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**CONFIDENCE  
EXPERIENCE**

# HILGER™

## FACIAL NERVE STIMULATOR, MODEL H3

### The Original Facial Nerve Stimulator For the Clinical Evaluation of Facial Nerve Integrity

The Hilger™ Facial Nerve Stimulator is designed for clinical testing of facial paralysis. Low energy, square wave current is applied to the skin overlying the facial nerve trunk (or branches) using the bipolar probe. Nerve response is indicated by twitching of the associated facial muscles. Degeneration of nerve fibers on the paralyzed side is evidenced by a weaker response to a given current intensity than that given by the normal side, or by a higher current being required to produce an equivalent response. Absence of response at high current settings indicates complete nerve degeneration.

In the Nerve Excitability Test (NET), the current is turned up until the onset of twitching of one or more of the facial muscles. The normal side usually responds at about 3 milliamperes (mA), and a higher setting required to produce a response on the paralyzed side indicates nerve degeneration. The difference between the two sides shows the extent of degeneration.

In the Maximal Stimulation Test (MST), the current is set at about 5 mA, which is sufficient to fire all of the viable nerve fibers and produce

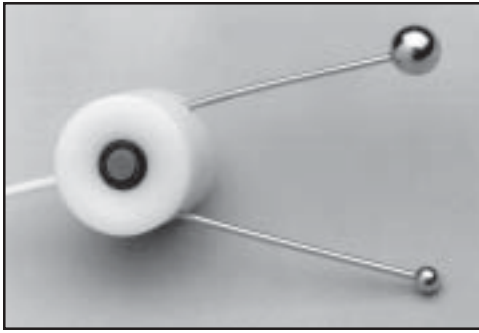


maximum contractions. The observed strength of the muscle contractions on the paralyzed side compared to those of the normal side indicates the relative number of nerve fibers responding to stimulation and the degree of nerve degeneration.

#### ESSENTIAL FEATURES:

- **Safe, Low Energy, Precise Current Control:** Constant current, pulsed stimulation eliminates the hazards of non-pulsed or constant voltage stimulation methods.
- **Shatterproof Case:** High impact ABS material withstands accidental abuse.
- **Easy-to-Read Battery Status Indicator:** Low battery monitor lets operator know when batteries need replacing.
- **Special Skin Resistance Compensating Circuitry:** Automatically adjusts for varying skin resistance to provide accurate stimulation levels.
- **Adjustable Bipolar Probe:** Conveniently adjusts for each patient. Soft-touch tactile button provides additional comfort and ease-of-use for the operator.
- **Easy-to-Read Backlit LCD Display:** Allows the operator to easily and conveniently see and adjust the stimulating current.

# Specifications, Warnings, and Service



## **Adjustable Bipolar Probe**

*Exclusive Bipolar Probe design conveniently adjusts for each patient.*



## **Lighted LCD Display**

*Allows the operator to conveniently see and adjust the stimulating current.*

## **CURRENT CHARACTERISTICS:**

The Hilger Model H3 uses pulsed, constant-current stimulation, which is safer than most constant-voltage or non-pulsed DC stimulators. The Hilger Model H3 allows direct stimulation of nerve tissue without risk of injury. Special circuitry automatically adjusts for varying skin resistance to provide accurate stimulation levels.

## **FURNISHED ACCESSORIES:**

- Bipolar Probe
- Electrode Cream, 4-ounce (113.4-gram) bottle
- Operator's Manual
- Service Manual
- Carrying Case
- Set of Journal Reprints

## **TRAINING AND TECHNICAL ASSISTANCE:**

To keep our prices low, only limited on-site in-services are provided. Use our toll-free hotline and the documentation included with the product for a review of how to use the product. Please call between 8:00 AM and 4:30 PM Central Time.

## **TECHNICAL SPECIFICATIONS:**

- Current output: 0 to 10 mA, residual current of 0.05 mA at 0 indicated
- Pulse width: 0.0006 seconds
- Pulse off time: 0.1660 seconds
- Pulse frequency: 0.1666 seconds
- Dial accuracy: Linear down to 0.15 mA, residual current of 0.05 mA at 0 indicated
- Batteries: four 1.5-volt Alkaline C cells
- Battery life: 200 hours continuous use between replacement
- Size: 8.5 x 9 x 3 inches (21.6 x 22.8 x 7.6 cm)
- Weight: 4 pounds (1.82 kg)

## **WARRANTY, SERVICE, AND LOANER PROGRAM:**

The Hilger Facial Nerve Stimulator Model H3 is warranted to be free of defects in material and workmanship for a period of two years from purchase, except for the probe, which is warranted for 90 days. Because of the specialized circuitry and repair techniques, we recommend you return it to us for any repairs. Loaner instruments are available for a nominal fee including shipping, insurance, and supplies used. Pack the instrument carefully and ship insured.

## **WARNINGS:**

- Do not use in the presence of explosive gases. This unit is not explosion proof.
- Do not attempt to repair the instrument. Call WR Medical Electronics Co. for servicing instructions.
- Do check battery condition prior to and during use.

## **MODELS:**

The Hilger Model H3 replaces the older versions of this product: Models H1, H1AR, H2, H2R, and HN.

## **CONTACT INFORMATION:**

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## **AVAILABLE FOR EXPORT**

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