SAFE PLACE®
Patient Security Solutions

# Safe Place Transmitters

## User Guide

DRAFT

RFT™

## Compliance

This device complies with Part 15 of the FCC rules. Operation is subject to the following two conditions:

- This device may not cause harmful interference.
- This device must accept any interference received, including interference that may cause undesired operation.

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

Cet appareil est conforme avec Industrie Canada exempt de licence Rss standard(s). Son fonctionnement est soumis aux deux conditions suivantes :

- cet appareil ne peut causer d'interférences, et
- cet appareil doit accepter toute interférence, y compris des interférences qui peuvent provoquer un fonctionnement indésirable du périphérique

Les changements ou modifications à cet appareil sans expressément approuvée par la partie responsable de conformité pourraient annuler l'autorité de l'utilisateur de faire fonctionner cet équipement.

RF TECHNOLOGIES®

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# WARNINGS AND CAUTIONS

It is important for your facility to implement and enforce the following WARNINGS and CAUTIONS in order to keep all equipment functioning properly. Disregarding the information and instructions in this document is considered abnormal use and may result in injury or system failure.

## Warnings

**ACCESSORIES (SUPPLIES)**—To ensure resident safety and proper operation of equipment, use only parts and accessories manufactured or recommended by RF Technologies, Inc. Parts and accessories not manufactured or recommended by RF Technologies, Inc. may not meet the requirements of the applicable safety and performance standards.

**Failure to use the components and supplies specified by RF Technologies, Inc. may result in equipment and/or system failure.**

**EXPLOSION HAZARD**—These devices should not be used in the presence of flammable gas mixtures. It should also not be used in oxygen enriched atmospheres.

**STATIC DISCHARGE**—Do not touch the conductor portion of any conductor or port. Damage to the device may result.

**SYSTEM WIRING**—All permanent supply connections must be done in accordance with National Electric Code, NFPA 70.

**INSTALLATION AND CONFIGURATION**—It is the responsibility of the facility to follow the installation instructions carefully, as outlined in the applicable system guides, and to use the components and supplies specified by RF Technologies, Inc. for all installations.

**Failure to use the components and supplies specified by RF Technologies, Inc. may result in equipment and/or system failure.**

**INSTRUCTIONS FOR SET UP AND USE**—It is the responsibility of the facility to follow the instructions for set up and use carefully, as outlined in this manual, and to use the components and supplies specified by RF Technologies, Inc. for set up and use. Do not attempt to use extension cords or other equipment not supplied by RF Technologies, Inc.

**Failure to use the components and supplies specified by RF Technologies, Inc. may result in equipment and/or system failure.**

**SYSTEM INSPECTION**—It is the responsibility of the facility to establish and facilitate a regular inspection schedule for your system. RF Technologies, Inc. recommends quarterly inspections of your system for safety and performance by a qualified RF Technologies, Inc. representative.

To arrange for a quarterly inspection by RF Technologies, Inc., call our Technical Support Department at (800)-669-9946 or (262) 790-1771.

**Failure to provide regular inspection of these products may result in equipment and/or system failure.**

**SYSTEM MAINTENANCE AND TESTING**—It is the responsibility of the facility to establish and facilitate a regular maintenance schedule for your system, as outlined in the applicable system guides. This includes regular inspection, testing, and cleaning. RF Technologies, Inc. recommends monthly maintenance and testing of your system. It is also recommended that your facility keep records of maintenance and test completions.

**Failure to provide regular maintenance and testing of these products may result in equipment and/or system failure.**

**USER TRAINING**—Only users who have received adequate training on the use of the system, as outlined in this manual, should use the system. It is the responsibility of the facility to ensure all users have been trained.

**Failure to adequately train employees may cause system failure due to user error. In addition, incorrect use of the equipment may also result in system failure.**

**MR UNSAFE**

All RF Technologies transmitters, pendants and banding material “PRODUCT” have been determined to be MR Unsafe as defined by ASTM F 2503-05. Use of “PRODUCT” in a Magnetic Resonance Imaging system will cause injury to residents and staff, MR system malfunction or “PRODUCT” malfunction. Do not bring “PRODUCT” into the MR system area and follow your facilities policies to classify and label “PRODUCT” as MR Unsafe.

# Cautions

**DISPOSAL**—At the end of their service life the products described in this manual, as well as accessories (i.e. lithium batteries, banding material, disposable pads, etc.), must be disposed of in compliance with all applicable federal, state and local guidelines regulating the disposal of products containing potential environmental contaminants. Dispose of the packaging material by observing the applicable waste control regulations

**RESIDENT GENERATED ALARMS—**Do not rely exclusively on resident generated alarms for resident care and safety. The alarm function of equipment in the possession of residents must be verified periodically and regular resident surveillance is recommended.

**RESIDENT MONITORING—**The most reliable method of resident monitoring combines close personal surveillance with correct operation of monitoring equipment. It is the responsibility of the facility to periodically check on residents in possession of RF Technologies, Inc.'s equipment (i.e. Pendants, Pull Cords, Control Units) to mitigate risk of inappropriate use of equipment or strangulation and stumbling hazards from cables and cords.

**PRODUCT WARRANTIES—**Failure to follow the Warnings and Cautions in this guide voids any and all Product Warranties.

**WORN OR DAMAGED PARTS**—If the devices or cables are worn or damaged, you must have the product serviced. For more information, see the section entitled “Service and Return.”

# PREFACE

## Overview

The SAFE PLACE transmitters are components of the 9450 System which monitors doors, elevators, hallways, and stairwells to assist staff in monitoring patients in a facility.

The various transmitters and devices of the system alerts staff if a transmitter's banding material is tampered with, cut, or opened without authorization (referred to as Cut Band for Infant and Emergency Department systems only), or if monitored devices in the system are not functioning properly. An alarm also sounds if a transmitter is detected in an Exit Alarm Zone. If the system fails to detect a transmitter within its monitored area, a No Signal/Check Transmitter alarm is issued.

Depending upon which equipment you have installed, the 9450 System can automatically lock doors and deactivate elevators.

In addition, if the system in your facility includes computers, an alarm also sounds at a Central Server and its network of Client computers. The computer software will identify which patient sounded the alarm and the exit where the alarm occurred.

**WARNING**: The 9450 System is designed and intended to work in conjunction with a facility's overall patient security program, including reasonable operating policies and procedures. The 9450 System, by itself, cannot prevent abductions or the elopement of patients.

## Intended Audience

The SAFE PLACE Transmitters User Guide is intended for caregivers who use the Safe Place transmitters. It includes detailed information about banding, care and cleaning, testing the transmitters, alarms and transmitter specifications.

This guide should only be used by persons who have read the Software User Guide and received training on the use of the System. It is not intended as a substitute for reading the Software User Guide. Always refer to the Software User Guide for complete instructions and warnings.

## Contact Information

For more information about RF Technologies, Inc. products, go to www.rft.com.

### Technical Support

For technical support, contact the Technical Support Team at:

(800) 669-9946, option 5 or (262) 790-1771

tech@rft.com

### Customer Care

For questions on part replacement or for ordering new parts, contact the Customer Care Team at:

(800) 669-9946, option 2

customercare@rft.com

### Sales

For questions regarding system add-ons, contact your Sales Manager.

## Product Warranty

Product Warranty information can be found on the system's CD-ROM or with your original system proposal and invoice.

# GENERAL INFORMATION

## Introduction

This chapter provides general information about the transmitters. It includes:

- Transmitters types
- Warranty dates
- Banding the transmitters
- Testing and care

## Transmitters

The transmitters are lightweight and compact. They can be left on the patient during bathing but prolonged exposure to wet conditions and complete submersion should be avoided.

**SUBMERSION**—Prolonged submersion may result in equipment and/or system failure and voids any and all Product Warranties.

### How do the transmitters work?

When activated, a transmitter sends a signal that is received by Exit Alarm and Alarming Band Receivers. If a patient wearing a transmitter is detected in an Exit Alarm Zone and the door is open, an alarm sounds at the exit as well as at a Central Server and its network of Client computers.

**RADIO FREQUENCY:** The radio frequency (RF) characteristics of certain metal crib carts may interfere or block the Infant transmitter's signal during transport, preventing detection by the system's Exit Receiver.

## Transmitter Types

There are four types of Safe Place transmitters:

### Smart Sense

The Smart Sense transmitter is worn on an infant's ankle and senses when the transmitter is loose or no longer in contact with the infant.

The Smart Sense technology combines the Smart Sense transmitter and Smart Sense banding material to give you the capability to recognize if a transmitter has been removed from an infant or if it has been tampered with or is loose.

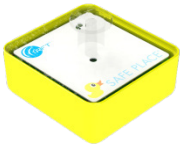
The following are the measurements for tamper detection:

- **Resistance**—banding material no longer stretching with infant's movement
- **Capacitance**—change in contact between transmitter and infant

### Standard Infant

Like Smart Sense, the Standard Infant transmitter is worn on the infant's ankle and provides cut-band protection.

### Umbilical Cord



The Umbilical Cord transmitter is secured in the infant's umbilical cord clamp and is worn on the umbilical stump.

## Patient (Locking)

The Patient (locking) transmitter is worn on the wrist or ankle and provides cut-band protection, but requires a key to open and lock. It is ideal for older pediatric to adult patients who may be prone to opening clasps.

## Warranty Expiration Date

Each transmitter is stamped with a warranty expiration date. This date indicates the date that RF Technologies' warranty on that transmitter expires. If the warranty period has expired, discard the transmitter immediately.

**WARNING**: Using a transmitter beyond the printed expiration date can result in system failure, elopement, and/or abduction.

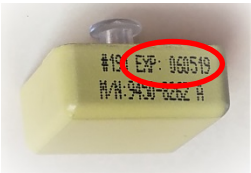
**Smart Sense**

**Standard Infant**

**Patient Transmitter**

Transmitters have a 1 year life expectancy.

**Umbilical Cord**




Transmitter has a 3 month life expectancy.

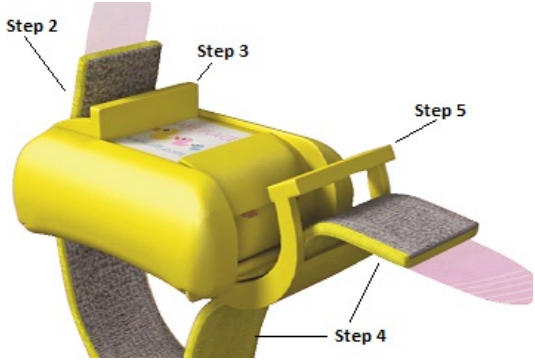
## Banding

**NOTE**: All banding material types must not remain on a patient for longer than 72 hrs (3 days). If the material is kept on longer than this specified period of time, you may receive false alarms from that transmitter.

**CAUTION**: You must test all transmitters prior to use to verify proper operation. This includes every time that the band is replaced. Failure to test the transmitters before use can result in system failure, abduction, and/or an elopement. In addition, failure to test transmitters voids the RF Technologies Product Warranty.

## Smart Sense

**To band the Smart Sense transmitter:**




1. Remove the Smart Sense banding material (with the plastic guide tabs still attached) from the plastic backing.

**WARNING**: Only Smart Sense banding material can be used to fasten Smart Sense transmitters. Use of any other banding material with the Smart Sense transmitters voids the RF Technologies' Product Warranty and could result in system failure.

*Do not thread both sides of the banding material through the clamps until you are ready to secure the transmitter to the infant. Pre-threading may allow the transmitter to alarm.*

*Ensure transmitter is banded properly. It should fit snugly against the skin without an air gap between the transmitter and skin, yet allow the band and transmitter to be turned on the ankle. Over-tightening the band will not reduce the number of alarms and could cause patient injury.*

2. With the yellow-side of the banding material facing outwards, use the plastic guide tab to thread the banding material from the bottom slot out through the top slot on the first clamp.
3. Pull the tab until it clears the clamp and push the clamp lever down until it snaps shut.
4. Place the transmitter with banding material around the infant's ankle and thread the banding material through the second transmitter clamp slot.
5. Close the second clamp. The transmitter becomes active one minute after the clamps are snapped into place. The 60 second grace period allows the transmitter to be re-opened once the transmitter's second clamp has been secured.
6. Remove the plastic guide tabs and discard.
7. Use safety scissors to cut off the excess banding material. Try not to cut bands too short to allow room to adjust in the future.

## Standard Infant

**To band a Standard Infant transmitter:**

1. Cut off 6-8” of the banding material from the roll.
2. Open the clamps of the transmitter by gently pulling them outward, one clamp at a time, from the top of the transmitter.
3. Thread with duck-side of banding material up.
4. Advance the banding material from the bottom slot out through the top slot on the clamp.

5. Secure only one-side of the transmitter.
6. Place the transmitter with banding material around infant’s ankle then thread and secure second clamp. The band must be tight enough to help stop the transmitter from slipping off, and loose enough to avoid discomfort.
7. The transmitter becomes active one minute after the clamps are snapped into place. The 60 second grace period allows the transmitter to be re-opened once the transmitter’s second clamp has been secured.
8. Use safety scissors to cut off the excess banding material. Try not to cut bands too short to allow room to adjust in future.

## Patient (Locking)

**To band a Patient transmitter:**

1. Cut off 6-8” of the banding material from the roll.
2. Verify that the transmitter is unlocked. See the “Unlock a Transmitter” section for further details.
3. Open the clamps of the transmitter by gently pulling them outward, one clamp at a time, from the top of the transmitter.
4. Insert the banding material through the slot on the non-locking clamp side of the patient transmitter, from bottom to top, with the white side facing out.

5. Guide the banding material through until it bumps against the stop.

6. Push in the clamp until it snaps into place.
7. Insert the banding material through the slot on the locking clamp side of the transmitter, from bottom to top.
8. Guide the banding material through the slot at the top of the clamp. DO NOT snap the clamp into place.

9. Slide the transmitter and banding material onto the ankle or wrist of a patient according to your facility's policies and procedures.
10. Adjust the band so that the transmitter is in a comfortable position on the patient.

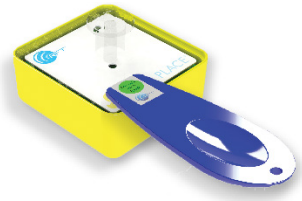
11. The band must be tight enough to help stop the transmitter from slipping off, and loose enough to avoid discomfort.
12. Push the unsnapped side of the clamp until it snaps into place. The transmitter becomes active one minute after the clamps are snapped into place. The 60 second grace period allows the transmitter to be re-opened once the transmitter's second clamp has been secure.
13. Use safety scissors to cut off the excess banding material.

**To unlock a transmitter:**

1. Insert the Locking Clamp Key into the hole on the top-side of the transmitter.
2. Turn the key ¼ turn in any direction.
3. Stop and pull with the key until the locking side of the clamp opens.
4. Remove the Locking Clamp Key.
5. Pull back the non-locking side of the clamp.
6. Follow the instructions to band or loosen the approved banding material and slip the Transmitter off of the patient.

# Using an Umbilical Cord Transmitter

## Activating



**To activate an Umbilical Cord transmitter:**

1. With the green dot (labeled “Enroll”) on the Activation Wand facing upwards, place the tip of the wand on the image of the yellow duck on the top of the transmitter.
2. Hold the wand on the image for two seconds and then pull away. Two green LED blinks indicate the transmitter has been activated.

## Attaching

**To attach an Umbilical Cord transmitter:**

1. Place the transmitter post into the clamp on the umbilical stump with the flat side of the transmitter towards the infant’s abdomen. Make sure that you can see the green LED light.

2. Leave enough length of the umbilical stump beyond the clamp to prevent the transmitter from falling off as the umbilical stump reduces in size.

## Discharging

When it is time for an infant to leave your facility, he/she must be discharged from the software (refer to the applicable Series Software User Guide).

### Banded Transmitters

**To discharge a banded transmitter:**

1. Assure that clamps are firmly closed on both sides with banding material in place.
1. Check census screen to confirm that the transmitter to be discharged is communicating with the system (indicated by Monitored displayed in transmitter Status column).
2. Tend to and clear any alarms displayed on the screen for the transmitter being discharged.
3. Request a discharge function for the transmitter and complete the action within the allotted time specified in the software by your facility.
4. Open the transmitter clamps to remove the banding material.

**CAUTION**: Do not slip the banding material off the infant's extremity; doing so may result in a Band Off alarm.

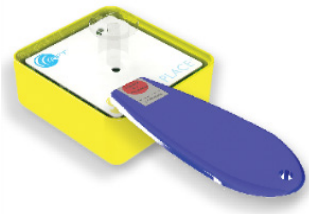
**CAUTION**: Do not leave the banding material in the transmitter clamps after discharge; doing so may result in the transmitter re-enrolling.

5. Discard the used banding material.
6. Finally, the transmitter must be disinfected in order to be ready to be used again.

## Umbilical Cord Transmitters

**To discharge an Umbilical Cord transmitter:**

1. Check census screen to confirm that the transmitter to be discharged is communicating with the system (indicated by Monitored displayed in transmitter Status column).
2. Tend to and clear any alarms displayed on the screen for the transmitter being discharged.
3. Request a discharge function for the transmitter and complete the action within the allotted time specified in the software by your facility.
4. Using a clamp snipping tool, open the clamp by cutting through the clamp snap.
5. Remove the clamp from the umbilical stump.
6. Remove the transmitter from the clamp and discard the clamp.



7. With the red dot (labeled “Discharge”) on the Activation Wand facing upwards, place the tip of the wand on the image of the yellow duck on the top of the transmitter.
8. Hold the wand on the image for two seconds and then pull away. Three red LED blinks indicate the transmitter has been discharged.
9. Finally, the transmitter must be disinfected in order to be ready to be used again.

# TESTING AND CARE

## Transmitter Testing

Do not use the transmitter tester on a transmitter with an expiration date that has expired. Results may not be accurate.

All steps are mandatory.

**CAUTION**: You must test all transmitters prior to use to verify proper operation. This includes every time that the band is replaced. Failure to test the transmitters before use can result in system failure and/or an abduction or elopement. In addition, failure to test transmitters voids the RF Technologies Product Warranty

## Visual Inspection

1. Verify that the warranty expiration date that is stamped on the transmitter is not expired.
2. Visually inspect the transmitter for damage or loose parts.
3. Attach a band to the transmitter (See Banding).
4. If inspecting an Umbilical Cord transmitter, use the activation wand to activate the transmitter before testing.

## Operation

Test the operation of the transmitter using the Transmitter Tester. The transmitter tester will detect whether or not a transmitter is emitting a signal, but cannot indicate the strength of the signal.

1. Place the transmitter tester directly on the transmitter.
2. Press and hold the button on the left side of the transmitter tester.
3. The device beeps once when you initially press the button.
4. While holding the button in, the indicator light flashes and a tone sounds once per second.
5. Wait for at least 3 flashes of the indicator light and 3 tones from the transmitter tester to verify that the transmitter is functioning correctly.
6. If the transmitter fails this test, check the battery in the tester (the transmitter tester requires a 9V battery).
7. Retest the transmitter. If it fails a second time, DO NOT USE THE TRANSMITTER and contact RF Technologies Technical Support.

## Signal Strength

1. Physically enter an Exit Zone with the transmitter and walk through the door.
2. An alarm must occur when the transmitter is within 4-feet of the monitored door. If applicable, the door also locks.
3. If an alarm does not occur, DO NOT USE THE TRANSMITTER and contact RF Technologies Technical Support.
4. If testing an Umbilical Cord transmitter, once the testing is complete, use the activation wand to deactivate the transmitter.

## Weekly Testing

The following testing is required weekly for transmitters in use on patients. All steps are mandatory.

1. Test the operation of transmitters using the transmitter tester.

   **NOTE**: Never take a patient to a door to test their transmitter.

2. Visually inspect transmitters for damage or loose parts.
3. Verify that the warranty expiration date stamped on the transmitter has not expired. If the warranty period has expired, discard and replace the transmitter immediately.
4. If testing an Umbilical Cord transmitter, once the testing is complete, use the activation wand to deactivate the transmitter.
5. Your facility must keep records of test and transmitter inspection.

## Transmitter Cleaning and Care

This section provides detailed information about cleaning and caring for a transmitter.

For an up-to-date list of approved cleaning solutions, visit:

*www.rft.com/Resources/Manuals & Specs/ Transmitters/Transmitter Approved Cleaning Solutions*

**CAUTION**: Use of non-approved cleaners on transmitters can cause permanent damage to the transmitter and the piercing contacts and will void any and all warranties.

**To clean a banded transmitter after use:**

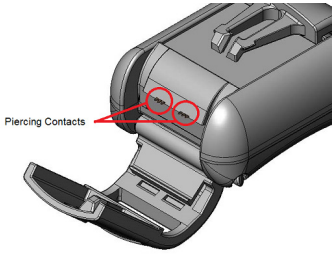
1. Remove the banding material from the transmitter and dispose of it.
2. Use the provided brush to clean the hard-to-reach areas. After each use, brushes can be disposed of or disinfected with alcohol according to your facility's infection control procedures.
3. Disinfect the transmitter with an approved cleaner.

**NOTE**: In order to avoid nuisance alarms, cleaning procedures must be performed at least 100 feet from any Alarming Band Zone.

**CAUTION**: Using an approved cleaner does not confirm the suitability of the cleaner to meet your infection control standard; it only indicates that the transmitter will not be harmed by the cleaner.

The transmitters may be wiped, sprayed or rinsed with water or the approved cleaners during cleaning, but must not be soaked. Soaking transmitters may result in equipment and/or system failure.

4. Allow the cleaner to remain on the transmitter for the amount of time specified by the manufacturer. When using surface disinfectants and decontaminant cleaners, always follow the manufacturer's instructions.



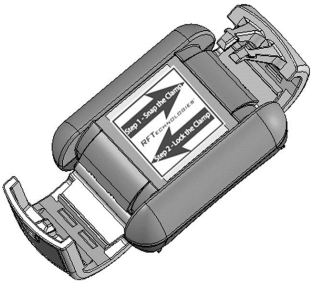

5. Wipe the transmitter with a clean cloth or towel, and then allow the transmitter to air-dry. The transmitter can also be rinsed with water, if required to in the manufacturer's instructions.
6. Inspect the piercing contacts on the transmitter. The contacts must be gold in color and not bent or out of alignment. If the piercing contacts are NOT gold in color or are bent out of alignment, discard the transmitter.
7. Close the clamps on the transmitter
8. Place the clean transmitter in a storage container for future use.

**To clean an Umbilical Cord transmitter after use:**

1. After each use, clean according to your facility's infection control procedures.
2. In addition, scrub each transmitter independently until there are no signs of blood, body fluids, or material on the transmitter.
3. Pay special attention to all surfaces of the transmitter clamp post.
4. Allow transmitters to air dry.

# Replacing the Clamp

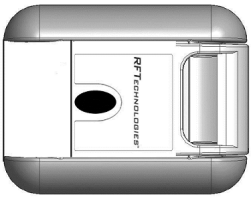
In some cases, you need to replace damaged transmitter clamps. This is done by opening the existing clamps, snapping them off of the transmitter, and inserting new clamps.



**To replace a transmitter clamp:**

1. Open the clamps all the way and gently remove them from the transmitter.
2. Insert the first clamp into the transmitter by inserting the right oval-shaped pin into the hole on the right of the transmitter.
3. Next, line the left oval-shaped pin up with the hole on the left side of the transmitter.

4. Gently snap the left oval-shaped pin into the hole.



5. Close and secure the clamp.
6. Repeat the previous steps for the second clamp.

**CAUTION**: Use care around the piercing contacts on the transmitter as they are extremely sharp. Placing your fingers directly on the piercing contact can result in injury.

# SPECIFICATIONS

## Smart Sense Transmitter

| | |
|---|---|
| **Size** | 1.63 x 1.18 x 0.625 inches |
| **Weight** | 0.71 ounces (20 grams) |
| **Color** | Yellow |
| **Operating Temperature** | 32–122° Farenheit (0–50° Celsius) |
| **Composition** | Latex Free Co-polyester Plastic |
| **Battery Life** | 1 year, Lithium Metal, Non-rechargeable |
| **Frequency - VLF** | 66 kHz or 262 kHz, depending on model |
| **Frequency - UHF** | 318 MHz for all models |
| **Banding** | Soft nylon; yellow<br>Store in clean, dry conditions between 50-80° F, less than 75% humidity |
| **Regulations** | FCC, Part 15b<br>Industry Canada RSS Standard(s)<br>Conforms to UL Standard 294 |

| RFT Part Number | Description |
|---|---|
| 9450-6066-1 | Smart Sense Infant Transmitter (66kHz / 318MHz) |
| 9450-6262-1 | Smart Sense Infant Transmitter (262kHz / 318MHz) |
| 3000-0237 | Smart Sense Banding (6”), Pre-cut, Box of 100 |
| 3000-0239K | Smart Sense Banding (10”), Pre-cut, 10-pack, used for staff training |

# Standard Infant Transmitter

| | |
|---|---|
| **Size** | 1.63 x 1.18 x 0.625 inches |
| **Weight** | 0.71 ounces (20 grams) |
| **Color** | White |
| **Operating Temperature** | 32–122° Farenheit (0–50° Celsius) |
| **Composition** | Latex Free Co-polyester Plastic |
| **Battery Life** | 1 year, Lithium Metal, Non-rechargeable |
| **Frequency - VLF** | 66 kHz or 262 kHz, depending on model |
| **Frequency - UHF** | 318 MHz for all models |
| **Banding** | Polyethylene (plastic) with soft nylon backing; duck print<br>Store in clean, dry conditions between 90°F, less than 20-50% humidity |
| **Regulations** | FCC, Part 15b<br>Industry Canada RSS Standard(s)<br>Conforms to UL Standard 294 |

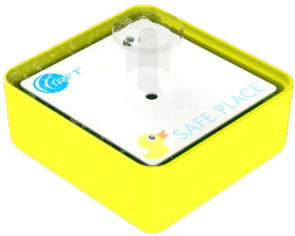
| Part Number | Description |
|---|---|
| 9450-0066 | Safe Place Infant Transmitter (66kHz / 318MHz) |
| 9450-0262 | Safe Place Infant Transmitter (262kHz / 318MHz) |
| 3000-0223 | Safe Place Infant Bands, Duck Print, Box of 100’ |

# Patient (Locking) Transmitter

| | |
|---|---|
| **Size** | 1.63 x 1.18 x 0.625 inches |
| **Weight** | 0.71 ounces (20 grams) |
| **Color** | White with Red Key |
| **Operating Temperature** | 32–122° Farenheit (0–50° Celsius) |
| **Composition** | Latex Free Co-polyester Plastic |
| **Battery Life** | 1 year, Lithium Metal, Non-rechargeable |
| **Frequency - VLF** | 66 kHz or 262 kHz, depending on model |
| **Frequency - UHF** | 318 MHz for all models |
| **Banding** | Naugahyde with acetate fabric facing skin; white or purple<br>Store in clean, dry conditions between 90°F, less 20-50% humidity |
| **Regulations** | FCC, Part 15b<br>Industry Canada RSS Standard(s)<br>Conforms to UL Standard 294 |

| Part Number | Description |
|---|---|
| 0500-0084 | Key, Durable Locking Band Clamp |
| 0500-0084K | Locking Clamp Key Kit, 10-pack |
| 9450-4066 | Patient Care Transmitter (66kHz / 318MHz) w/Lock Clamps |
| 9450-4262 | Patient Care Transmitter (262kHz / 318 MHz) w/Lock Clamps |
| 9450-4000 | Locking Clamps Replacement |
| 3000-0225 | Patient Care Banding, Naugahyde, White, 80’ |
| 3000-0229 | Patient Care Banding, Heavy Duty, Purple, 80’ |

# Umbilical Cord Transmitter




| | |
|---|---|
| **Size** | 1.10 x 1.05 x 0.77 inches |
| **Weight** | 0.25 ounces (7 grams) |
| **Color** | Yellow |
| **Operating Temperature** | 32–122° Farenheit (0–50° Celsius) |
| **Composition** | Latex Free ABS/Polycarbonate Blend Plastic |
| **Battery Life** | 3 month, Lithium Metal, Non-rechargeable |
| **Frequency - VLF** | 262 kHz |
| **Frequency - UHF** | 318 MHz |
| **Regulations** | FCC, Part 15b<br>Industry Canada RSS Standard(s) |

| RFT Part Number | Description |
|---|---|
| 9450-8282 | Umbilical Cord Transmitter (262kHz / 318MHz) |
| 0500-0228 | Umbilical Cord Transmitter Activation Wand |
| 0770-0029 | Umbilical Cord Transmitter Removal Tool |

# Transmitter Tester

| | |
|---|---|
| **Size** | 3.8 x 2.4 x 1.5 inches |
| **Weight** | 3 ounces |
| **Battery** | 9V battery |

| Part Number | Description |
|---|---|
| 9450-0050 | Transmitter Tester |

# REVISION HISTORY

| Revision | Change |
|---|---|
| A | Release |
| B | Added list of approved cleaning products |
| C | Updated format, updated warranty expiration date section, and updated specifications section<br>Fixed minor document bugs |
| D | Updated approved cleaners section |
| E | Updated format and logos<br>Removed Alerts section (information contained in the software reference guides) |
| F | Added Oxivir TB to Approved Cleaner List |
| G | Added the ICC French translations to the Compliance section |
| H | Updated graphics to print in color<br>Updated specifications section to include the transmitter tester |
| I | Removed Approved Cleaners section and added reference to website link for most up-to-date list |
| J | Added Umbilical Cord Transmitter instructions and specifications<br>Updated battery specifications to Lithium Metal, Non-rechargeable |

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**0510-1121-J**
**Release Date:** 04/2019

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