

Small Cell Wireless Code Update

Article 3-100. (B)(1)(j) Development Related Permits [Add Small Cell Wireless to list]

Small Cell Wireless Facility Supplemental Site Application – administrative review for the siting of Small Cell Wireless Facilities.

Article 3-202.15 (renumber section) Addition of Application Submittal Requirements for Small Cell Wireless Facilities

Small Cell Wireless Facility Supplemental Site Application

- a. No small cell facility installation shall be constructed, erected, modified, operated or maintained on County property, including the public right-of way, without a Master License Agreement in effect between applicant and the County.
- b. Application Form(s), Project Description and Fee
- c. Vicinity Map
- d. Site Plan with GIS coordinates (X,Y) for the proposed tower
- e. Utility Report and Map
- f. Utility Construction Permit
- g. Engineering Report
- h. Building and Electric Permits
- i. Written Consent from Utilities and non-county ROW owners (e.g. CDOT, Xcel)
- j. Written Consent from fiber optics owners if applicable
- k. Master License Agreement
- l. Referral Packet
- m. Small Cell Wireless Facility Submittal Checklist
- n. Affidavit Demonstrating Compliance with the Small Cell Wireless Design Requirements and Guidelines
- o. Carriers may submit up to 20 poles per supplemental site application; however, subsections (c)- (k) will be required for each tower location.

Article 4-514 Revised Telecommunication Facility section to incorporate the Small Cell Wireless Facilities with the current Telecommunication Facilities.

~~0. Telecommunications Facility, utilizing an existing structure and meeting the height requirements of the district in which the facility is located.–~~

~~1. Definition: A facility used for the transmission or reception of electromagnetic or electro-optic information, which is placed on an existing structure, may or may not require accessory structures, and meets the height requirements of the district in which it is located. This use does not include any other use listed in this Code, devices not used for communication, or radio frequency machines which have an effective radiated power of 100 watts or less.~~

~~2. Districts Permitted: By right in all districts~~

~~3. Parking Requirements: None~~

~~4. Loading Requirements: None~~

~~5. Additional Provisions:~~

~~a. This use is not required to be located on a building lot, or comply with the minimum lot size requirement for the district in which it is located.~~

~~b. A separate accessory equipment building is allowed as long as it is no more than 10% of the gross floor area of all existing permitted structures on the parcel or 450 square feet, whichever is less.~~

~~c. Site Plan Review is required for this use.~~

~~P. Telecommunications Facility, requiring a new structure or accessory structure exceeding the height limitation of the district in which the facility is located, or exceeding the accessory building size limitations set forth in subsection (O) immediately above.~~

~~1. Definition: A facility used for the transmission or reception of electromagnetic or electro-optic information, which is placed on a new structure, requires accessory structures, or exceeds the height requirements of the district in which it is located. This use does not include any other use listed in this Code, devices not used for communication, or radio frequency machines which have an effective radiated power of 100 watts or less.~~

~~2. Districts Permitted: By Special Review in all districts~~

~~3. Parking Requirements: None~~

~~4. Loading Requirements: None~~

~~5. Additional Provisions:~~

~~—— a. In addition to the general requirements for approval of a special use permit, telecommunication facilities shall also be subject to the requirements outlined in Section 4-600 of this Code.~~

~~—— b. This use is not required to be located on a building lot, or comply with the minimum lot size requirement for the district in which it is located.~~

O. Telecommunications Facility

1. Definition: A facility used to provide personal wireless services as defined at 47 U.S.C. Section 332 (c)(7)(C); or wireless information services provided to the public or to such classes of users as to be effectively available directly to the public via licensed or unlicensed frequencies; or Smart City, Internet of Things, wireless utility monitoring and control services. A Telecommunication Facility does not include a facility entirely enclosed within a permitted building where the installation does not require a modification of the exterior of the building; nor does it include a device attached to a building, used for serving that building only and that is otherwise permitted under other provisions of the Code. A Telecommunication Facility includes an Antenna or Antennas, including without limitation, direction, omni-directional and parabolic antennas, support equipment, Alternative Tower Structures, and Towers. This use does not include any other use listed in this Code, devices not used for communication, or radio frequency machines which have an effective radiated power of 100 watts or less.

a. Small Cell Wireless Facility - is defined as a facility that is mounted on structures 50 feet or less in height including their antennas, and where each antenna is located inside an enclosure no more than three cubic feet in volume or, in the case of an antenna that has exposed elements, the antenna and all of its exposed elements could fit within an imaginary enclosure of no more than three cubic feet; and primary equipment enclosures are no larger than seventeen cubic feet in volume. The following associated equipment may be located outside of the primary equipment enclosure and, if so located, is not included in the calculation of equipment volume: electric meter, concealment, telecommunications demarcation box, ground-based enclosure, back-up power systems, grounding equipment, power transfer switch and cut-off switch and meets the height requirements of the district in which it is located.

b. Macro-Cell Facility is defined as a facility used for the transmission or reception of electromagnetic or electro optic information for the purposes of providing coverage over large areas, greater than 50 feet in height, and primary equipment enclosures are greater than seventeen cubic feet in volume.

c. Eligible Facility Request is defined as any request for modification of an existing tower or base station that does not substantially change the physical dimensions of such

tower or base station, involving: collocation of new transmission equipment; removal of transmission equipment; or replacement of transmission equipment.

2. Districts Permitted:

- a. For Small Cell Wireless and Eligible Facility requests, an Administrative Review as set forth in Article 4-700 and the County Engineer or Land Use Director.
- b. For Macro-cell Facility placed on an existing structure that may require accessory structures and meets the height requirements of the district in which it is located, by Site Plan Review, subject to the requirements outlined in Section 4-800 through 4-806 of this Code.
- c. For Macro-cell facility placed on a new structure or that exceeds the height requirements for the district in which it is located, by Special Review. In addition to the general requirements for Special Review, telecommunication facilities shall also be subject to the requirements outlined in Section 4-600 and Section 4-602.D of this Code.

3. Parking Requirements: None

4. Loading Requirements: None

5. Additional Provisions:

- a. This use is not required to be located on a Building Lot or comply with the minimum lot size requirement for the district in which it is located.
- b. All Telecommunication facilities shall comply with federal standards for radio frequency standards.
- c. Applicant must comply with the Boulder County Land Use Department Small Cell Wireless Facility Design Requirements and Guidelines publication available at the Land Use Department. *Staff will monitor issues, public comments and concerns with the Design Requirements and Guideline on a yearly basis and if necessary will amend through an adoption process by the Board of County Commissioners.
- d. Small cell facilities must meet the height requirements of the district in which it is located. Upon petition by the applicant, the Land Use Director may allow up to an additional 8 feet above the height limit of the zoning district based upon consideration of the context of the location, technological feasibility, density of other equipment in the area, and visual impacts.
- e. Any small cell facility in the public right of way that is not used for a period of six months or more shall be deemed to be abandoned. The small cell facility owner or applicant shall remove a small cell wireless facility that is considered abandoned and if they fail to remove the abandoned facility the County may remove the small cell facility and charge the costs to the small cell facility owner.
- f. For Macro-cell facilities a separate accessory equipment building is allowed as long as it is no more than 10% of the gross floor area of all existing permitted structures on the parcel or 450 square feet, whichever is less.

[Article 4-700 Administrative Reviews](#) New review process in Article 4 for Administrative Reviews.

[4-701 Purpose](#)

- A. Administrative review is a review procedure for certain types of proposed development that are deemed in advance to not cause significant conflict with the Boulder County Comprehensive Plan and ensure compliance with the development standards of the County.

[4-702 Applicability and Scope of the Administrative Review Process for Development](#)

- A Administrative Review shall be required for the following:

1. Any Small Cell Wireless Telecommunications Facility
2. Eligible Facilities Request

B Criteria

1. Meets additional provisions of Use definition
2. Administrative Reviews of Small Cell Wireless Telecommunication Facility are subject to the County's Design Requirements and Guidelines for Small Cell Wireless Facility.

Small Cell Wireless Facility Design Requirements and Guidelines – [Handout for design guidelines \(not within Code\)](#)

1. Applicants shall work with the County and relevant third parties to locate small cell wireless facilities based on the following order of preference for location and deployment:
 - a. Small cell facilities shall be collocated and attached to existing and previously approved small cell facilities.
 - b. Small cell facilities shall be attached to or replace available existing structure previously approved in the County Right of Way (ROW).
 - c. New freestanding small cell facility poles shall be built in a manner that allows for collocation.
2. Any new pole with an antenna must be architecturally consistent with the surrounding area by:
 - a. Utilizing one of the following configurations:
 - i. Replacing existing permitted facilities (including without limitation, traffic signs, traffic signals, light poles or light standards) so that the presence of the small cell facility is not readily apparent;
 - ii. Integrating the equipment in an architectural feature of an existing structure; Integrating or attaching equipment to an outdoor fixture such as a traffic signal, light standard, utility pole or flagpole;
 - AND
 - b. Using a design which mimics or is consistent with the nearby natural or architectural features; and
 - c. Using a design that is consistent with the size and shape of the pole-mounted equipment installed by communications companies on utility poles within three hundred feet of the facility.
3. All small cell equipment and required structures, including, but not limited to, antennas and meters, must be housed internally within in the pole or alternative tower structure hosting the small cell facility. This requirement may be waived by the Director of the Land Use Department, in whole or in part, where it is technically infeasible to internally house the requisite components.
4. Ancillary equipment that is not integrated into the pole such as cabinets, or boxes shall be located below grade. This requirement may be waived by the Director of the Land Use Department, in whole or in part, where it is technically infeasible to house such structures below grade.
5. The siting map must clearly delineate the floodplain and floodway boundaries.
6. Small cell wireless facilities shall be separated from all other wireless communication facilities and small cell facilities within the right-of-way by a distance of at least six hundred feet, unless the facility replaces an existing traffic signal, street light pole or similar vertical infrastructure. Freestanding small cell poles shall be staggered on alternating sides of the street where feasible. The Land Use Director may exempt an applicant from this requirement if: the applicant demonstrates through technical network documentation that the minimum separation requirement cannot be satisfied for technical reasons, or the Land Use Director determines, when considering the surrounding topography, the nature of adjacent uses and nearby properties and the height of the existing structures in the vicinity, that the placement of a small cell wireless facility at a distance less than 600 feet from another small cell wireless facility in the public right of way will meet the intent of reducing visibility and visual clutter of the small cell wireless facilities.
7. Any stand-alone small cell wireless facility shall not block windows or building entrances.
8. Small cell wireless facilities and equipment shall not be installed within the dripline of any tree.
9. All poles and related appurtenances shall be located to ensure proper sight-triangles.
10. All poles and related appurtenances shall be located outside the specified clear zone for the facility on which it is located as specified in the Boulder County Multi Modal Transportation Standards.

11. Poles and related appurtenances shall not interfere with traffic operations or with approved Traffic Control Devices.
12. Poles and related facilities shall not encroach into or interfere with pedestrian ways such as sidewalks, trails, or transit stops or facilities.
13. Proposed locations of poles and related appurtenances shall be reviewed relative to future county capital improvements.
14. Small cell wireless facilities shall not be allowed within historic districts or land owned or maintained by the Boulder County Parks and Open Space, City of Boulder Open Space and Mountain Parks properties, or any other open space properties at the request of the jurisdiction who owns the property, including conservation easements. The Land Use Director may waive this prohibition if he or she determines that it is appropriate to do so based on consideration of technological feasibility, environmental and visual impacts, and any other relevant considerations based on the Boulder County Comprehensive Plan.
15. Small cell wireless facilities shall be located to ensure minimal impacts to view protection corridors.
16. Small cell wireless facilities must not conflict with the Boulder County Comprehensive Plan goals, policies, and mapped features.
17. All small cell wireless facilities shall meet the current standards and regulations of the FAA, the FCC and any other agency of the federal governments with the authority to regulate small cell facilities. If the standards and regulations are changed, then the owners of the small cell facilities shall bring such facility into compliance with such revised standards and regulations within the time period mandated by the controlling federal agency.