# Comrex Connect Modems for ACCESS NX

**Product Manual** 



# **COMREX CONNECT MODEMS**

Comrex Connect is a professional grade, high gain LTE modem designed to work with the ACCESS NX Portable audio codec. NX Connect modems are available in four varieties:

- Compatible with the Verizon network in the US\*\*
- Compatible with the AT&T network in the US
- Compatible with China, Japan, South Korea, Taiwan and Brazil
- Compatible with many other LTE networks worldwide
  - \*\* Connect modems for Verizon do not support 3G services

#### **VERIZON VERSION**

The NX Comrex Connect for Verizon is able to work on the network's main LTE channel at **700MHz**, known as **Band 13**. In addition, it can operate on the **AWS Band 4**, marketed as XLTE by Verizon.

# **AT&T VERSION**

The NX Comrex Connect for AT&T is able to work on the following LTE bands:

- 700MHz (Band 17)
- 850Mhz (Band 5)
- AWS (Band 4)
- 1900 MHz (Band 2)

In addition, in the absence of LTE service, this modem offers 3G service in **Band 5** and **Band 2**.

#### **CJ VERSION**

The Comrex Connect CJ is able to work on the following 4G bands:

- 1900MHz (BAND 1)
- 1800MHz (BAND 3)
- 850MHz (BAND 5)
- 2600MHz (BAND 7)
- 900MHz (BAND 8)
- 800MHz (BAND 18)
- 800MHz (BAND 19)
- 1500MHz (BAND 21)
- 700MHz (BAND 28)
- 2600MHz (TDD) (BAND 38)
- 1900MHz (TDD) (BAND 39)
- 2300MHz (TDD) (BAND 40)
- 2500MHz (TDD) (BAND 41)

And covers the following 3G bands:

- 2100MHz (BAND 1)
- 850MHz (BAND 5)
- 800MHz (BAND 6)
- 900MHz (BAND 8)
- 1700MHz (BAND 9)
- 800MHz (BAND 19)
- 1900MHz (TD-SCDMA) (BAND 39)

#### **INTERNATIONAL VERSION**

The NX Comrex Connect International is able to work on the following LTE bands:

- 2100MHz (BAND 1)
- 1900MHz (BAND 2)
- 1800MHz (BAND 3)
- 2100/1700MHz (BAND 4)
- 850MHz (BAND 5)
- 2600MHz (BAND 7)
- 900MHz (BAND 8)
- 700MHz(a) (BAND 12)
- 700MHz(c) (BAND 13)
- 800MHz (BAND 20)
- 1900MHz (BAND 25)
- 850MHz (BAND 26)
- 700MHz (BAND 29)
- 2300MHz (BAND 30)
- 2500MHz (TDD) (BAND 41)

And covers the following 3G bands:

- 2100MHz (BAND 1)
- 1900MHz (BAND 2)
- 1800MHz (BAND 3)
- 2100/1700MHz (BAND 4)
- 850MHz (BAND 5)
- 900MHz (BAND 8)

# **INTERNATIONAL VERSION COUNTRIES**

The International NX Comrex Connect modem is designed to work in many countries. It is unlocked and carries PTCRB certification, allowing it to register on most networks worldwide. While the Connect modem covers most of the bands used by carriers in the U.S., it does not have the carrier-specific certifications required for use on these networks.

LTE coverage by country/region:

In Europe and Africa, Bands 20, 7, and 3 are most common and are covered by the Connect Modem. This modem also supports Band 8, used by a select number of carriers in Europe. In most of Asia, Bands 7, 3, and 1 are common, exclusive of China, Japan, and India. In India, some carriers use band 41 (TDD) and others use Band 3. In Oceania and the Middle East, Bands 7 and 3 are common. In Canada, Latin America and the Caribbean, Bands 7 and 4 are common.

# **ARRANGING LTE SERVICE**

Since the NX Comrex Connect modem is certified to work on most networks, you can deliver the IMEI number of the modem (from the label) to the carrier. The carrier will provide a SIM card for your modem. Request a "full size" SIM card if possible.

It's often possible to move a SIM card from an existing USB modem or Hotspot (or even a tablet) and use that data service directly on the NX Comrex Connect.

# **OPENING THE NX CONNECT MODEM CHASSIS**

The NX Comrex Connect modem has a captive thumbscrew that can be turned to open the chassis. Once the thumbscrew is completely loose, pull down on the top cover (toward the USB jack) to remove it.

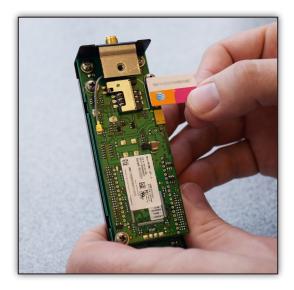




#### **INSERTING THE SIM**

SIM cards currently come in three sizes: Full, Micro, and Nano. NX Connect modems use a Full-Size SIM card. Smaller sizes can be accommodated with the included SIM adapters.

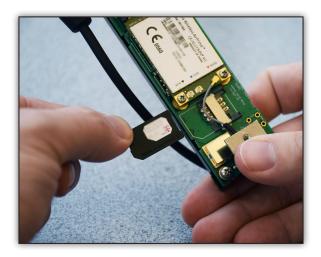
For the AT&T and Verizon models, the SIM card is inserted as shown below.



If using Full Size adapter for smaller SIMs, first insert the SIM completely into the adapter and then apply the entire assembly to the SIM socket.



For the CJ and International NX Connect modem, the process is the same, but the SIM slot is in a different location.



Once the SIM is installed correctly, reattach the modem's top cover and re-secure the thumbscrew.

# **INSTALLING THE NX CONNECT BRACKET**

Mounting brackets for the Comrex NX Connect modem are available in single and dual mount styles. The single mount bracket will hold one modem, while the dual mount bracket is designed for use with two modems concurrently.

To begin, place a modem into the bracket's pouch. Align the modem in the pouch so that the SMA jack is lined up with the circular hole on the pouch and the micro-USB connector is aligned with the rectangular hole on the pouch.



Fold the side flaps over the top of the modem on both sides.



Fold the longer flap up and over the smaller flap attaching it to the velcro of the smaller flap. The pouches should be snug and securely closed.

For dual modem brackets, the pouches are placed above and below the bracket. These pouches are placed in opposite orientations for ease of use with the antennae and micro-USB ports.



To attach the mounting bracket to the NX, remove the top two Philips screws on the top plate.



Place the bracket and pouch assembly so that the bracket mounting holes align with the top plate holes. Re-apply the two Philips screws. Proper installation of the single and dual modem brackets are shown in the photos below.



### ANTENNA

The external antenna is required for proper modem operation. The antenna is designed to work over all the LTE and 3G bands supported by the modem. Attach the antenna to the SMA jack securely to the modem. For dual modem use, each modem will require it's own antenna.

Connect the USB cable by seating the micro-USB into the micro-USB connector on each of the modems as shown.



### **USB CONNECTION**

The Comrex Connect requires a USB connection between the modem(s) to the NX to access cellular networks.



Run the supplied USB cable from the micro-USB socket of the NX Connect modem(s) to the respective side USB connector(s) on the NX.



#### **USING COMREX CONNECT**

Once attached, the Connect modem(s) will appear in the network list of your ACCESS NX like any other network device, and will have all the same options.

When first installed, the modem(s) may appear as a "Network Device". Within about 30 seconds their names should change to one of the following:

- AT&T: LE910-NAG
- Verizon: LE910-SVG
- CJ: MC7430
- International: MC7455

See the ACCESS NX user manual for more info on configuring APNs for modems.

#### INDICATORS

The Connect modem has two LED indicators. The red LED indicates power is active to the modem. The green LED has different behavior depending on the type of modem:

- Verizon Flashing green indicates the modem is registered with the network
- International Solid green indicates the modem is registered with the network
- AT&T The green indicator does not activate at all in current firmware
- CJ Solid green indicates the modem is registered with the network