#### **Appendix C – Mobile Wireless Coverage Maps**

This appendix contains coverage maps for each of the six mobile wireless carriers: AT&T Mobility, Sprint, T-Mobile, U.S. Cellular, Verizon Wireless and VTel Wireless. These maps were generated by exporting the EDX SignalTM map data and drive test map data to Esri Arcview. Soft copies have been provided to VCGI separately.

Only four carriers provided broadband data service in Vermont as of September 2013. These carriers are AT&T Mobility, Sprint, U.S. Cellular and Verizon Wireless. Consistent with 2010 results, T-Mobile still provided only low data rate services as of the completion of the drive test survey. These five carriers provided wireless voice services. VTel Wireless is currently deploying its infrastructure and did not have a significant number of sites on the air at the time of the drive test. The maps for VTel Wireless show expected coverage once the known and modeled sites are deployed and operational.

For the four broadband data carriers, six individual maps are provided:

- Computer modeled wireless data coverage from Pericle with cell locations shown
- Actual downlink wireless data results as measured during the drive test survey.
- Actual uplink wireless data results as measured during the drive test survey.
- Type of wireless data infrastructure provided (e.g. UMTS/HSPA vs. GSM/EDGE).
- Computer modeled voice coverage from Pericle with cell locations shown.
- Actual voice call results as measured during the drive test survey.

Note that the downlink is the radio path from the cell site to the subscriber device. The uplink is the radio path from the subscriber to the cell site.

For T-Mobile, voice and low speed data coverage are virtually identical as the two services are provided using the same infrastructure. Five maps are provided for T-Mobile:

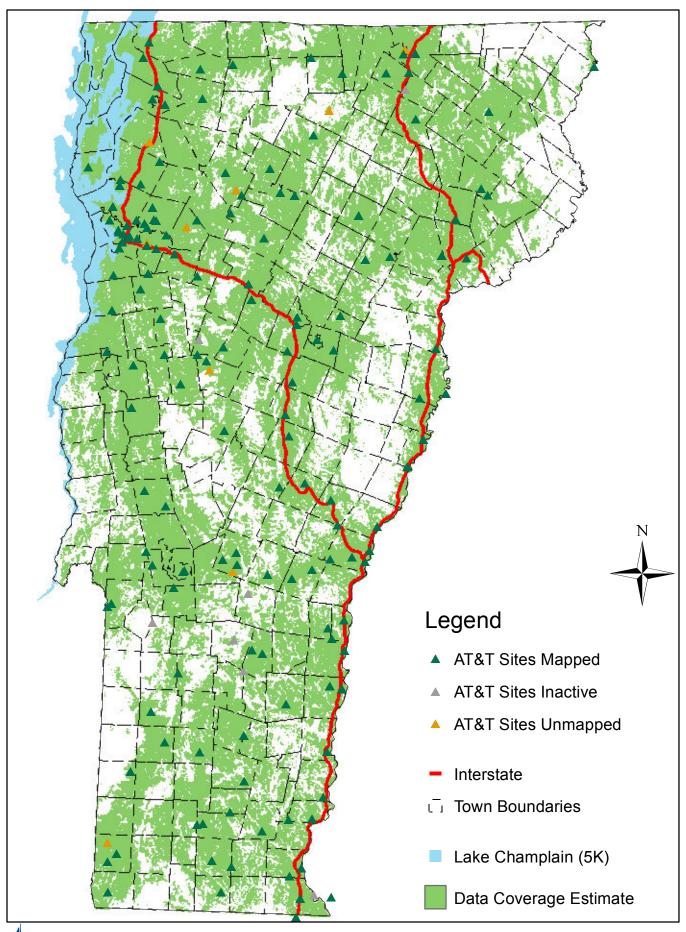
- Computer modeled voice/data coverage from Pericle with cell locations shown.
- Actual downlink wireless data results as measured during the drive test survey.
- Actual uplink wireless data results as measured during the drive test survey.
- Type of wireless data infrastructure provided.
- Actual voice call results as measured during the drive test survey.

#### For VTel Wireless, two maps are provided:

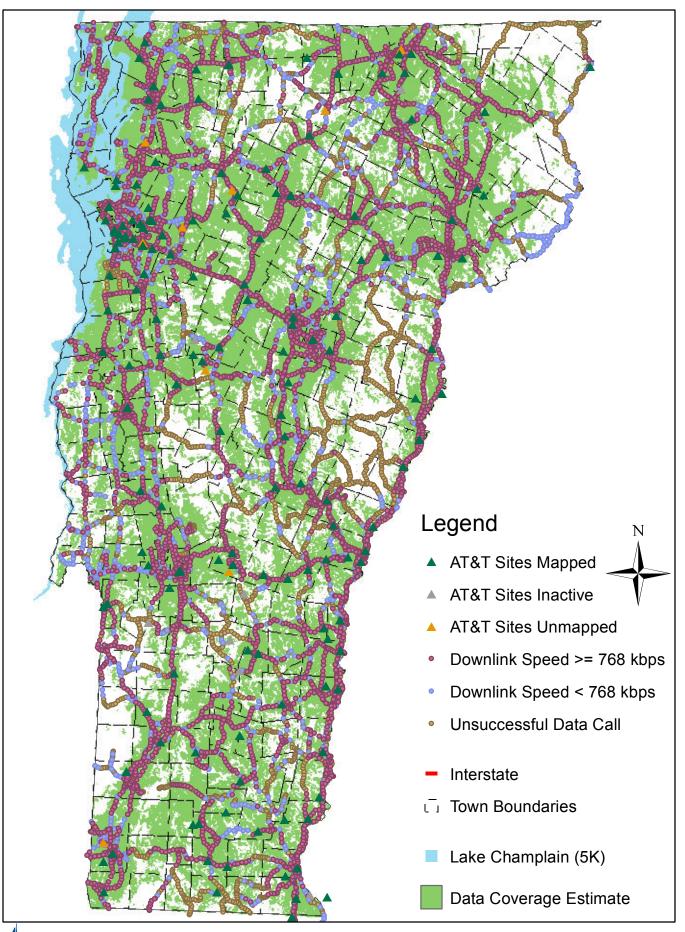
- Computer modeled wireless data coverage from Pericle with cell locations shown
- Computer modeled voice coverage from Pericle with cell locations shown.

The maps are presented in alphabetical order by carrier name.

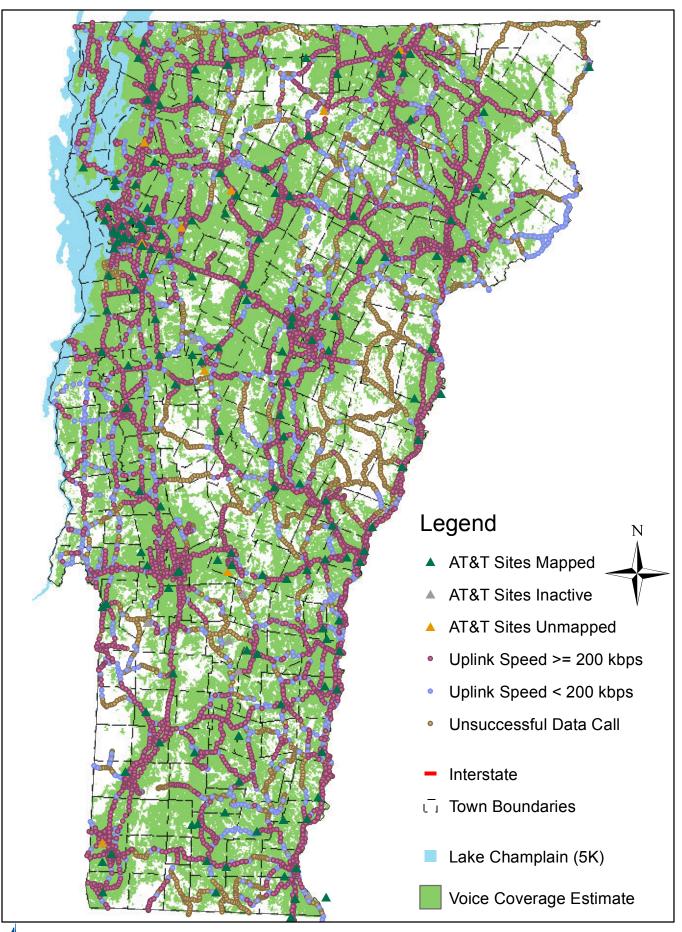
# AT&T Data Coverage and Cell Sites



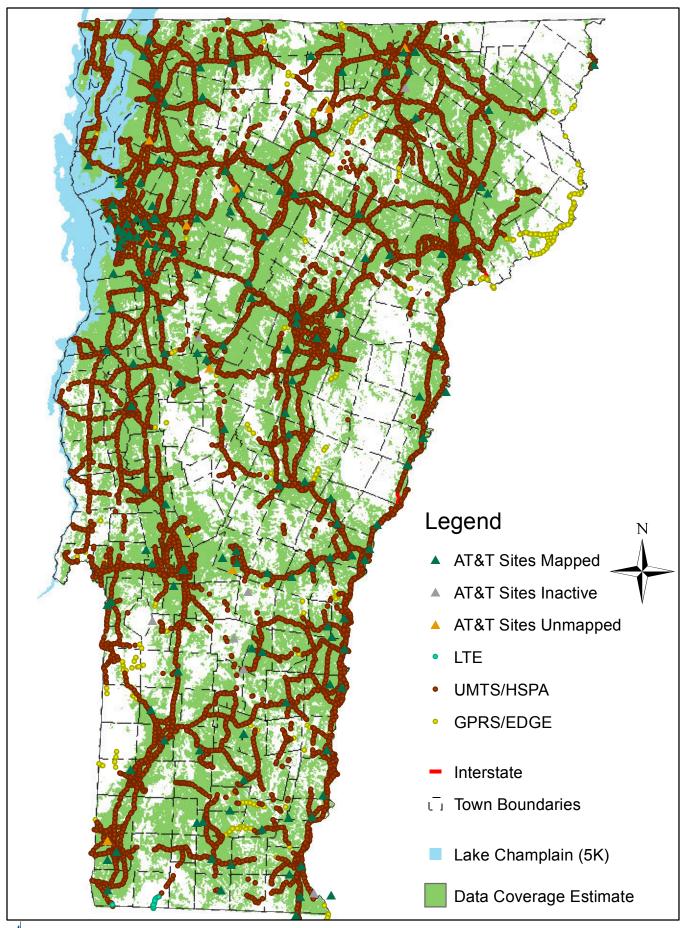
## AT&T Downlink Data Test Results



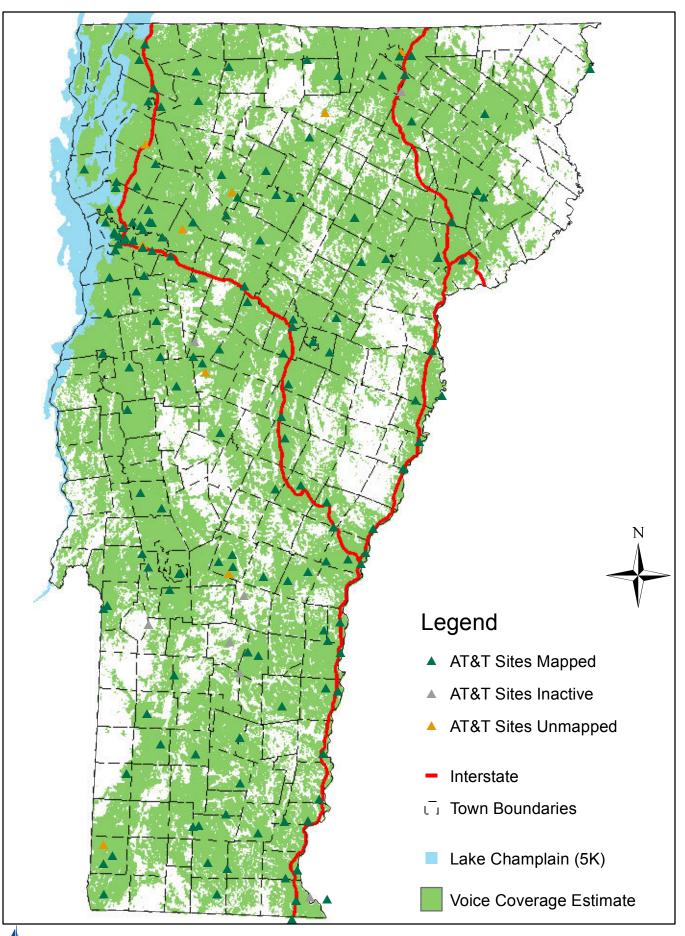
# AT&T Uplink Data Test Results



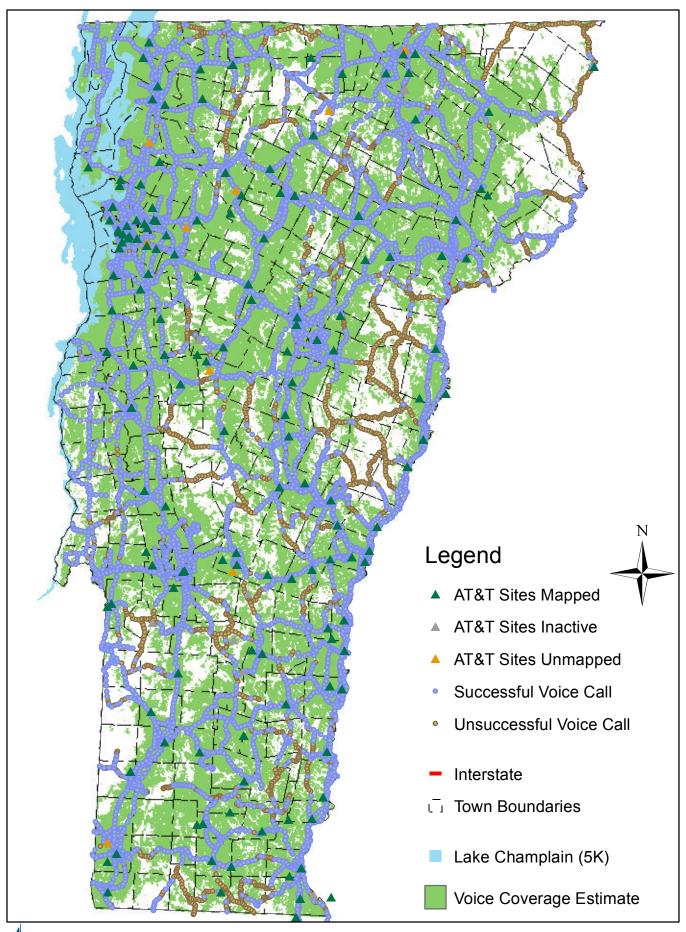
### AT&T Data Call Infrastructure



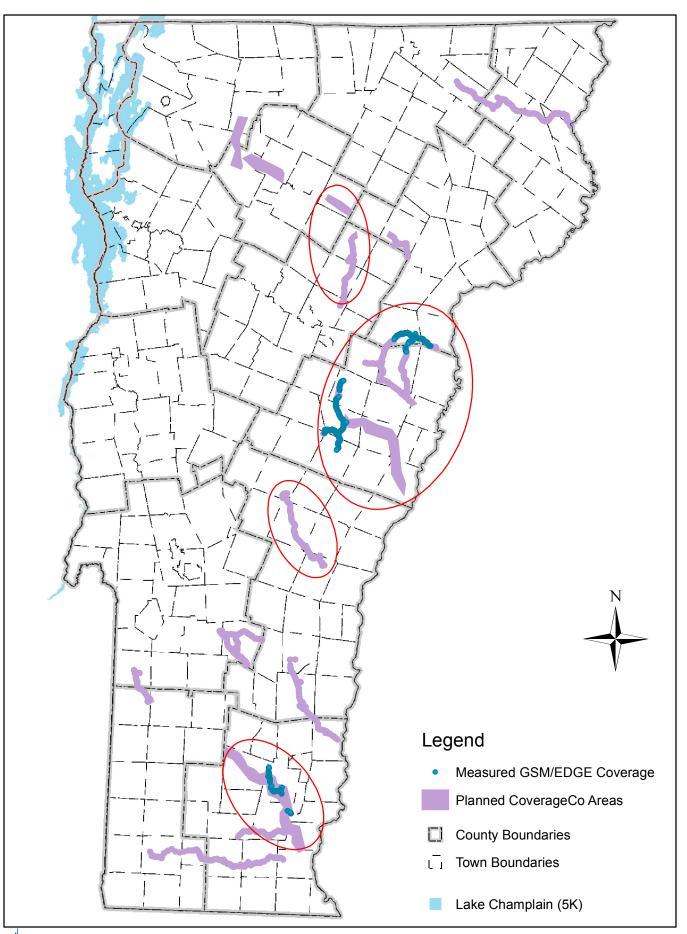
# AT&T Voice Coverage and Cell Sites



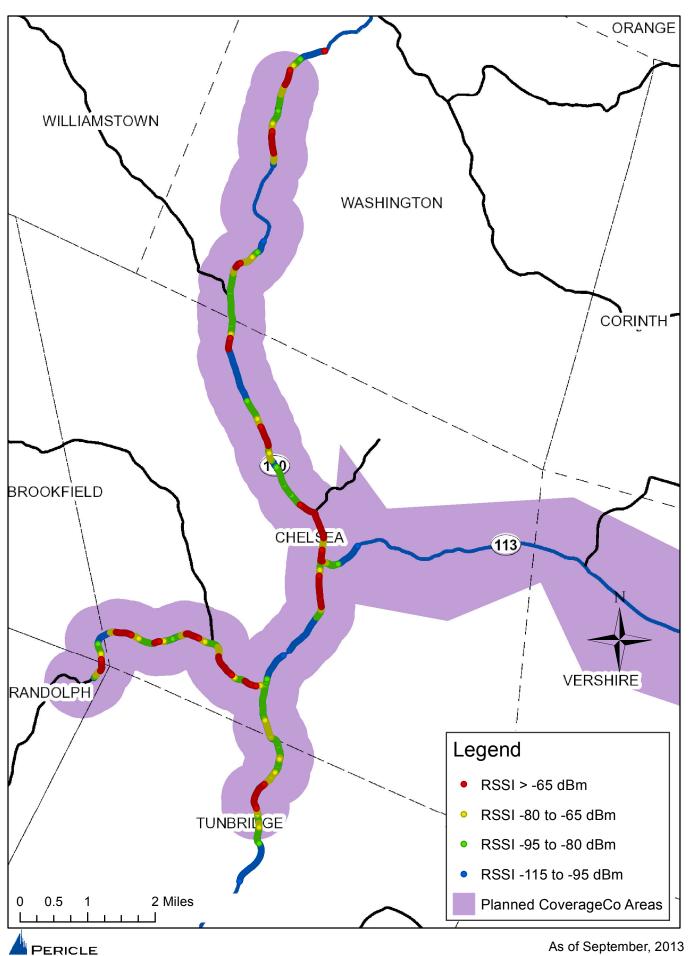
### AT&T Voice Call Results



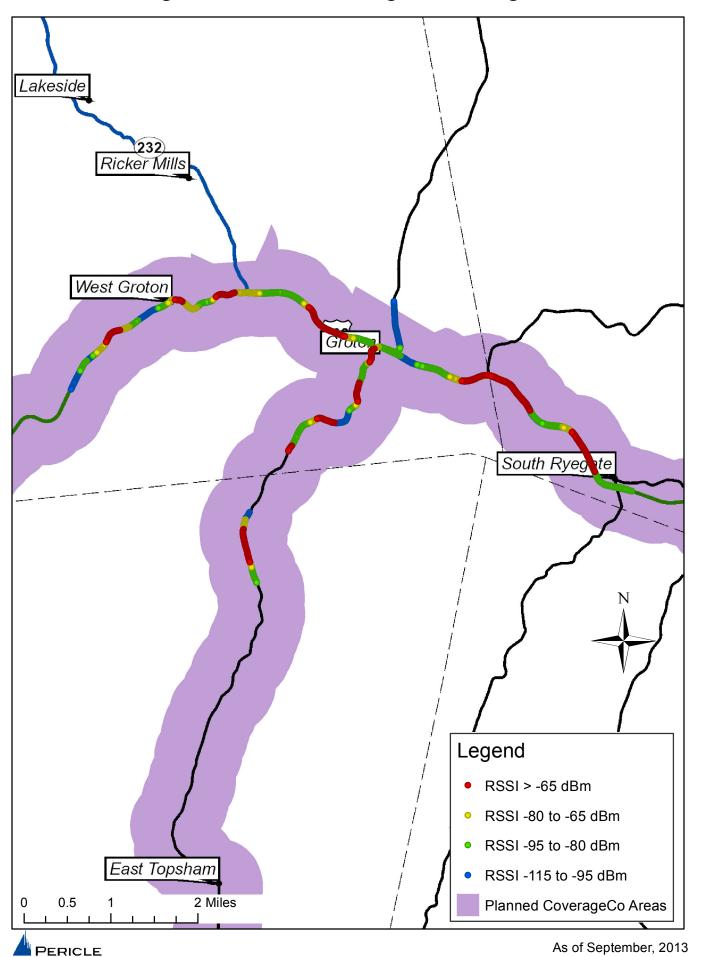
# CoverageCo Test Results vs. Expected (Red)



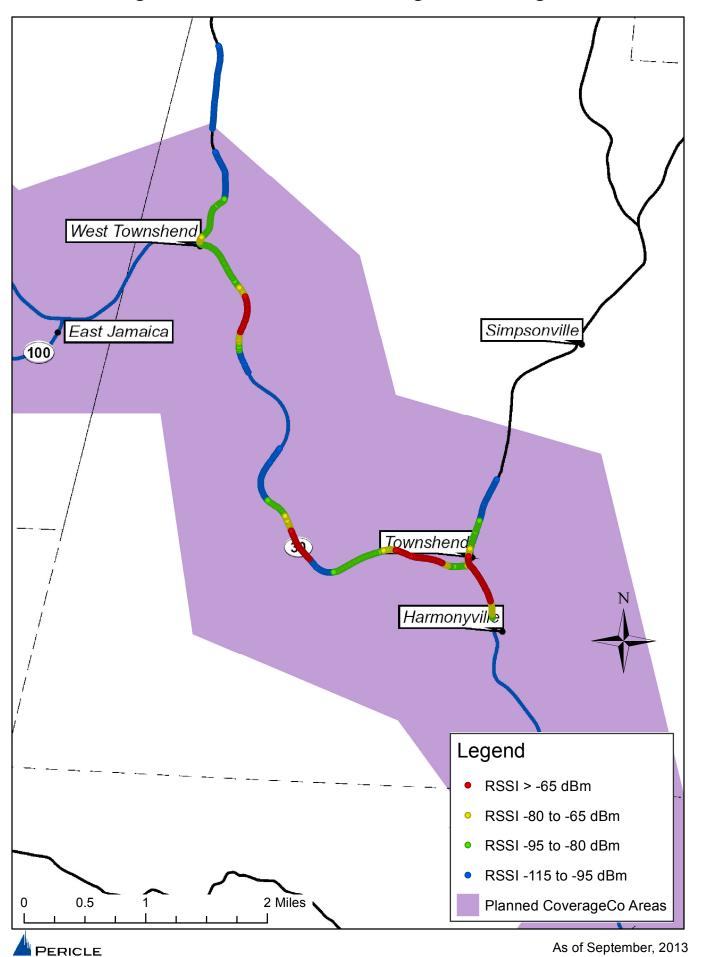
## CoverageCo Chelsea VT Signal Strength Detail



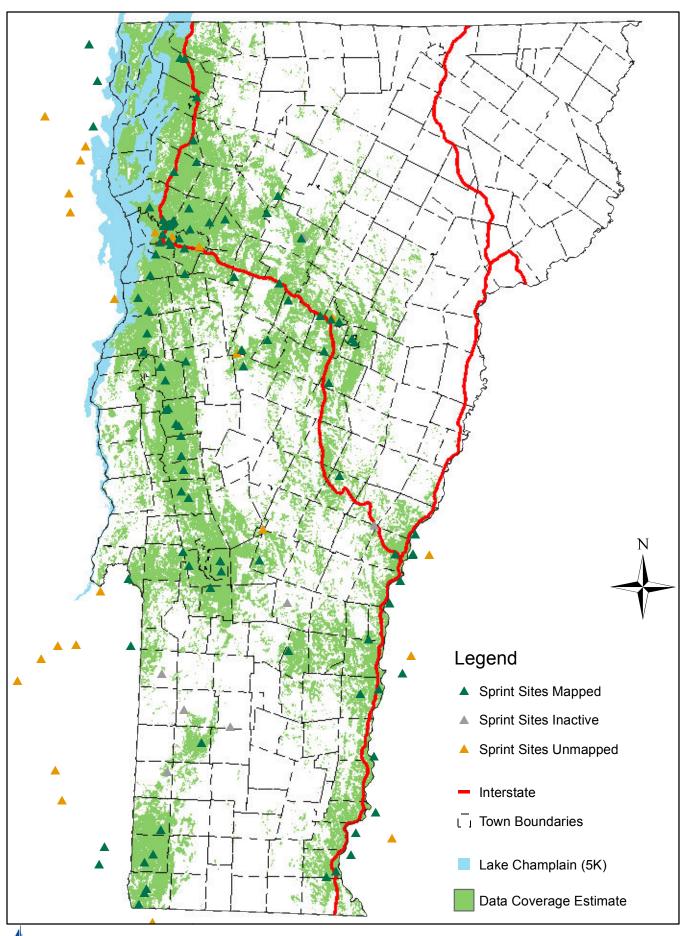
# CoverageCo Groton VT Signal Strength Detail



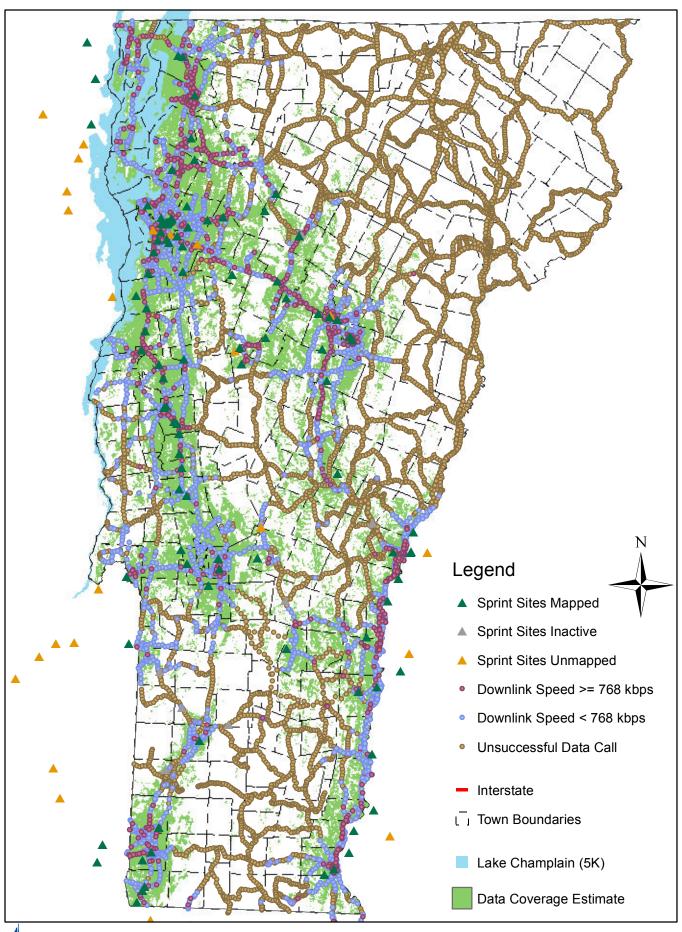
# CoverageCo Townshend VT Signal Strength Detail



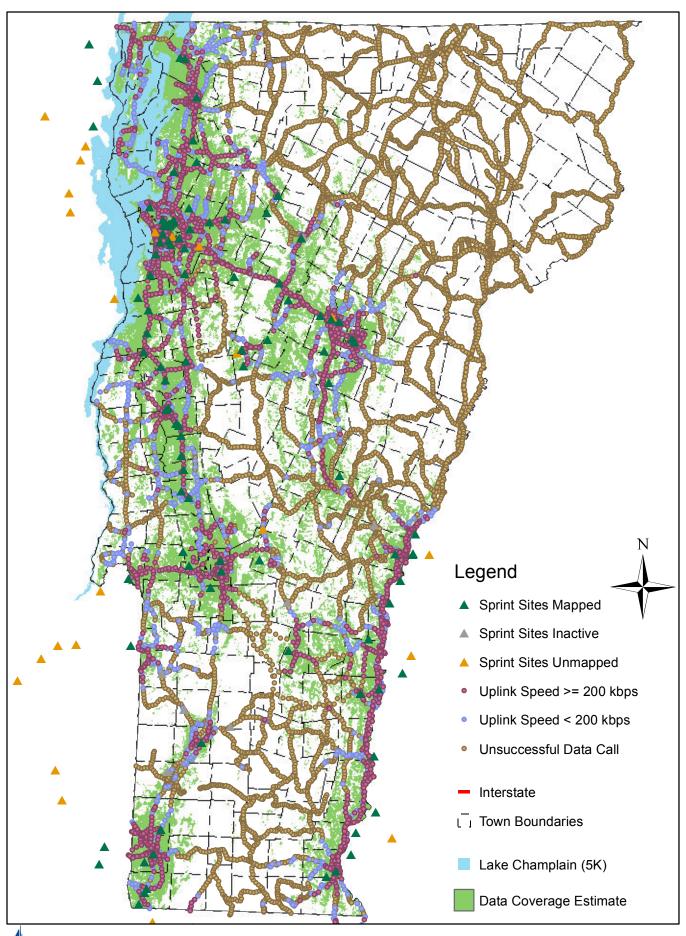
# Sprint Data Coverage and Cell Sites



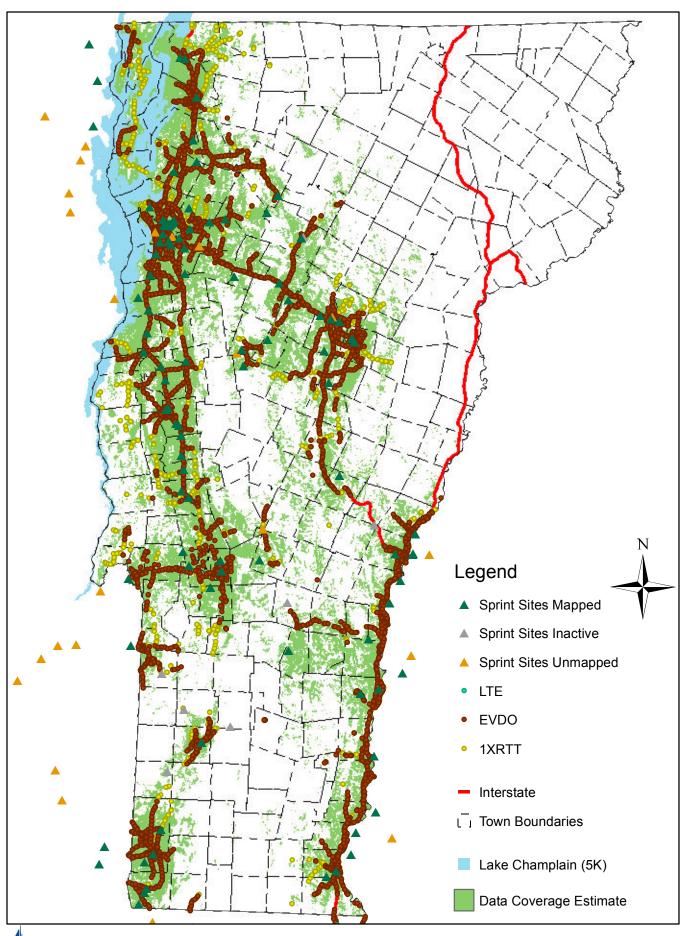
## Sprint Downlink Data Test Results



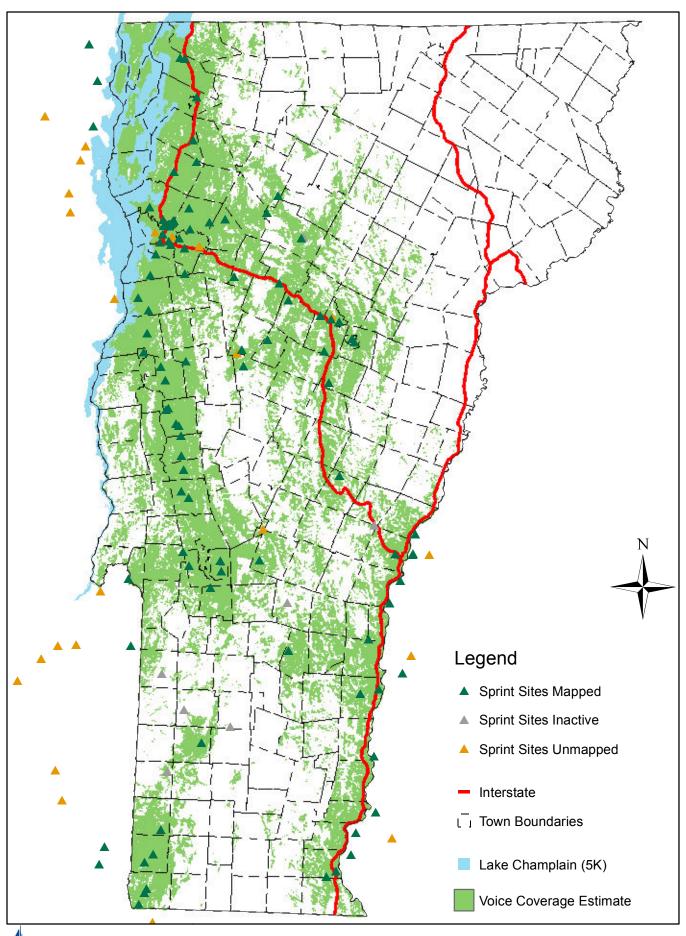
# Sprint Uplink Data Test Results



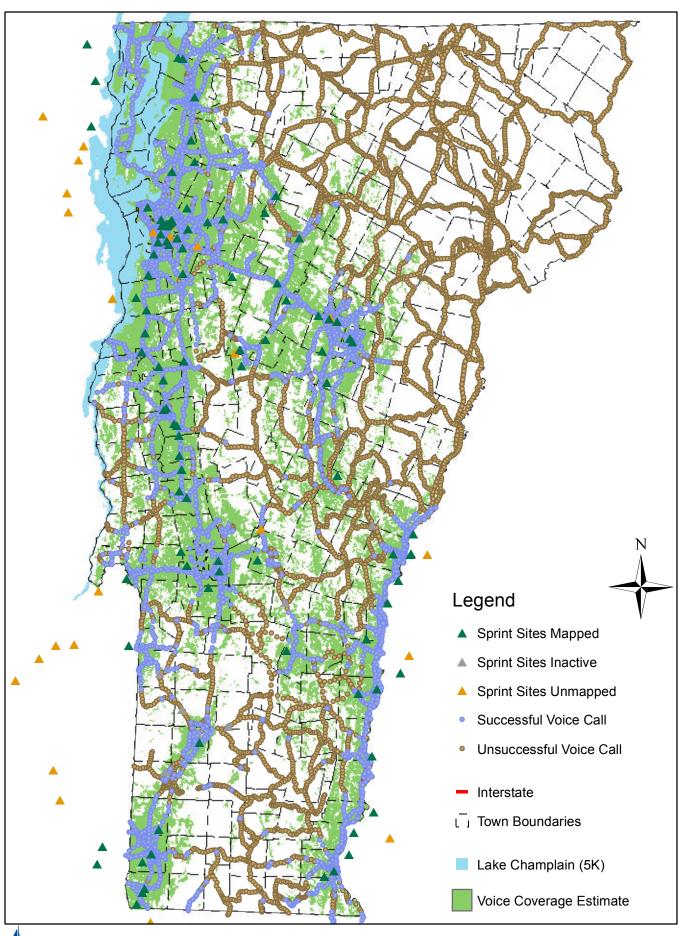
# Sprint Data Call Infrastructure



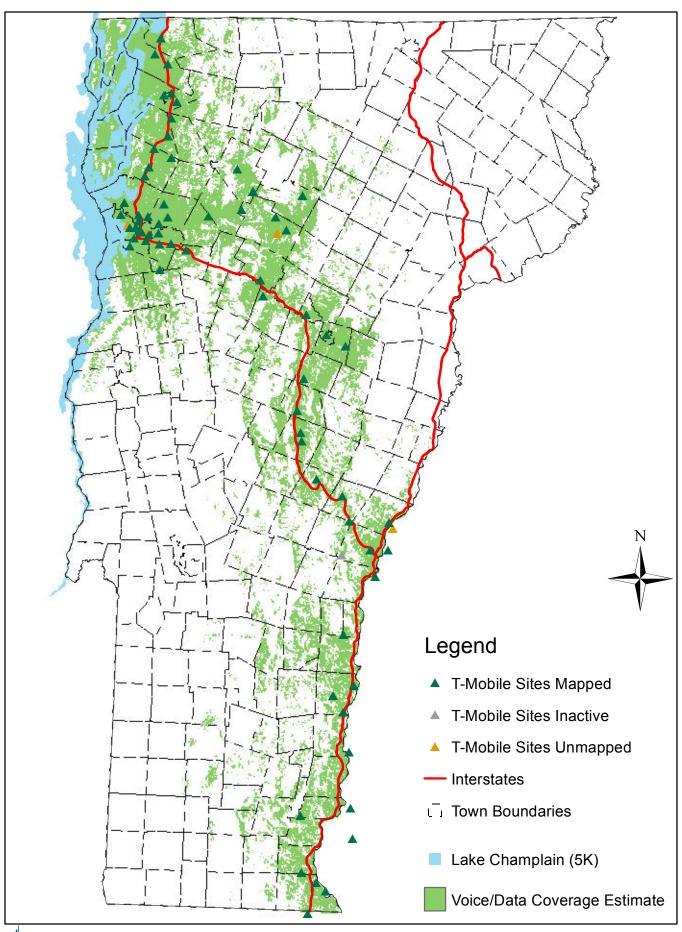
# Sprint Voice Coverage and Cell Sites



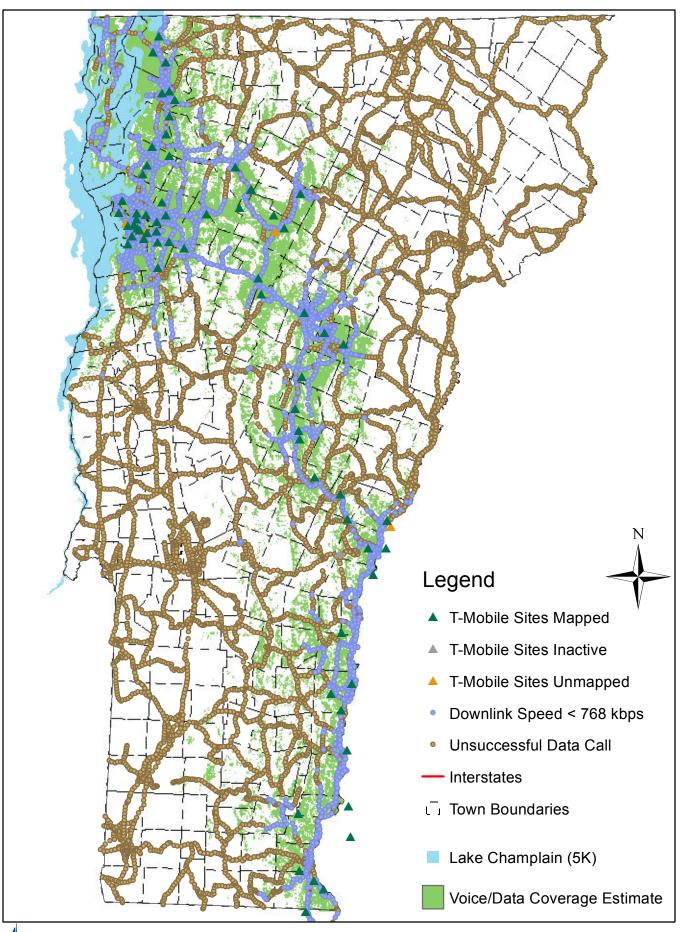
## **Sprint Voice Call Results**



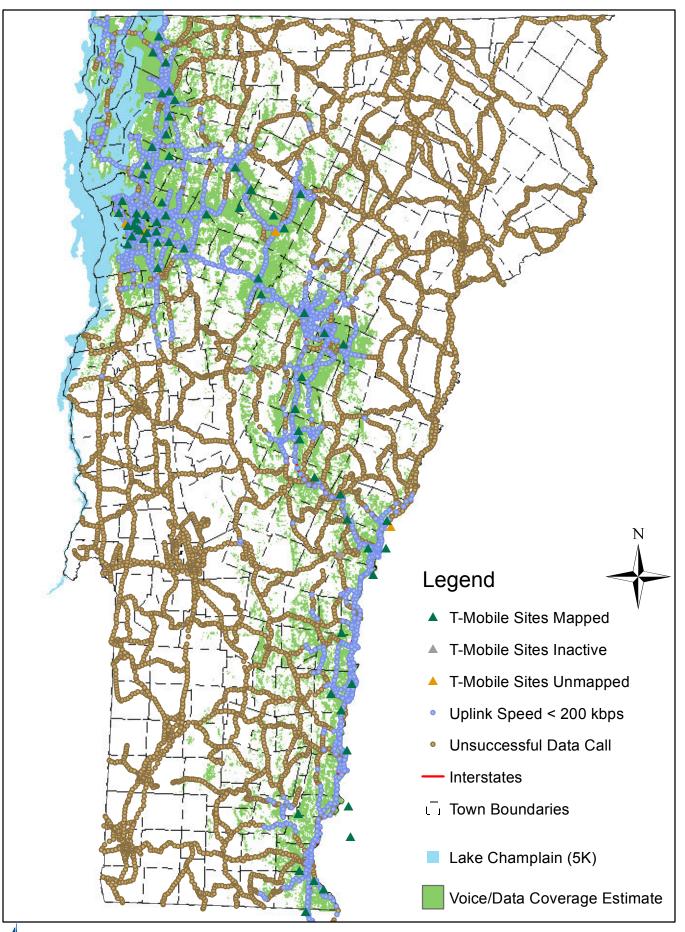
## T-Mobile Voice/Data Coverage and Cell Sites



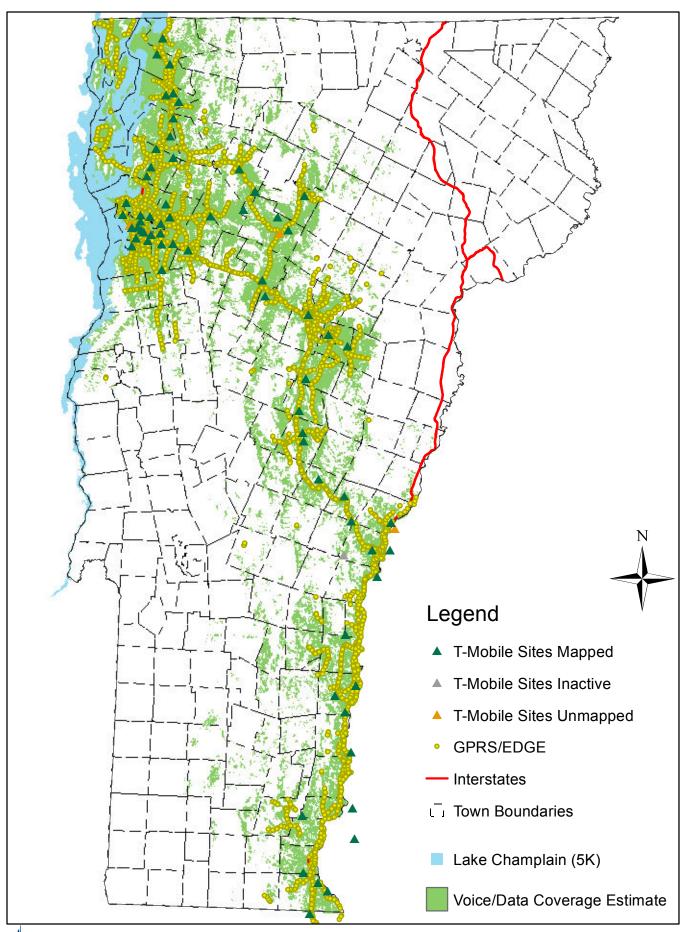
## T-Mobile Downlink Data Test Results



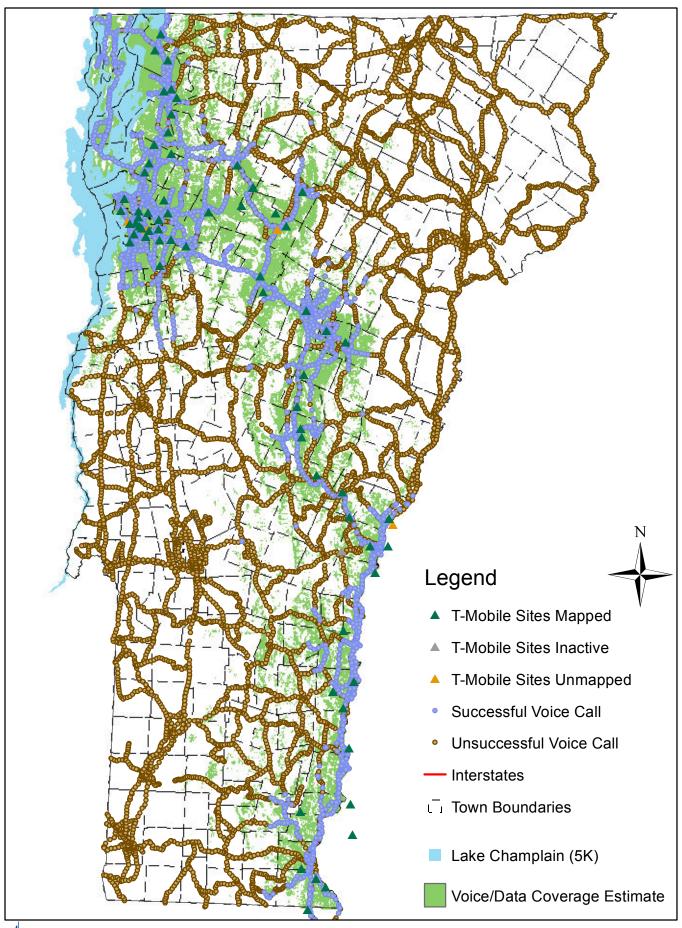
## T-Mobile Uplink Data Test Results



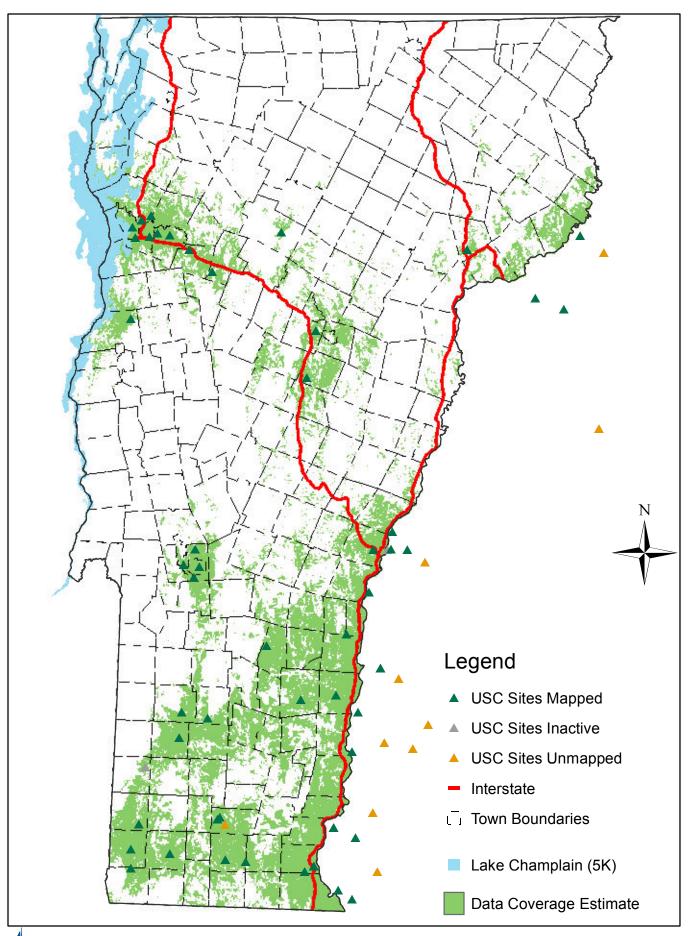
#### T-Mobile Data Call Infrastructure



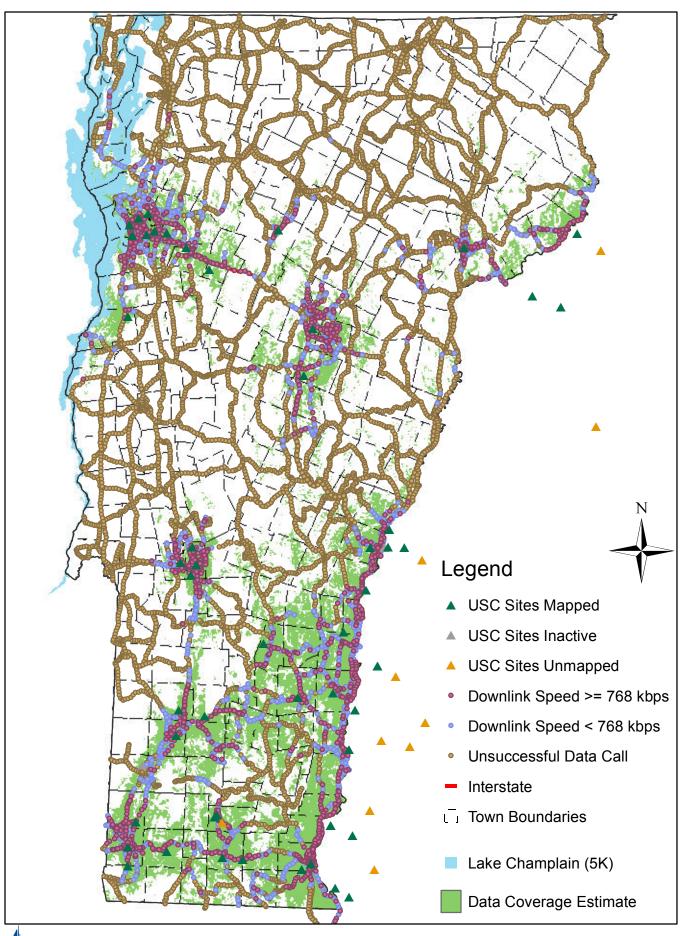
#### T-Mobile Voice Call Results



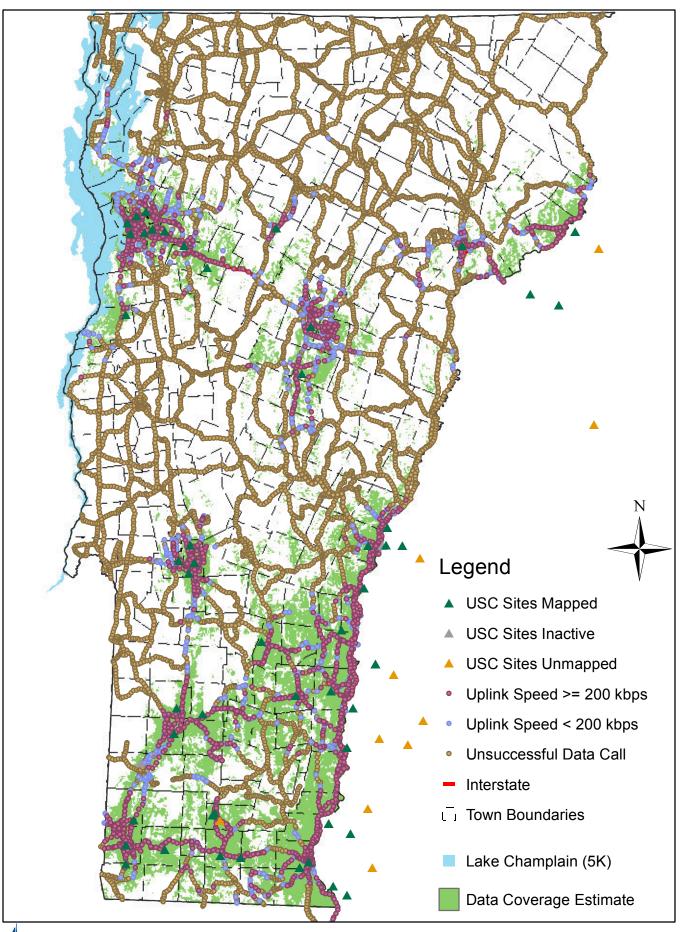
# US Cellular Data Coverage and Cell Sites



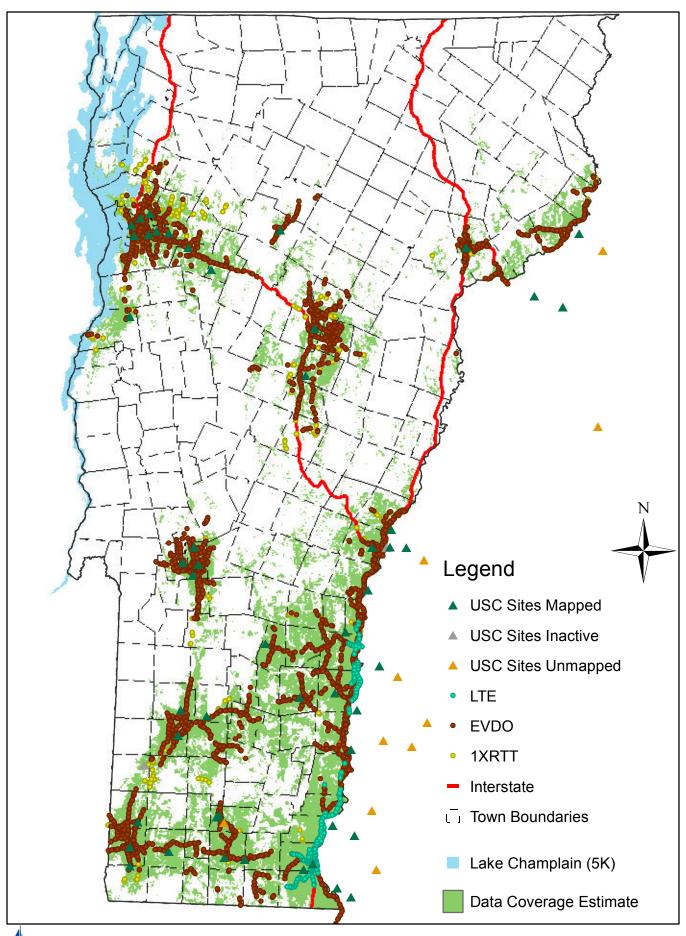
### US Cellular Downlink Data Test Results



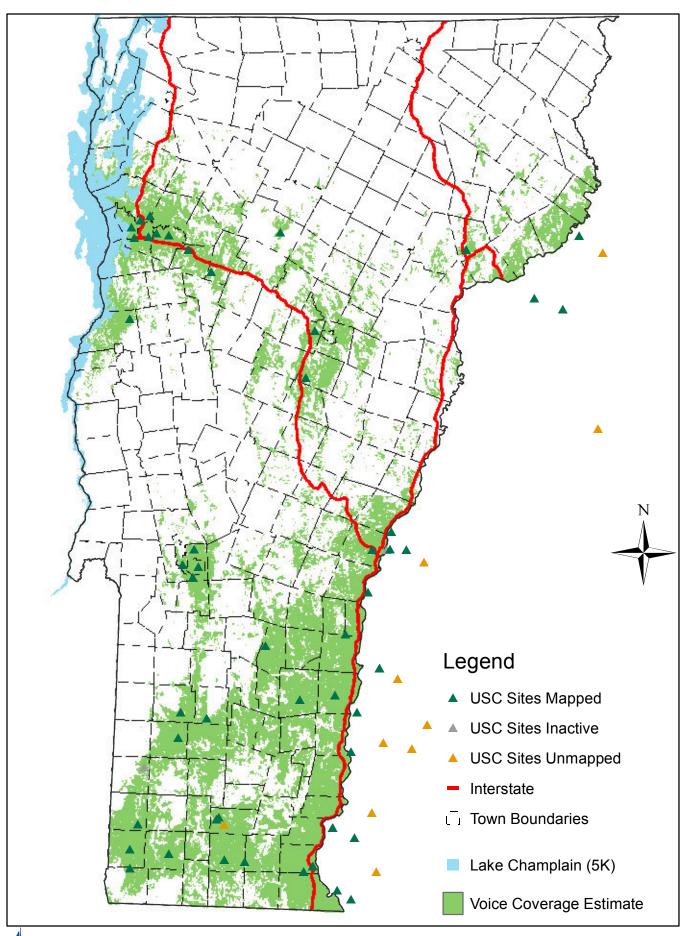
# US Cellular Uplink Data Test Results



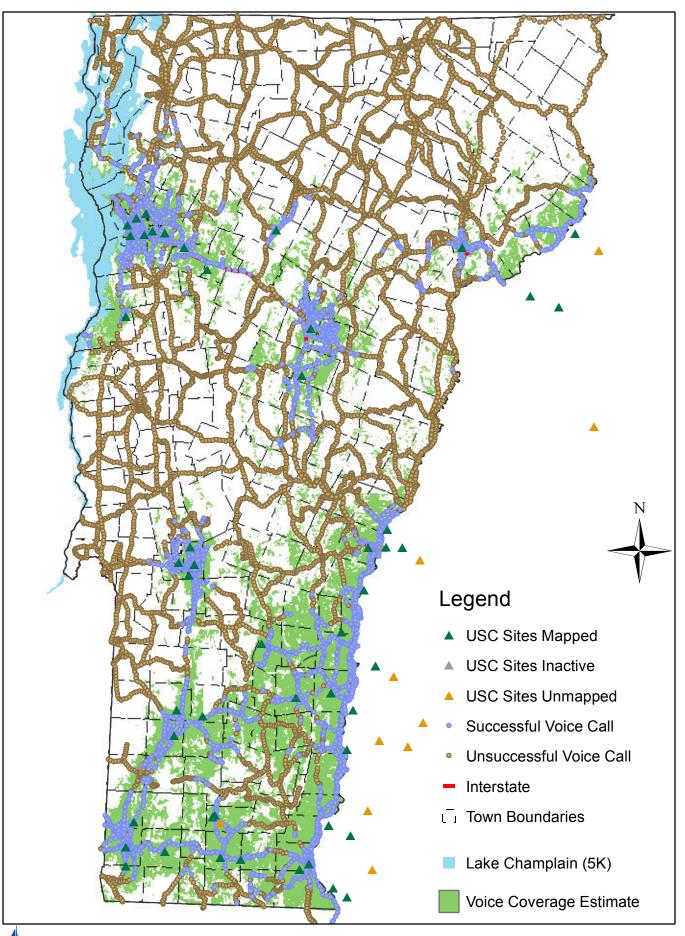
## US Cellular Data Call Infrastructure



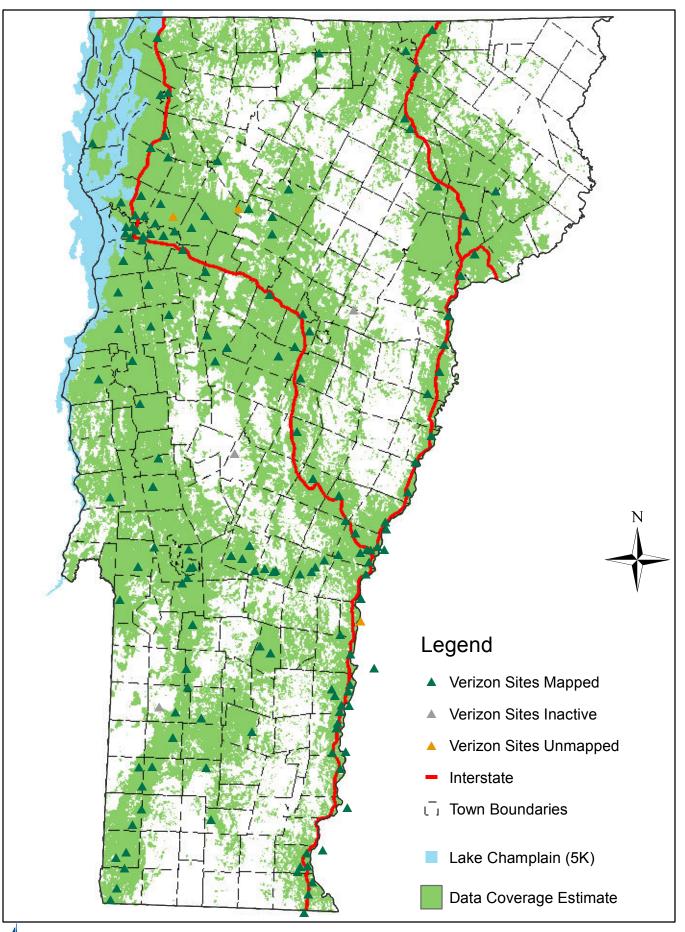
# US Cellular Voice Coverage and Cell Sites



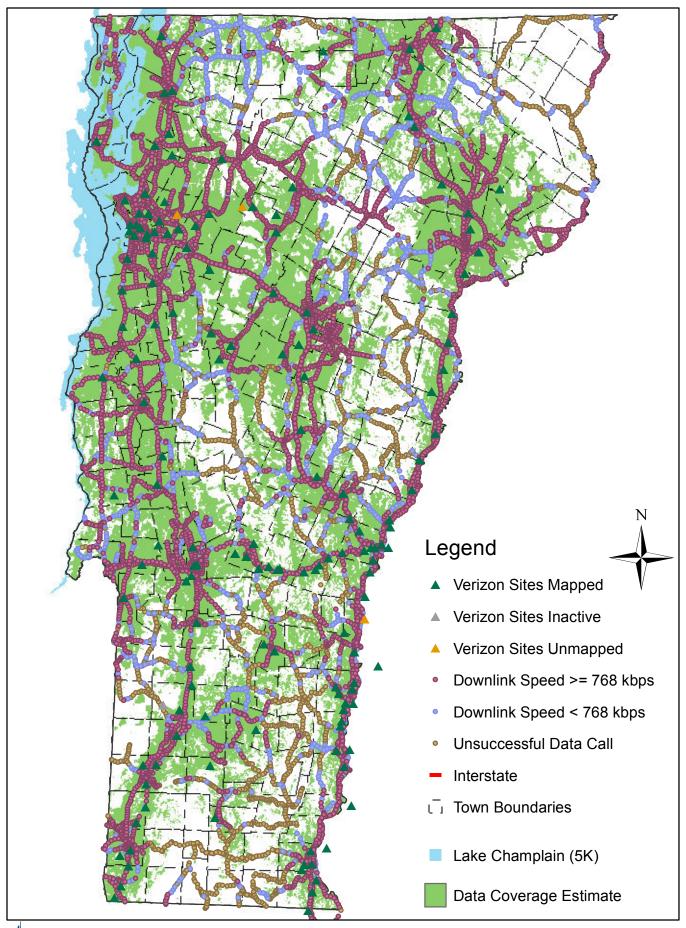
### **US Cellular Voice Call Results**



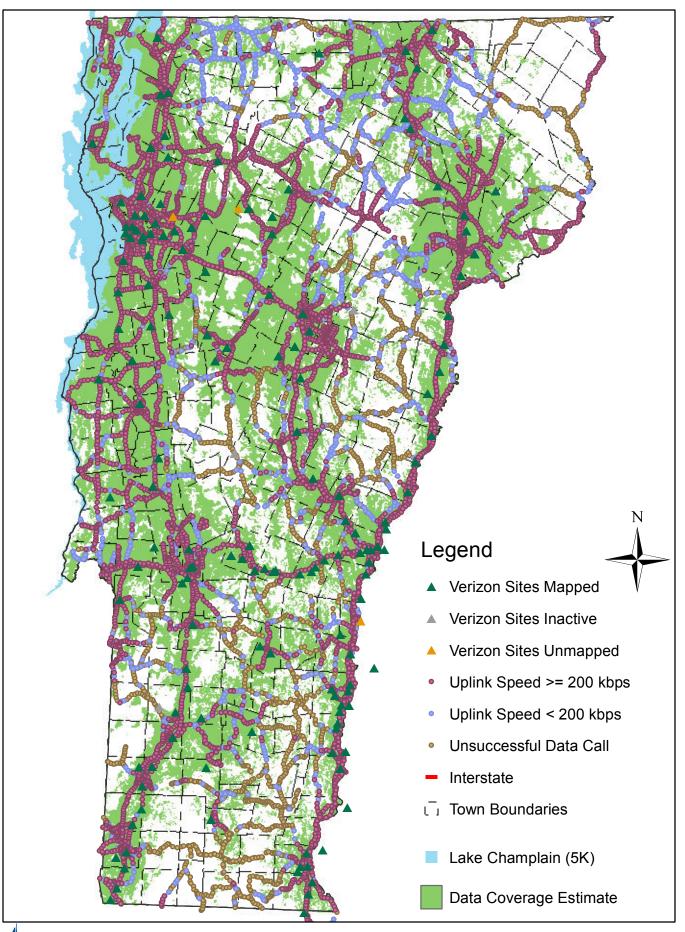
# Verizon Data Coverage and Cell Sites



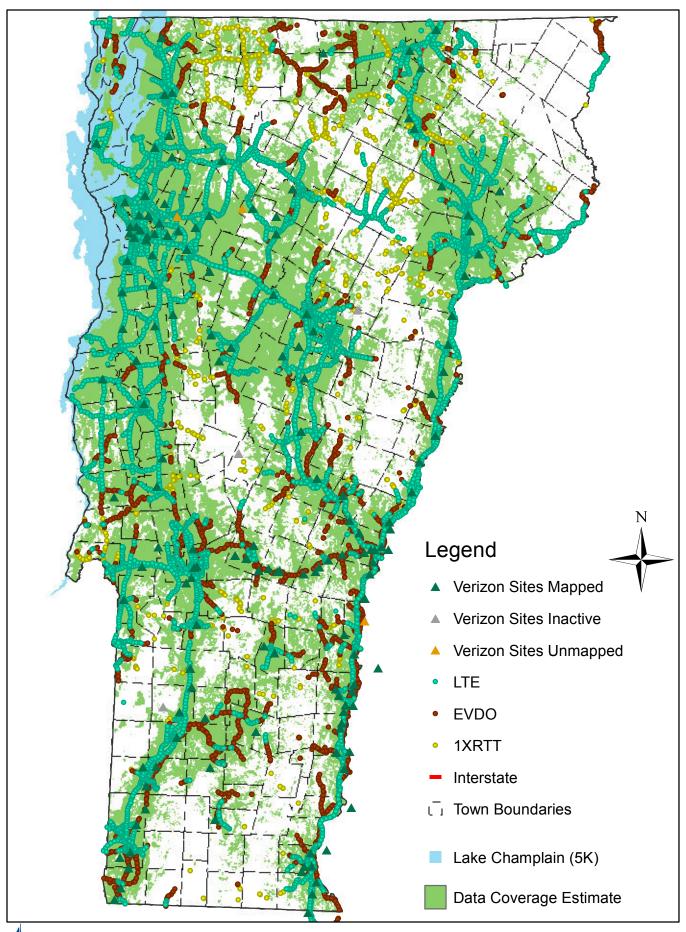
#### Verizon Downlink Data Test Results



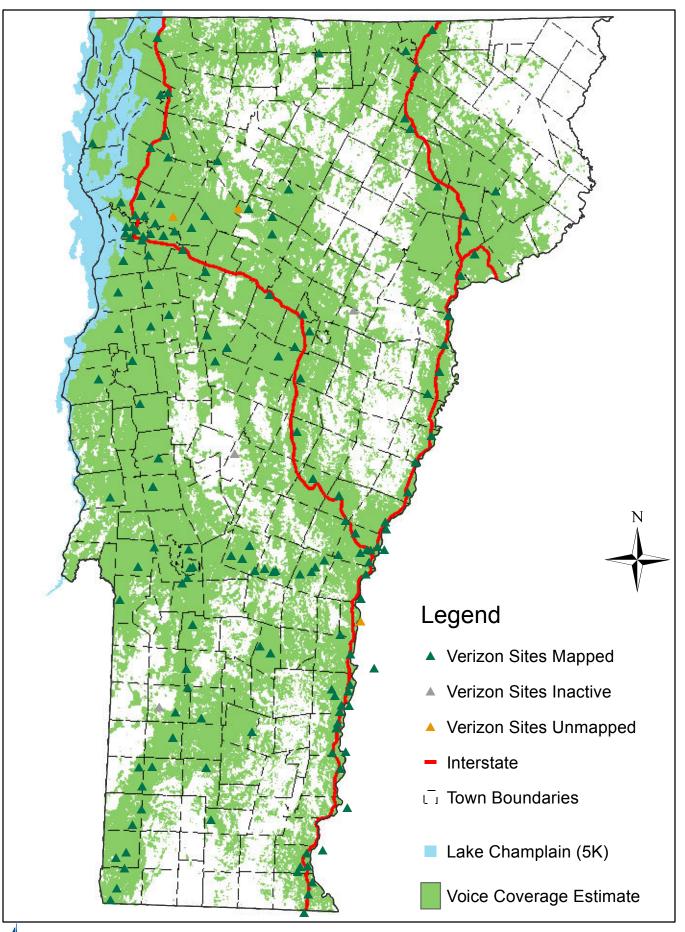
## Verizon Uplink Data Test Results



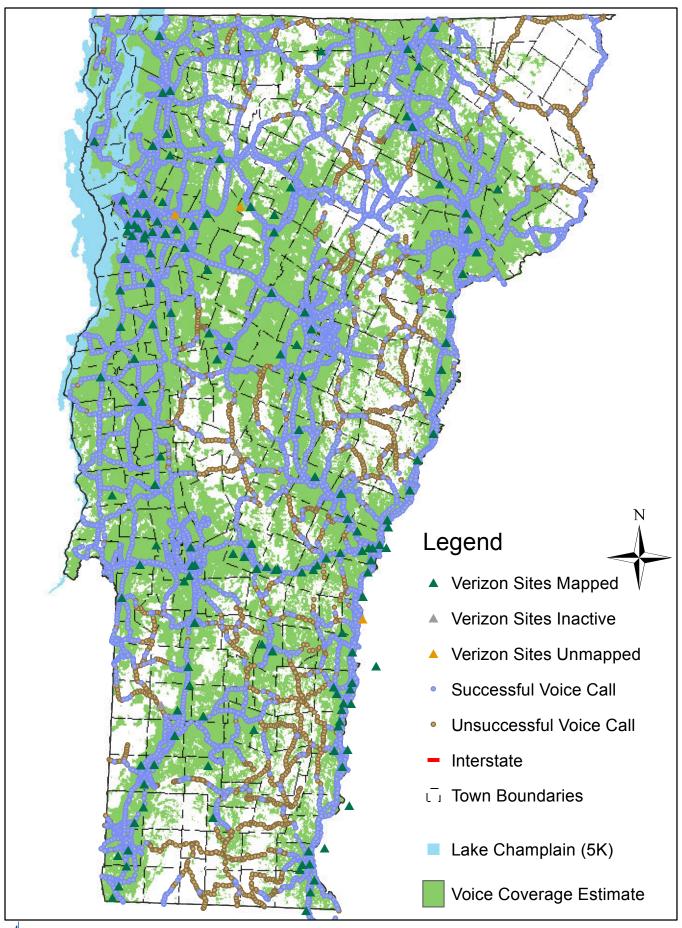
## Verizon Data Call Infrastructure



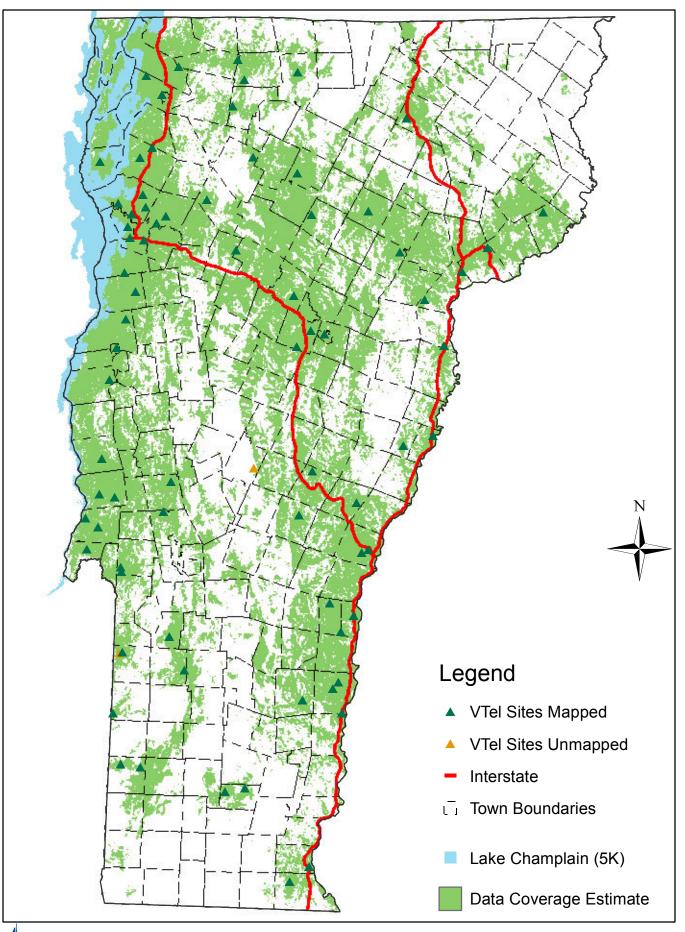
# Verizon Voice Coverage and Cell Sites



#### Verizon Voice Call Results



# VTel Data Coverage and Cell Sites (Being Deployed)



# VTel Voice Coverage and Cell Sites (Being Deployed)

