DOCKET NO. 475 - Cellco Partnership d/b/a Verizon Wireless }

application for a Certificate of Environmental Compatibility and
Public Need for the construction, maintenance, and operation of a }

telecommunications facility located adjacent to the maintenance
building at the Skungamaug Golf Course, south of Folly Lane, at }

Coventry Tax Assessor's Map 006, Block 0026, Lot 0101, Coventry,
Connecticut.

February 1, 2018

Opinion

On June 28, 2017, Cellco Partnership d/b/a Verizon Wireless (Cellco) applied to the Connecticut Siting Council (Council) for a Certificate of Environmental Compatibility and Public Need (Certificate) for the construction, maintenance, and operation of a 140-foot wireless telecommunications facility located at the Skungamaug Golf Course, south of Folly Lane, in Coventry, Connecticut. The purpose of the proposed facility is to provide reliable wireless service to existing service gaps and increase Cellco's network capacity in the Coventry-Tolland area.

The United States Congress recognized a nationwide need for high quality wireless services in part through the adoption of the Federal Telecommunications Act of 1996 and directed the Federal Communications Commission (FCC) to establish a market structure for system development, and develop technical standards for network operations. Connecticut State law directs the Council to balance the need for development of proposed wireless telecommunications facilities with the need to protect the environment, including public health and safety.

Cellco is currently located on seven existing telecommunications facilities within a six-mile radius of the proposed site. None of these sites provide adequate, continuous 700 MHz LTE service to the northern Coventry and southern Tolland area and there is little 2100 MHz LTE service in the area. Cellco confirmed a need for service in this area through wireless network modeling and a drive test analysis. Existing coverage gaps in the proposed service area total 2.72 square miles for 700 MHz service and 2.97 square miles for 2100 MHz service.

The proposed facility would provide a service area footprint of 10.28 square miles at 700 MHz and 3.83 square miles at 2100 MHz. The site would also provide capacity relief at 700 MHz to Cellco's existing "Coventry North" (Gamma sector) and existing "Tolland" (Gamma sector) facilities.

Cellco proposed a new tower facility after determining there were no existing, suitable towers or sufficiently tall structures available within Cellco's search area. A series of small cells in lieu of a tower would not be feasible due to the limited service area of a small cell deployment and the hilly terrain of the proposed service area. For this area, a macrosite deployment is the most efficient and cost effective way to provide the current wireless service need.

A macrosite tower furthers the Council's charge of promoting tower sharing to avoid the unnecessary proliferation of towers in the state as it would be designed to support the co-location of three additional telecommunication carriers, local and regional emergency service antennas, and a 20-foot extension if there is a future need by other wireless carriers for a higher tower height.

The proposed site is located on an approximately 24.2-acre parcel south of Folly Lane that is part of the Skungamaug Golf Course. The tower site is located in the central portion of the property, south of a golf course maintenance building.

Docket No. 475 Opinion Page 2

The facility would consist of a 140-foot monopole, designed to support four levels of antennas. Cellco would install nine panel antennas and nine remote radio heads at a centerline height of 140 feet above ground level with the overall height of the facility extending to 143 feet above ground level. The tower setback radius is within the boundaries of the subject property.

Cellco would establish a 60-foot by 40-foot equipment compound at the base of the tower and install radio equipment on a steel platform within the fenced compound. Due to existing grades within the site area, the compound would be supported by one to five-foot high retaining walls. Access to the tower site would utilize an existing gravel driveway that extends 520 feet from Folly Lane to the existing maintenance building area.

Underground utilities would be installed to the compound along the edge of the existing gravel drive from an existing Eversource utility pole on Folly Lane. In the event of a loss of commercial power, Cellco would rely on an emergency power battery unit and a 25-kilowatt propane-fueled generator that could run for four to five days before re-fueling is required.

The tower site is located within an exterior storage area. One oak tree would be removed to develop the site. The nearest wetland to the proposed site is an intermittent stream approximately 40 feet southeast of the compound area. The stream extends in a north-south direction along the edge of a fairway. The stream was most likely a former wetland seep that has been significantly altered to function as a linear drainage ditch for the golf course. To protect this resource the proposed project would be constructed in compliance with the 2002 Connecticut Guidelines for Soil Erosion and Sedimentation Control.

No records of species listed on the Department of Energy and Environmental Protection's (DEEP) Natural Diversity Database occur in the area.

Existing soils in the compound area contain low levels of petroleum contaminants, below regulatory action requirements. Soils that are excavated from this area would be removed from the site and disposed of in accordance with regulatory criteria. The compound area contains Hinckley soils and a pile of logs that potentially could provide cover for hognose snakes, if they exist in the area. Although no NDDB records of the hognose snake occur in this area, during the winter months when snakes are dormant, Cellco would be willing to remove the wood pile.

The proposed facility is not located near a National Audubon Society designated Important Bird Area and the design of the proposed facility would comply with United States Fish and Wildlife Service guidelines for minimizing the potential impact of telecommunications towers to bird species.

No historic properties would be affected by the proposed facility. The site development area does not possess the potential for archeological deposits.

The tower would be visible year-round from approximately 77 acres within a two-mile radius of the site, mostly from the open areas of the Skungamaug golf course and immediate surrounding properties. Seasonal, leaf-off views would occur from approximately 190 acres within a two-mile radius of the site, mostly limited to an area within 0.6 mile of the site. There are no state or locally-designated scenic roads located within two miles of the site.

According to a methodology prescribed by the FCC Office of Engineering and Technology Bulletin No. 65E, Edition 97-01 (August 1997), the radio frequency power density levels of Cellco's antennas would be 33.7 percent of the FCC's General Public/Uncontrolled Maximum Permissible Exposure, as measured at the base of the tower. This is conservatively based on all antennas of a given sector pointing down to the ground and emitting maximum power. This percentage is well below federal standards established for the frequencies

Docket No. 475 Opinion Page 3

used by wireless companies. If federal standards change, the Council will require that the facility be brought into compliance with such standards. The Council will require that the power densities be recalculated in the event other carriers add antennas to the tower. The Telecommunications Act of 1996 prohibits any state or local agency from regulating telecommunications towers on the basis of the environmental effects of radio frequency emissions to the extent that such towers and equipment comply with FCC's regulations concerning such emissions. Regarding potential harm to wildlife from radio emission; this, like the matter of potential hazard to human health, is a matter of federal jurisdiction. The Council's role is to ensure that the tower meets federal permissible exposure limits.

Based on the record in this proceeding, the Council finds that the effects associated with the construction, operation, and maintenance of a monopole telecommunications facility at the proposed site, including effects on the natural environment; ecological integrity and balance; public health and safety; scenic, historic, and recreational values; forests and parks; air and water purity; and fish and wildlife are not disproportionate either alone or cumulatively with other effects when compared to need, are not in conflict with policies of the State concerning such effects, and are not sufficient reason to deny this application. Therefore, the Council will issue a Certificate to Cellco for the construction, maintenance, and operation of a 140-foot monopole telecommunications facility located at the Skungamaug Golf Course, south of Folly Lane, in Coventry, Connecticut.