

Dynatron® 150plus

The following steps are provided to assist the technician with the calibration procedure. A calibration program is built into the software for the device. The procedure utilizes keys and displays on the key pad that are normally used for other purposes, but which have specialized applications in the Calibration Mode.

If you have any questions about the following instructions, contact Dynatronics' Customer Service Department before proceeding.

STEPS

1. Begin with the machine turned off. Plug the soundhead to be calibrated into the Dynatron 150plus ultrasound output jack and center the soundhead over the cone in the ultrasound power meter.
2. Enter the Dynatron 150plus's Calibration Mode by pressing and holding the **PAUSE** key while turning the machine on. The display windows first show the soundhead type that is plugged into the machine (see Soundhead Type Table on next page).

The soundhead type is displayed for about one second. Next, the display shows the stored frequency values for the soundhead that is being calibrated. The output power display is set to a value of zero. The LED for 1 MHz should be illuminated indicating the soundhead is now ready to be calibrated for this frequency. If it is not, press the toggle key to select 1 MHz now.

3. Press **STOP** and the **TIME UP ARROW** simultaneously to enter the Temperature Mode. The temperature of the soundhead is displayed in the time display window. The soundhead must be at a temperature between 72 and 75 degrees. If the soundhead is not within this range, warm the water and/or the head before continuing. Press **STOP** to get out of the temperature mode. At this point there is zero output from the device. Zero the scale on your ultrasound power meter now. When the scale is at zero on your power meter, press the **START** key to begin.
4. Press the **UP/DOWN** arrow keys located next to the Power display window on the Dynatron 150plus until the power meter shows 1.0 W/cm².
5. When the watts reading on the meter is at 1.0 W/cm² for the soundhead and the reading is stable, press the **Duty Cycle** toggle key (this is the key that selects 10%, 20%, 50% or Continuous).
6. The Dynatron 150plus performs the calculation internally for the "Z" (impedance value) and the coupling value. These values are automatically entered and stored

Soundhead Types Table

Smart Heads:

Time Display = HS

Power Display:

1cm2 = 1

2cm2 = 2

5cm2 = 5

10cm2 = 10

Older Sound Heads:

Time Display only:

1cm2 = H 1

2cm2 = H 2

5cm2 = H 5

10cm2 = H10

Soundhead Types