## Cellco Partnership (Verizon Wireless) Request for Experimental License

Submitted 01/03/13

## In accordance with NTIA Manual Paragraph 8.3.28,

- 1. Individual authorization is for indoor use only, and is required for each device at a specific site. Operation will be conducted indoors on the first floor of Building 1 in the Verizon Innovation Center. The device and site information is provided in the application.
- Applications for frequency assignment should be applied for as an XT station class with a note indicating the device is to be used as an "Experimental RNSS Test Equipment for the purpose of testing GPS receivers" and describing how the device will be used.
   Description of operation is provided below. Verizon Wireless concurs with the XT station class.
- 3. Approved applications for frequency assignment will be entered in the GMF. *Verizon Wireless concurs*.
- 4. The maximum length of the assignment will be two years, with possible renewal. The requested STA is to be effective for two years upon a grant from the FCC.

  Operations can be anytime, 24 hours a day, 7 days a week, as necessary.
- 5. The area of potential interference to GPS reception (e.g., military or contractor facility) has to be under the control of the user. *The site is under Verizon Wireless' control*.
- 6. The maximum equivalent isotropically radiated power (EIRP) must be such that the calculated emissions are no greater than -140 dBm/24 MHz as received by an isotropic antenna at a distance of 100 feet (30 meters) from the building where the test is being conducted. The calculations showing compliance with this requirement must be provided with the application for frequency assignment and should be based on free space propagation with no allowance for additional attenuation (e.g., building attenuation.) A link budget is provided in a separate attachment and meets specified levels.
- 7. GPS users in the area of potential interference to GPS reception must be notified that GPS information may be impacted for periods of time. *GPS users in the area will be notified.*
- 8. The use is limited to activity for the purpose of testing RNSS equipment/systems. *Use will be limited to testing RNSS equipment.*
- 9. A "Stop Buzzer" point of contact for the authorized device must be identified and available at all times during GPS re-radiation operation of the device under any condition. **Stop Buzzer information is provided below.**

## Description

The purpose of this application is for testing and demonstration of new products at the Verizon Innovation Center in Waltham, MA. The operation will be indoors on the 1st floor of Building 1.

As more and more wireless applications are incorporating GPS enabled technology into cell phones and other portable "non-traditional" devices, Verizon Wireless is requiring the use of a GPS signal to test a wide variety of GPS enabled applications in our controlled R&D laboratory setting as well as our Innovation Center. Most of these new and innovative applications are designed to benefit the growing wireless and GPS community as a whole. The availability of the GPS signal will allow us to obtain much better real-time feedback as we develop, test, compare and optimize these non-traditional devices for new and innovative GPS enabled applications.

The Verizon Innovation Center is a collaborative environment where Verizon engineers, technology partners, innovators, entrepreneurs, industry associations, and customers come together to explore new ideas and create innovative solutions. Activities include creating new solutions, testing and exploring potential, letting key audiences help determine feasibility, and continuously pushing the boundaries of wirelessly connecting everything. The Verizon Innovation Center explores wireless connectivity, prototypes and tests products, builds those products, and exhibits them in a real world setting. Having a strong GPS signal is critical to the success of this testing.

## **Stop Buzzer Contact Information**

The equipment will be operated by Verizon Wireless employees.

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