

LTE910PS POTSwap Quick Start Guide

Set-Up

Operating the POTSwap with voice (telephone) equipment can be achieved through the following steps:

1. Gather the required equipment:
 - LTE POTSwap
 - Power Supply - This can be hard-wired from a user supplied power source via the terminal block header (** See section 9 - Compatible Terminal Block Connectors of User Manual*) or using the optional wall transformer
** See section 11 - Accessories of User Manual.*
 - Cellular antennas - Two LTE cellular antennas are recommended.
** See section 11 - Accessories of User Manual.*
 - GPS antenna - An active GPS antenna must be connected the GPS antenna connector to provide E911 location support.
** See section 11 - Accessories of User Manual.*
 - The POTSwap requires an activated SIM card. A 'micro' (3FF size) SIM card is required.
2. Install the SIM card in the rear panel SIM slot. *See SIM Card Installation on back.*
3. Connect the cellular antennas to the SMA connectors labeled 'CELL 1' and 'CELL 2'. This can be a local antenna or a remote antenna connected by a coaxial cable.
4. Connect a GPS antenna to the SMA connector labeled 'GPS'.
See GPS information on back.
5. Connect power to the unit. Once powered, the unit should show a connection to the cellular carrier within a minute. This will be indicated by a rapidly flashing GREEN 'STATUS' LED, a GREEN 'CELL' LED, and a steady signal strength indication on the Received Signal Strength LED stack.

Once powered, the unit should show a connection to the cellular carrier within a minute. This will be indicated by a rapidly flashing GREEN 'STATUS' LED, a blinking 'CELLULAR' LED, and a steady signal strength indication on the Received Signal Strength LED stack.

Voice Operation

Voice operation requires a standard voice telephone device to be connected to the POTSwap. (** Please refer to the User Manual Section 3 for full Voice Operation information*).

Telephone devices that automatically take the phone off-hook and place a call to a fixed telephone number are compatible with the POTSwap. Dialing digits should not be sent faster than 100 ms per digit, with a minimum DTMF tone duration of 45 ms.

*Note: The POTSwap is compatible with DTMF dialing only.
Pulse dialing (rotary phones) is not supported.*



Voice Operation Configuration

SIM Card Installation

The POTSwap requires the installation of an activated SIM card for operation. A 'micro' (3FF) size SIM card is required.

The SIM card holder is mounted to a p.c. board behind the slot, so some care is required to insure that the SIM card is inserted correctly. It should not take much effort to insert the SIM card if properly aligned.



Do NOT force the SIM card into the slot. Do not insert tools, paperclips, etc. into the slot.

Insert the SIM card into the SIM slot with the following orientation:

- gold contact side facing down
- narrow edge with chamfered corner in first.



Do NOT use a SIM card adapter to install nano sized SIMs into the POTSwap. The adapter edge can catch on the SIM socket and cause permanent damage.

GPS

GPS Operation

POTSwap models have a GPS antenna connector installed on the back plate and offer the ability to provide enhanced location information to emergency (911) operators. A suitable GPS antenna must be used and the antenna must be properly located to receive the GPS signals.

The GPS operation is automatic, and is independent of the cellular radio operation. When the unit has acquired a GPS location fix, the GPS LED will be GREEN.

This indication is independent of the cellular signal strength indication. See section 5.1 of the User Manual – Front Panel. A GPS location fix should be available within a few minutes of operation under normal conditions.

GPS Antenna

For best results, it is recommended that an active GPS antenna be used with the POTSwap. The GPS antenna connector provides a 3.3V bias voltage to power an active antenna, and should easily be able to supply the 5 to 25mA of current that a typical active GPS antenna requires. Any standard off-the-shelf active GPS antenna that will operate at the 3.3V bias voltage should suffice.

GPS Antenna location

The ideal GPS antenna position would be an outdoors location with a clear view of the sky to the horizon in all directions, with no obstructing structures or foliage. A higher antenna placement usually gives a better view of the sky over surrounding obstructions. In the northern hemisphere, a southern sky view is preferable over a northern sky view. If the antenna must be indoors, placement as near as possible to a window is preferable. Receiving a GPS location fix deep inside buildings or in dense urban environments ("street canyons") is normally not possible.