diving time, number of dives on that day) • Total number of dives is displayed graphically up to 550 dives. • Stopwatch display <ul style="list-style-type: none"> • Up to 10 hours (Hour, minutes, seconds and 1/100 seconds) • Alarm display <ul style="list-style-type: none"> • 3-channel alarm (24-hour indication system) • Three alarms can be engaged and disengaged independently of one another. 	
Additional mechanism		<ul style="list-style-type: none"> • Button operation guide • Sound on/off : Sound for button operation confirmation can be switched on and off as required. • Battery indicator : Remaining battery energy is displayed graphically. • Illuminating light (electroluminescent panel) • Communication beep 	
Loss/gain		Monthly rate at normal temperature range: less than 20 seconds	
Regulation system		Nil	
Measuring gate by quartz tester		Any gate can be used.	
Battery		Matsushita CR2025 Battery life is approximately 2 years. Voltage: 3.0V	

PARTS CATALOGUE

Cal. S800A

Disassembling procedures Figs. : ① → ⑯
 Reassembling procedures Figs. : ⑯ → ①
Lubricating: Types of oil **Oil quantity**
 ☞ Silicone oil 500,000 c.s. ☞ Normal quantity



* Do not disassemble buttons A, B, C and D except when they need to be replaced.

☉ ➡ Please see the remarks on the following pages.

Remarks:

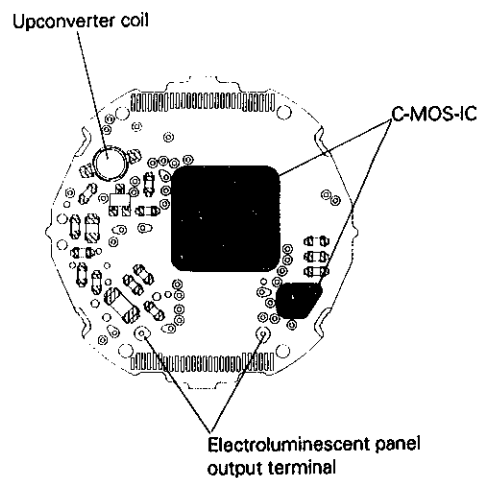
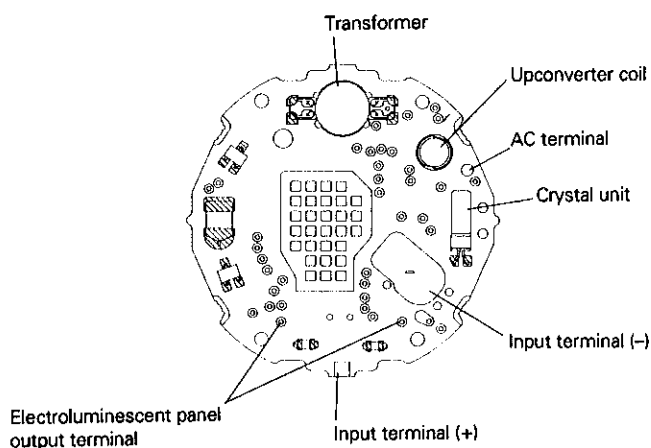
- ⑤ Panel cover

The type of panel cover differs depending on the model.
Refer to "SEIKO Casing Parts Catalogue" to choose a corresponding panel cover.

TECHNICAL GUIDE

- The explanation here is only for the particular points of Cal. S800A.
- For the repairing, checking and measuring procedures, refer to the "TECHNICAL GUIDE, GENERAL INSTRUCTIONS".

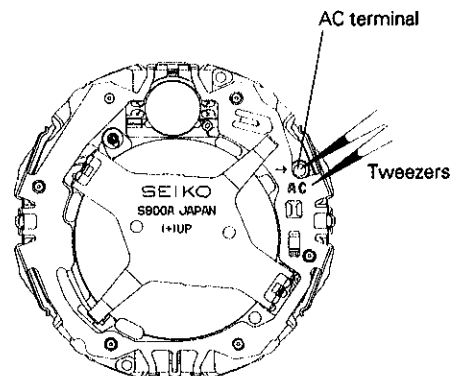
I. STRUCTURE OF THE CIRCUIT BLOCK



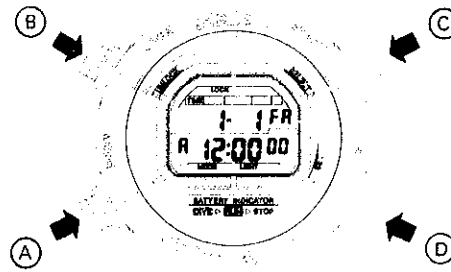
II. REMARKS ON INSTALLING THE BATTERY

- After the battery is replaced with a new one, or after the battery is re-installed following the repairing procedures, be sure to short-circuit the AC terminal of the circuit block and the switch spring with conductive tweezers to reset the circuit as illustrated at right.

Note: When measuring the current consumption, make sure that the power is supplied externally before resetting the circuit.



- To reset the circuit of the complete watch, press and hold buttons "A", "B", "C" and "D" at the same time for 2 to 3 seconds. The display will become blank, and "12:00'00" AM, Friday, January 1st" will be shown as the buttons are released, indicating that the resetting of the circuit has been completed.



III. REMARKS ON DISASSEMBLING AND REASSEMBLING

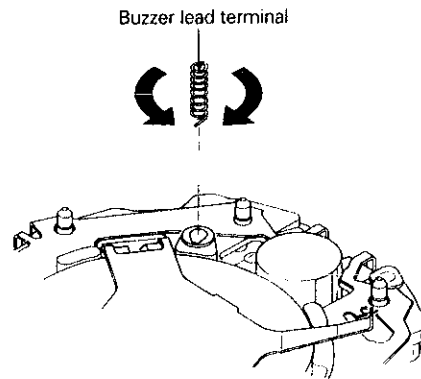
③ Buzzer lead terminal

- **How to remove**

Turn the buzzer lead terminal to release its end portion from the groove of the battery guard, and then remove it.

- **How to install**

Set the end portion of the buzzer lead terminal into the groove of the battery guard, then turn it to fix it.



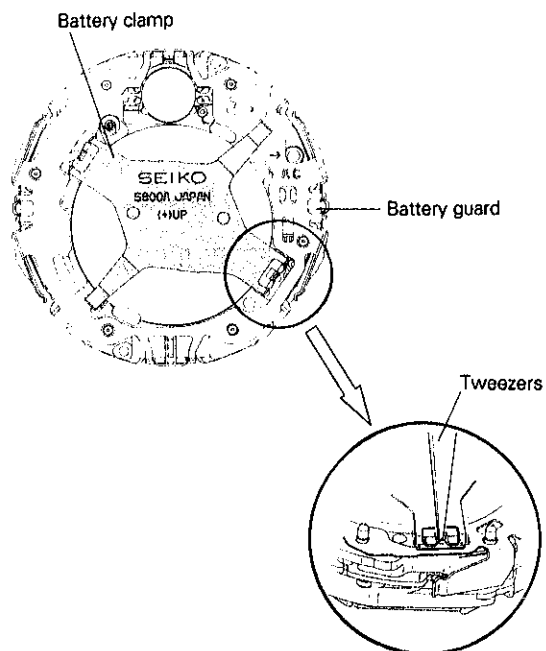
⑥ Battery clamp

- **How to remove**

Pry up with the tip of tweezers or a screwdriver the two protrusions of the battery clamp hooked to the notches of the battery guard.

- **Checking after installation**

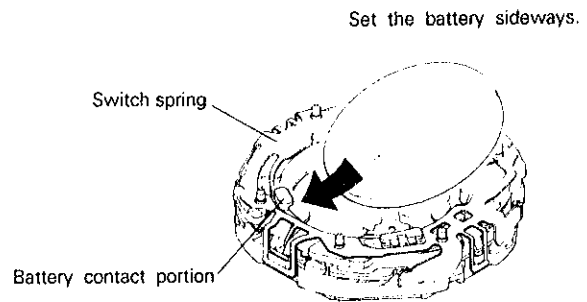
After installing the battery clamp, check that the battery guard is securely held by the two protrusions of the battery clamp.



⑦ Battery

• How to install

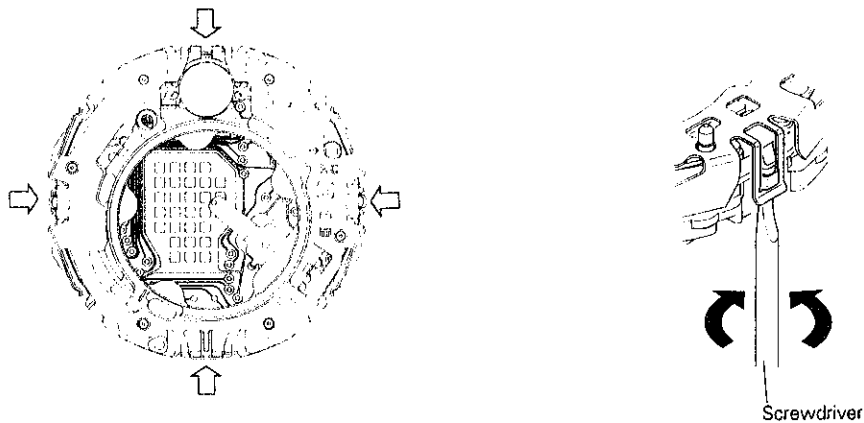
Install the battery sideways as shown in the illustration lest it should press down the battery contact portion of the battery guard.



⑧ Switch spring

• How to remove

Pry up the four hooking portions of the switch spring with the tip of a screwdriver to remove it.

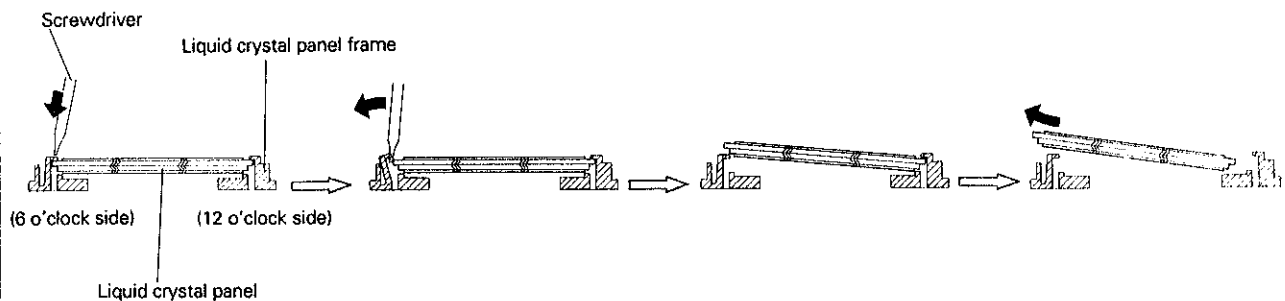


⑬ Liquid crystal panel frame

⑯ Liquid crystal panel

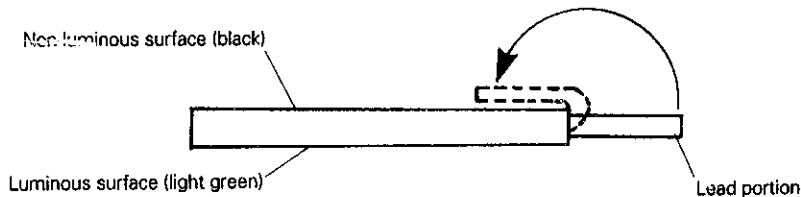
• How to remove

Insert the tip of a screwdriver into the hooking portion of the liquid crystal panel frame at the 6 o'clock position, and pry it up in the direction of the arrow as shown in the illustration to remove the liquid crystal panel.



⑮ Electroluminescent panel

When replacing the electroluminescent panel, bend the two lead portions of the new electroluminescent panel at the joint as shown in the illustration before reassembling it.



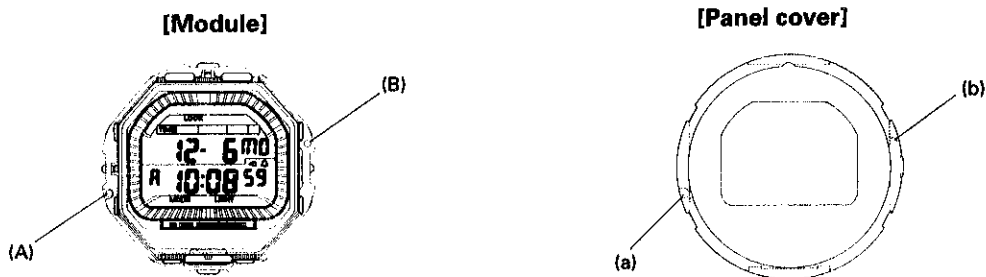
* The electroluminescent panel is highly susceptible to humidity. Therefore, a new electroluminescent panel should be put in a sealed moistureproof bag and kept in a cool, dark place if it is not used right away.

④ Module

⑤ Panel cover

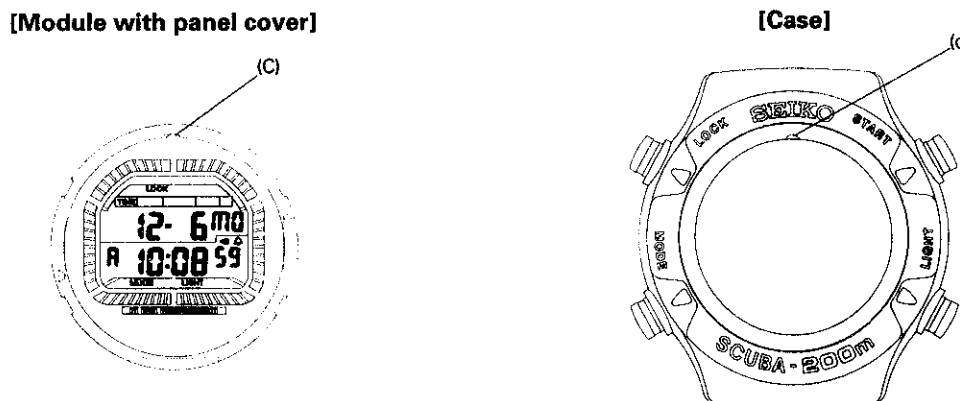
• How to install the module and panel cover to the case

(1) Set the panel cover to the module.



• Align the notched portion (A) and the hole (B) of the module with the protrusions (a) and (b) on the rear side of the panel cover, respectively.

(2) Install the module with the panel cover to the case.



• Align the protrusion (C) on the face side of the panel cover with the notch (c) inside the case.

IV. VALUE CHECKING

- **Time accuracy**

To measure accuracy, light up all the segments of the display. To do so, press buttons "C" and "D" at the same time in the TIME/CALENDAR SETTING display.

After the measurement, press button "A", "B", "C" or "D" to return to the TIME/CALENDAR display.

- **Upconverter coil resistance**

125Ω ~ 175Ω

- **Current consumption for the whole of the module**

- When the electroluminescent panel is not used : less than 4.4μA
- When the electroluminescent panel is used : less than 18.0mA

Notes:

1. Before measuring the current consumption, be sure to reset the circuit. Otherwise, the display will become disordered, and as a result, current consumption cannot be measured properly.
2. When measuring the current consumption, take care not to expose the module to light. Light will increase the current consumption, and as a result, correct measurement cannot be obtained.

- **Troubleshooting for the electroluminescent panel**

If the electroluminescent panel will not light, check the following points for the cause of the failure:

- Cause-1: Battery
Check the voltage of the battery.
- Cause-2: Insufficient contact of the parts with the battery
Check if the battery contact portion of the switch spring and the battery connection (-) are securely in contact with the battery.
- Cause-3: Insufficient contact of button "D"
Check if the switch spring and the circuit block are covered with dust.
- Cause-4: Defective circuit block or electroluminescent panel
Follow the procedure below.

Remove the case back of the complete watch, and supply the power (3V) externally.
While keeping button "D" pressed, measure the voltage of the electroluminescent panel output terminal of the circuit block.

More than AC 30V

Less than AC 30V

The circuit block is normal.
Disassemble the watch and check the lead portions of the electroluminescent panel and the electroluminescent lead terminals for proper conductivity.

Replace the circuit block with a new one.

If there is no conductivity failure, replace the electroluminescent panel with a new one.