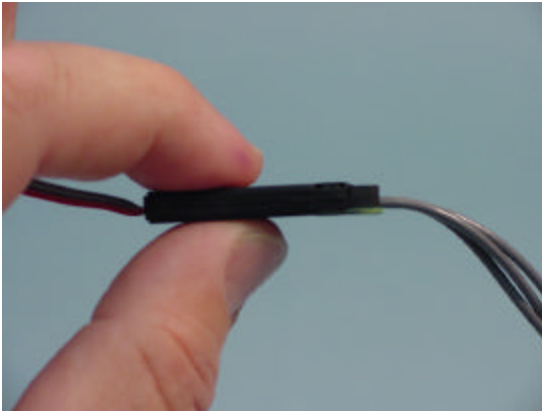


LTI Boston Arm Electrode Systems

The Boston Digital Arm system can be controlled by several input devices, specifically; positional-servo transducers, Touch Pads™ (FSR), various switches and finally myoelectrodes. Myoelectrodes are now available in two forms; traditional cased electrodes and remote electrodes. LTI has just introduced a new Remote Electrode System which provides an excellent way to build a low-profile configuration and thus a more cosmetically appealing prosthesis.

LTI Remote Electrode System:

- ◆ Ultra-thin Electrode-Amplifiers
- ◆ Thin shielded cables with strain-relief eyelets to connect the metal electrodes
- ◆ LTI Cavity-Back™ metal electrodes for lump-free connection to the cables



Remote Electrode-Amplifier with its cable connector is only 0.2 inches (5mm) thick

The new LTI Remote Electrode System is built around a thin Electrode-Amplifier specifically designed to be used with remote metal electrodes. This is not a modified cased electrode, but one designed specifically for use in test sockets and definitive frame-type inner sockets. The case measures just 1.2 x 0.7 x 0.2 inches, L x W x H, (31 x 17.5 x 5 mm). The amplifier does not have a potentiometer for gain adjustment because the Boston Arm System provides more than enough gain through its proprietary software interface.

Cavity-Back™ Electrodes improve cosmesis. These metal electrodes are used in test sockets and soft inner socket applications. Attaching cables has always been a problem with separate metal electrodes. With a hard inner socket, a standard 4-40 nut followed by the cable eyelet and a second nut can add a lump ¼ inch (6mm) high. With the Cavity-Back™ feature and a soft socket liner, you will get excellent electrical continuity with just a thin washer, the cable eyelet, and the small pattern 4-40 nut supplied. These components will push the liner down into the cavity. When the stud on the electrode is cut flush with the nut, only the 2mm thick nut and cable will protrude above the surface.

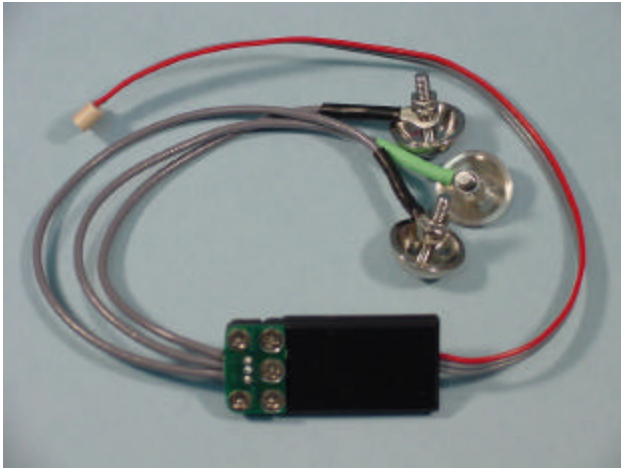


Standard, Small and High Dome Cavity-Back Electrodes



Nut squeezing liner down into the cavity

The Cavity-Back Metal Electrodes are available in three shapes; High, Medium and Small dome. The Medium dome is the standard or default if no other shape is specified. These are used in most applications. The High dome electrode is intended for situations where there is significant soft tissue over the muscle site to assure good contact. Finally, the Small dome is primarily for cases where there are severe space constraints.



A complete LTI Remote Electrode System for a Boston Digital Arm consists of the Electrode-Amplifiers, Remote Electrode Cables of various lengths (3, 6, 12, and 24 inches) and the Metal Electrodes in one of three sizes listed below. The Electrode-Amplifiers are provided with output cables to connect to the Boston Digital Arm input connector board. To order, just determine the number of Electrode-Amplifiers required (1 or 2), the length of Remote Electrode Cables and the shape of the Metal Electrodes.

Remote Electrode Cables (REC). Three shielded cables attach to the Electrode-Amplifier with a detachable strain-relief clamp. Eyelets with strain-relief on the other end of each cable connect to the Metal Electrode stud with 4-40 small pattern nuts. To accommodate various prosthetic configurations, these Remote Electrode cables are offered in four standard lengths; 3, 6, 12 and 24 inch.

Boston Arm Electrodes:

- BE328** Remote Electrode-Amplifier
- BE330** Complete Remote Electrode-Amplifier Set, consisting of
 - 2 Remote Electrode-Amplifiers (BE328)
 - 2 Remote Electrode Cables (RECXX), select below
 - 6 Cavity-Back Metal Electrode Kit (EL1X), select below

- BE326** Myoelectrode-Amplifier
- BE324** Complete Myoelectrode Set, consisting of;
 - 2 Myoelectrode-Amplifiers (BE326)
 - 2 Myoelectrode Housing Kit (BE327)
 - 2 Stainless Steel Ground Electrodes (BE329)



Cables to Connect Remote Metal Electrodes:

- REC03** Remote Electrode Cable, 3-inch (76mm)
- REC06** Remote Electrode Cable, 6-inch (150mm)
- REC12** Remote Electrode Cable, 12-inch (300mm)
- REC24** Remote Electrode Cable, 24-inch (600mm)

Metal Electrodes: Each electrode is supplied with two small nuts and a washer.

- EL01** Metal Electrode, High Dome 0.56in dia. x 0.19in high (14.2mm dia. x 4.7mm)
- EL02** Metal Electrode, Medium Dome 0.56in dia. x 0.13 high (14.2mm dia. x 3.2mm)
- EL03** Metal Electrode, Small Dome 0.38in dia. x 0.10 high (9.5mm dia. x 2.5mm)
- EL11** Kit of 6 EL01 High Dome Metal Electrodes with nuts & washers
- EL12** Kit of 6 EL02 Medium Dome Metal Electrodes with nuts & washers
- EL13** Kit of 6 EL03 Small Dome Metal Electrodes with nuts & washers