

ATTACHMENT A-STAFF ANALYSIS

STAFF PERSON: Rebecca Ragsdale, Planning Manager
BOARD OF SUPERVISORS: December 15, 2021
PROJECT: SE202100038 Union Run Wireless Facility
Special Exceptions
PROPERTY OWNER: Albemarle Edge Hill Farm LLC
APPLICANT: Crown Castle (AT&T) c/o Edward Donohue
LOCATION: 2928 Richmond Road
TAX MAP/PARCEL: 07900-00-00-01000

PROPOSAL:

This proposal includes several requests under the personal wireless facility regulations (County Code § 18-5.1.40), two of which require special exceptions. (See Attachments B-D)

1. Request to reduce the required 70-foot setback of the monopole by modifying County Code § 18-5.1.40(b)(15). The proposed monopole would not meet the setback of 70 feet that is required based on the height of the monopole. A special exception is requested to reduce the setbacks to:
 - a. 12 feet to the northern property line with the VDOT right of way for Interstate 64;
 - b. 37 feet, 6 inches to the eastern property line; and
 - c. 46 feet, 7 inches to the southern property line.
2. Request to add a non-flush-mounted antenna array by modifying County Code § 18-5.1.40(b)(2)(c). A special exception is requested to allow an antenna array that will project no more than five feet, eight inches from the facility. County Code § 18-5.1.40(b)(2)(c) requires that the nearest point of an antenna be no more than 12 inches from its facility, structure, or building, and that the farthest point of the back of an antenna be no more than 18 inches from its facility, structure, or building.

The applicant has indicated that these requests are associated with the FirstNet project, which is the first nationwide wireless broadband network dedicated to public safety.

ABUTTING OWNER NOTICE:

County Code § 18-5.1.40(e)(4)(a) requires that notice be sent to each abutting property owner for special exception requests associated with a wireless facility. Abutting owner notice was mailed on October 27, 2021. Staff has not received any concerns or objections to date.

CHARACTER OF THE AREA:

This site is zoned Rural Areas (RA) and is located between Interstate-64 and Richmond Road (Route 250) at its intersection with Louisa Road (Route 22). It is located on the southern end of Edge Hill Farm, a 684-acre parcel, the majority of which is located across I-64 to the north. The existing entrance to the site is from Richmond Rd. The monopole is located in the northeastern corner of the site, adjacent to I-64, within a cluster of trees, and is approximately 10' below the existing treeline. It is also located close to the eastern property line, bordering a religious assembly use. Properties to the south (across Richmond Road/Louisa Road) are zoned either RA (including Luckstone quarry) or C1 Commercial (including Shadwell Market and Shadwell Antiquities). (Attachment E)

Properties located north of the site are located in the Southwest Mountains Rural Historic District, including Edge Hill, which is individually designated as an historic resource as well. The portion of the property across from I-64 is not in the historic district. I-64, Richmond Road, and Louisa Road are all designated as Entrance Corridors. Louisa Road is also designated as a Scenic Byway. That Scenic Byway designation continues east along Richmond Road and then along North Milton.

PLANNING AND ZONING HISTORY:

SP200000018- A special use permit for a 50-foot monopole was approved on August 1, 2000.

VA200000015- A variance was granted on July 18, 2000 to allow a reduction in setback from I-64 to allow the construction of the proposed 50-foot-tall monopole.

A Personal Wireless Service Facility (PWSF) policy was adopted in 2000, and updated ordinance provisions followed in 2004, which resulted in County Code § 18-5.1.40. Prior to 2004, PWSF's in Albemarle County were reviewed on a case-by-case basis as special use permits. They were typically subject to multiple conditions. The 2004 ordinance amendments incorporated standards that addressed height, antenna size and projection, access roads, and setbacks. Language was also added to address administration of prior special use permits:

Administration of special use permits for facilities approved prior to October 13, 2004; conditions. If any condition of a special use permit for an eligible support structure approved prior to October 13, 2004 is more restrictive than a corresponding standard in this section, the corresponding standard in this section shall apply. If any condition of the special use permit is less restrictive than a corresponding standard in this section and the applicant establishes that vested rights have attached to the approved facility, the special use permit conditions shall apply.

This ordinance applies the less restrictive of either the special use permit conditions or the current corresponding standard found in County Code § 18-5.1.40. This provision allows the applicant to make the requests subject to this special exception application and not go through a special use permit amendment process.

COMPREHENSIVE PLAN

The following Comprehensive Plan objective and strategies apply to this application:

Community Facilities-Objective 10: Support provision of private electric, telephone, natural gas, wireless, and fiber optic service when its provision is in keeping with other aspects of the Comprehensive Plan.

Strategy 10a: Continue to ensure the adequate provision of electricity, telephone, fiber optics, and natural gas services to support existing and anticipated development in the County through coordination with utility companies.

Strategy 10d: Locate utilities to minimize impacts on the visual and natural environment.

Strategy 10e: Continue to ensure that personal wireless facilities are provided in accordance with the County's personal wireless service policy.

Strategy 10f: Develop a broadband policy to reflect the County's desire to have internet service speeds appropriate for educational, business, and residential purposes in all parts of the County.

The County's Personal Wireless Facility Policy allows for the location of personal wireless service facilities throughout the County. The Policy encourages the construction of facilities that have limited visual impact on the community.

- Visibility is the primary focus in the review of personal wireless service facilities. Facilities with limited visibility are encouraged.
- Personal wireless service facilities should not be located on ridgetops or along the ridgeline and they should be provided with an adequate backdrop so that they are not skylined.
- Personal wireless service facilities should not adversely impact resources identified in the Open Space Plan or designated as Avoidance Areas.
- Personal wireless service facilities should utilize existing structures where possible.
- Personal wireless service facilities, if appropriately sited and designed, may be appropriate in any zoning district.

- Ground based equipment should be limited in size and be designed in keeping with the character of the area.
- Antennas should be mounted close to the supporting structure and be designed to minimize visibility.
- The personal wireless service facilities policy is primarily intended to address facilities providing personal wireless service. Other types of wireless facilities are encouraged to adhere to this policy to the extent possible.

ANALYSIS OF REQUESTS:

Requests for special exceptions must be reviewed under the criteria established in County Code § 18-33.9, taking into consideration the factors, standards, criteria and findings for each request; however, no specific finding is required in support of a decision. The Board may approve, approve with conditions, deny, or defer the special exception requests.

Special Exceptions

1. **Setbacks**- The applicant has requested a special exception to reduce the required setbacks in County Code § 18-5.1.40(b)(15). The proposed monopole would not meet the setback of 70 feet that is required based on the height of the monopole. A special exception is requested to reduce the setbacks to:
 - a. 12 feet from the northern property line with the VDOT right of way for Interstate 64;
 - b. 37 feet, 6 inches from the eastern property line; and
 - c. 46 feet, 7 inches from the southern property line.

Sheet 2 of the proposed plans best illustrate the fall zone. (Attachment C)

County Code § 5.1.40(c)(3) states:

3. *Setbacks.* Notwithstanding section 4.10.3.1(b), the agent may authorize a facility to be located closer in distance than the height of the tower or other mounting structure to any lot line if the applicant obtains an easement or other recordable document showing agreement between the lot owners, acceptable to the county attorney as to addressing development on the part of the abutting parcel sharing the common lot line that is within the monopole or tower's fall zone. If the right-of-way for a public street is within the fall zone, the Virginia Department of Transportation shall be included in the staff review, in lieu of recording an easement or other document.

The applicant has provided an analysis that the replacement monopole would have a breakpoint at 52.8' – meaning that the actual fall zone for the monopole would be 16.2', which is well within the 37'6"/ 46'7" from the property lines of the neighboring Charlottesville First Church of Nazarene. In addition, the applicant has asked the adjacent Church for a fall zone easement, and is awaiting a response.

The affected property to the east is used for religious assembly and a daycare. Special use permits were approved in 2007 to allow those uses. As part of the special use permit approval, a condition of approval requires that a 20-foot undisturbed buffer be maintained along the property line shared with the monopole site. No portion of the site is developed within the areas that would be within the fall-zone easement beyond the required 20-foot buffer. Although the applicant has not provided any communication from the property owner, staff believes, given the circumstances, a reduction in the fall-zone easement requirements would not adversely affect the abutting property owner to the east. The applicant has also indicated that VDOT has no objection to the reduction in setback to the I-64 right of way. The proposed monopole is located over 120 feet from the edge of the I-64 shoulder. **Therefore, staff supports the setbacks special exception request.**

2. **Antenna projection** -The applicant is also proposing to add a non-flush-mounted antenna array, and is requesting a special exception to allow an antenna array that will project no more than five feet, eight inches from the facility.

County Code § 18-5.1.40(b)(2)(c) provides:

(c) *Projection.* No antenna shall project from the facility, structure or building beyond the minimum required by the mounting equipment, and in no case shall the closest point of the back of the antenna be more than 12 inches from the facility, structure, or building, and in no case shall the farthest point of the back of the antenna be more than 18 inches from the facility, structure, or building; and

This projection standard is often referred to as “flush mounting” and is a concealment element to mitigate visibility of the treetop monopole.

The applicant indicated that increased projection from the monopole is needed because the frequency band assigned to FirstNet by the Federal Communications Commission (Band 14) and the frequency bands of the proposed relocated AT&T consumer network would interfere with each other if the antennae are not set farther apart. ***Detailed technical explanations have not been provided by the applicant to justify the stand-off distance and why alternatives are not available.***

The applicant has provided photos from a balloon test conducted in July 2021, along with photo simulations of the proposed facility and increased antenna projection. The photos were taken from fifteen surrounding locations. The photos indicate that the visibility is mitigated from most of those locations, but that the proposed monopole would be visible above the existing tree line from some vantage points. The proposed monopole would be most visible from Location 3 at Shadwell on Richmond Road, with no tree backdrop from that vantage point to mitigate visibility. The proposed increased antenna projection of up to five feet, eight inches would increase the visibility of the proposed pole and antennas from the Entrance Corridors. Standard projection maximums (no more than 12" and 18" for closest and farthest points of the back of an antenna from the facility) would minimize visibility. While increased coverage and capacity, including for public safety, have been cited as reasons for the request, the design of the facility is inconsistent with the wireless ordinance design guidelines. Therefore, ***staff recommends denial of the antenna projection special exception request.***

Administrative Requests

If the Board grants a special exception to increase the setback, staff will be able to process administratively two additional related requests:

1. Request to replace an existing treetop wood monopole with a metal monopole, in accordance with County Code § 18-5.1.40(b)(15).
2. Request to increase the height of the monopole from 50 feet to 70 feet based on the height of tree growth, in accordance with County Code § 18-5.1.40(h).

SUMMARY:

1. Request to reduce the setbacks by modifying County Code § 18-5.1.40(b)(15). The proposed monopole would not meet the setback of 70 feet that is required based on the height of the monopole. A special exception is requested to reduce the setbacks to:
 - a. 12 feet from the northern property line with the VDOT right of way for Interstate 64,
 - b. 37 feet, 6 inches from the eastern property line, and
 - c. 46 feet, 7 inches from the southern property line.

Staff recommends approval, as no adverse impacts to the affected abutting property were identified.

2. Request to add a non-flush-mounted antenna array by modifying County Code § 18-5.1.40(b)(2)(c). The applicant has requested a special exception to allow an antenna array that would project no more than five feet, eight inches from the facility. County Code § 18-5.1.40(b)(2)(c) requires that the nearest point of an antenna be no more than 12 inches from its facility, structure, or building, and that the farthest point of the back of

an antenna be no more than 18 inches from its facility, structure, or building. ***Staff does not recommend approval, as the requested antenna project would increase visibility of the facility from an adjacent Entrance Corridor.***

RECOMMENDATIONS:

Staff recommends:

(A) Approval of a special exception to reduce the required setbacks and fall zone for the replacement monopole, under the following conditions:

1. The height of the monopole must not exceed the lesser of (a) 70 feet or (b) 10 feet taller than the tallest tree within 25 feet of the monopole.
2. The monopole must be located in accord with the plans titled "Crown Castle Site Name: Union Run," prepared by Christopher D. Morin, last revised October 19, 2021.

(B) Denial of the request to increase the antenna projection.

If the Board chooses instead to approve the antenna projection special exception, staff recommends the following condition of approval:

1. No antenna authorized by this special exception may project more than five feet, eight inches (5'8") from the face of the monopole to the back of the antenna.

ATTACHMENTS:

- A. Staff Analysis
- B. Applicant's Request
- C. Proposed Plans
- D. Tree Survey and Tree Conservation Plan
- E. Location Map
- F. Proposed Resolution to Approve Special Exception – Setbacks
- G. Proposed Resolution to Deny Special Exception – Antenna Projection