

**SUNMAS®**

## User Manual



## **Introduction**

Congratulations on your purchase of the SUNMAS device. SUNMAS is a unique wireless remote controlled pain relief device incorporating TENS technology to specifically target back pain. The thin and flexible design perfectly contours the back for maximum surface contact. This innovative device is safe, drug-free, easy to use, discreet and comfortable to wear, and most importantly allows you to control your pain to maintain an active lifestyle.

## **What is TENS?**

TENS (Transcutaneous Electrical Nerve Stimulation) is a non-invasive, drug-free method of controlling pain by the transmission of electrical stimulation to the body's nerve or muscle fibers through the skin. Pain relief or suppression is achieved by:

- 1) Suppressing the transmission of pain in nerves (Gate Control Theory) and
- 2) Increasing the discharge of the body's endorphins, which reduces the sensitivity to pain in the central nervous system (Opiate Release Theory)

The SUNMAS wireless device is exclusive waveform

incorporates BOTH clinical theories of TENS to provide pain relief. It provides a safe, easy to apply, pain management system for self-treatment when needed.

## **Indications for Use**

For temporary relief of pain associated with sore and aching muscles due to strain from exercise or normal household and work activities.

## **Contraindications**

- Do not use this device if you have a cardiac pacemaker, implanted defibrillator, or other implanted metallic or electronic device. Such use could cause electric shock, burns, or electrical interference or death.

## **Warning**

- The device may cause rhythmic disturbances to the heart. Do not use the device across or through your chest. If you are susceptible to rhythm disturbances of the heart, use of the device must be done under the direction of a physician.
- Use of this device over your neck could cause muscle spasms resulting in airway closure, difficulty in breathing, adverse effects on heart rhythm or blood pressure. Do not use this device over your neck.

- Use of the device when you are in the care of a physician or have had medical or physical treatment for your pain. Consult with your physician before using this device.
- Continued use of the device when pain does not improve, becomes more severe, or lasts more than five days may indicate a severe condition. Stop using the device and consult with your physician.
- Use of the device on the following skin conditions may cause a condition to become worse. Do not use the device over, or in proximity to, these skin conditions: abnormal skin, skin that is not intact, untidy, unhealthy, open wounds, rashes, swollen, red, infected, inflamed areas, skin eruptions (e.g., phlebitis, thrombophlebitis, varicose veins), or cancerous lesions.
- Electrical stimulation during common activities may increase the risk of injury. Do not use the device when in the bath or shower, sleeping, driving, and operating of machinery or any activity in which electrical stimulation can put you at risk of injury.
- Using the device around electronic monitoring equipment (e.g., cardiac monitors, ECG alarms) may cause equipment malfunction. Do not use this device around electronic monitoring equipment.
- The effect, and safety, of using the device on children, during pregnancy, or use across the head has not been evaluated or established and is unknown. Do not use the device on children or let children handle the device. Do not use this device if you are pregnant, or suspect that you are pregnant, unless under the direction of your physician. Do not apply the device across your head.

#### **PRECAUTION**

- Using the device when you have suspected or diagnosed epilepsy or heart disease may cause unexpected reactions. Always consult your physician before using the device.

#### **ADVERSE REACTIONS**

- 1) Isolated cases of skin irritation or burns may occur due to electrical stimulation or adhesive medium (gel pads).
- 2) Stop using the device and consult with your physician if you experience adverse reactions from use of this device.

## **Contents**

- 1 SUNMAS wireless device
- 1 Remote control
- 2 pairs gel pads
- 1 CR2032 lithium battery (installed in remote control)
- 1 Charger with USB extension line
- 1 user manual

## **PREPARE your wireless device**

1. Prepare the treatment area by washing and drying the skin thoroughly. The treatment area should be void of oils and /or lotions. Do not apply the main device over broken skin.
2. Insert a CR2032 battery to the battery cover of the remote control.
3. Remove 2 gel pads from the package and apply the pads with showing words above to the black electrode area on the bottom of the wireless device. Align the shape of the gel pad to match the shape of the black electrode area. Firmly press the gel onto the electrode across the entire surface of the gel pad to ensure good adhesion.

### **Note:**

To make sure good adhesion, please use the unit after adhering with gel pad for 24 hours.

4. Repeat the step 3 for the second gel pad.

5. Your device is ready for use. DO NOT activate stimulation of the device prior to application of the device to the back.

### **Note:**

The wireless device is suggested to be charged for more than 10 hours after the electricity in it is used up, which is in favor of prolonging the use life of the built-in lithium battery. When massage strength decreases, it indicates that the device needs charging. The charging indicator in the middle of the receiver keeps blue during charging and is off after full charging. The unit cannot be turned on during charging. Unplug charger from power outlet when charging is complete. Just continue to use the device by pressing on/off button. .

## **OPERATE your wireless device**

1. Remove the clear protective films from both gel pads on the device by slowly peeling the films. DO NOT discard the protective films as the protective films will be reapplied to the gel pads for storage after use. Take care to not touch or allow objects to come in contact with the gel pad as this may interfere with the adhesion properties of the gel pads.

2. Place the device on your back over the area of back pain, aligning the center of the device over the spine. Make sure the gel pads make good contact with the skin.
3. Press the ON/OFF button on the Wireless device. The blue light will begin blinking.
4. On the remote control, press the ON/OFF button first and choose MODE button. The light is on and the device will automatically show MODE 1. There are 6 modes in the unit. Press M to change the mode.
5. Treatment will automatically stop after 30 minutes. Treatment can be stopped at any time by pressing the ON/OFF button on the remote control. DO NOT remove the device until treatment has stopped.
6. Press the INCREASE INTENSITY (+) button to increase the stimulation to a comfortable level. To decrease the stimulation intensity anytime during treatment, press the DECREASE INTENSITY (-) button. When the user switches the mode, the intensity will automatically go down to the minimum for safety reasons.
7. If you need to pause the device, just press the pause button. You could use it again by pressing the pause button again.
8. If you need to turn off the device during stimulation, only press the OFF button on the remote control. Put the protective films on the pad for storage.

#### **Maintenance and Storage**

- Clean the device using a damp cloth and mild soap. Gently wipe clean.

#### **Note:**

This device is manufactured with water detection technology. Do not submerge the device in water or other liquids. Water damage to the electronics will void the warranty.

- The device should be operated, transported and stored at temperatures between 50° F and 104° F (10° C and 40° C), with relative humidity between 30% - 85%. All values have +/- 10% tolerance.
- Store the device, remote control and gel pads in the original packaging when not in use.
- If the device is not working properly, stop using immediately. Do not disassemble or modify the device.

**Technical Specifications**

Product Model: SM9180

Product Name: Wireless TENS mini massager

Working Mode: 6 modes

Working Strength: 20 levels

Output Current: 40mA

Power Voltage: 3.7V

Pulse Frequency: 110Hz

Pulse Width: 100 $\mu$ s

Timer Control: 20 minutes

Control Range: 10 m

Power Supply:

1)Remote Control: One (1) CR2032 Lithium battery

(Internally Powered)

2)Wireless unit: DC 3.7V lithium battery

Product Size (L x W x H): 7.5" x 3.5" x 0.7" (191 mm x 90 mm x 18 mm)

**§ 15.19 Labelling requirements.**

This device complies with part 15 of the FCC Rules. Operation is subject to the following two conditions: (1) This device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

**§ 15.21 Information to user.**

Any Changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.

**§ 15.105 Information to the user.**

Note: This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

**\* RF warning for Portable device:**

The device has been evaluated to meet general RF exposure requirement. The device can be used in portable exposure condition without restriction.