

Question 7, Purpose of Experiment

Itron, Inc. (“Itron”) requests an experimental license pursuant to Part 5 of the FCC’s Rules to authorize Itron to test an electronic meter reading system in the 902-928 MHz band with a new modulation added to the already granted EO9ORRNA, marketed as the RN-EGS, pole top router. This experimental RN-EGS device(s) (primary and backup) would be owned by Itron. The location is in the northern suburbs of Fort Wayne, IN.

Background

Itron manufactures and markets radio-based, automatic meter reading (“AMR”) systems that operate pursuant to Part 15, Part 90 and Part 101 of the FCC’s Rules. Using these products, utility companies have automated their meter reading activities, thereby increasing efficiency and reducing administrative costs. Itron continues to develop new products, improve existing products and its networks to take advantage of new technology. As part of its normal product development processes, Itron would like to test out proposed network technologies in the field to evaluate performance of its networks under “real world” conditions with their different products.

Experiment

This experiment is to add a new modulation and updated firmware to an already certified pole top router under FCC grant EO9ORRNA. It is a centralized router that will be reading for customer billing already approved transceiver devices that are attached to water and/or gas meters. The objective is further verification of Itron network performance in the field to improve a utility’s metering and billing operation with the RN-EGS. If the device needs to be disabled during the experiment Itron will contact the local utility who would disable the device.

Public Interest

Itron herein seeks an experimental radio authorization to support Itron’s testing, development, and demonstration of an AMR network. Itron’s AMR systems apply a high-technology communications methodology to solve persistent problems of utility energy consumption for example emergency shutoffs, leak detection, etc.

Specifically, Itron’s technical evaluation, field testing and demonstrations for which modified authority is requested herein will allow Itron to:

- test the performance of its meter reading and control systems in the 915 MHz band (Itron will test propagation characteristics and develop operational guidelines) with this pole top router;
- test the new technology’s ability to overcome difficulties associated with the varying placement of utility meters and routers;
- test an alternative modulation with this pole top router.

Determining the degree to which utilities in various situations find Itron’s data collection and meter control solutions useful in solving problems associated utility operations including disaster response, will aid Itron in tailoring the system before the final product design and commercial rollout of this router.