

**CITY OF SAMMAMISH  
WASHINGTON  
Ordinance No. O2005-181**

---

**AN ORDINANCE OF THE CITY OF SAMMAMISH, WASHINGTON, PERTAINING TO LAND USE AND ZONING, REPEALING CHAPTER 21A.55 OF THE SAMMAMISH MUNICIPAL CODE, “DEVELOPMENT STANDARDS-COMMUNICATION FACILITIES,” AND ADOPTING A NEW CHAPTER 21A.55-ENTITLED “WIRELESS COMMUNICATION FACILITIES”**

**WHEREAS**, the City Council of the City of Sammamish finds that there is a need for revised regulations related to wireless communication facilities to assure adequate wireless services within the City, to minimize the number of new support structures and associated aesthetic impacts and to guide the location and appearance of necessary infrastructure; and

**WHEREAS**, the proposed amendments are consistent with, and serve to implement, the City’s adopted Comprehensive Plan; and

**WHEREAS**, the proposed amendments clarify the existing code and implement the recommendations of the associated wireless facilities master plan; and

**WHEREAS**, an Environmental Checklist for a non-project action has been prepared under the State Environmental Policy Act (RCW Chapter 43.21.C), pursuant to Washington Administrative Code Chapter 197-11, and City of Sammamish Municipal Code Chapter 20.15; and a Notice of Adoption and a Determination of Non-Significance (DNS) was issued on May 13, 2005 with the comment period ending on May 30, 2005; and

**WHEREAS**, the Planning Commission held public meetings related to the amendments on October 12, 2004 and March 24, 2005; and two sessions of a public hearing commenced on April 21, 2005 and continued to May 19, 2005; and

**WHEREAS**, the Planning Commission has recommended approval of the proposed amendments to the City Council; and

**WHEREAS**, the City Council held a first reading of the ordinance proposing adoption of the amendments and a public hearing on the proposed amendments on June 7, 2005; and a second reading of the ordinance on June 21, 2005.

**WHEREAS**, the City Council finds that the amendments will allow for the appropriate development of wireless facilities within the City and are in the public interest;

**NOW, THEREFORE, THE CITY COUNCIL OF THE CITY OF SAMMAMISH, WASHINGTON, DO ORDAIN AS FOLLOWS:**

Section 1. Chapter 21A.55 of the Sammamish Municipal Code is hereby repealed and a new Chapter 21A.55 is adopted as set forth in Attachment A to this ordinance.

Section 2. Severability. Should any section, paragraph, sentence, clause or phrase of this Ordinance, or its application to any person or circumstance, be declared unconstitutional or otherwise invalid for any reason, or should any portion of this Ordinance be pre-empted by state or federal law or regulation, such decision or pre-emption shall not affect the validity of the remaining portions of this Ordinance or its application to other persons or circumstances.

Section 3. Effective Date. This Ordinance shall be published in the official newspaper of the City, and shall take effect and be in full force five (5) days after the date of publication.

**ADOPTED BY THE CITY COUNCIL AT A REGULAR MEETING THEREOF  
ON THE 21<sup>st</sup> DAY OF JUNE 2005**

CITY OF SAMMAMISH

\_\_\_\_\_  
Donald J. Gerend, Mayor

ATTEST/AUTHENTICATED:

\_\_\_\_\_  
Melonie Anderson, City Clerk

Approved as to form:

\_\_\_\_\_  
Bruce L. Disend, City Attorney

Filed with the City Clerk: June 9, 2005  
Public Hearing: June 6, 2005  
First Reading: June 6, 2005  
Passed by the City Council: June 21, 2005  
Date of Publication: June 25, 2005  
Effective Date: June 30, 2005

## **Definitions.**

### **21A.15.XXX Ancillary Structure.**

“Ancillary structure” means, for the purposes of this ordinance, any form of development associated with a wireless communications facility, including but not limited to: foundations, concrete slabs on grade, guy anchors, generators, and feed lines; however, specifically excluding base stations.

### **21A.15.XXX Antenna.**

“Antenna” means any apparatus designed for the transmitting and/or receiving of electromagnetic waves, including but not limited to: telephonic, radio or television communications. Types of antenna elements include, but are not limited to: omni-directional (whip) antennas, sectorized (panel) antennas, multi or single bay (FM & TV), yagi, or parabolic (dish) antennas.

### **21A.15.XXX Antenna Array.**

“Antenna array” means a single or group of antenna elements and associated mounting hardware, feed lines, or other appurtenances which share a common attachment device such as a mounting frame or mounting support structure for the sole purpose of transmitting or receiving electromagnetic waves.

### **21A.15.XXX Antenna Support Structure.**

“Antenna support structure” means a vertical projection composed of metal or other material with or without a foundation that is designed for the express purpose of accommodating antennas at a desired height. Antenna support structures do not include any device used to attach antennas to an existing building, unless the device extends above the highest point of the building by more than twenty (20) feet. Types of support structures include the following:

- (1) Guyed antenna support structure (A style of antenna support structure consisting of a single truss assembly composed of sections with bracing incorporated. The sections are attached to each other, and the assembly is attached to a foundation and supported by a series of wires that are connected to anchors placed in the ground or on a building.)
- (2) Lattice antenna support structure (A tapered style of antenna support structure that consists of vertical and horizontal supports with multiple legs and cross-bracing and metal crossed strips or bars to support antenna.)
- (3) Monopole antenna support structure (A style of freestanding antenna support structure consisting of a single shaft usually composed of two or more hollow sections that are in turn attached to a foundation. This type of antenna support structure is designed to support itself without the use of guy wires or other stabilization devices. These facilities are mounted to a foundation that rests on or in the ground or on a building’s roof.)

### **21A.15.XXX Attached WCF**

“Attached WCF” means an antenna or antenna array, including RF-to-lightwave converter equipment, that is secured to an existing building, structure (not including an Antenna Support Structure), utility pole, cross country electrical distribution tower, with or without any accompanying new pole or device which attaches it to the building or structure, together with feed lines, and base station, which may be located either on the roof, inside or outside of the building or structure.

### **21A.15.XXX Base Station.**

"Base Station" is the wireless service provider's specific electronic equipment used to transmit and receive radio signals located within and including cabinets, shelters, pedestals or other similar enclosures generally used to contain electronic equipment for said purpose.

### **21A.15.XXX Collocation.**

“Collocation” means the practice of installing and operating multiple wireless carriers, service providers, and/or radio common carrier licensees on the same antenna support structure or attached wireless communication facility using different and separate antenna, feed lines and radio frequency generating equipment.

### **21A.15.XXX Combined Antenna.**

“Combined antenna” means an antenna or an antenna array designed and utilized to provide multiple services or services for more than one wireless provider for the same or similar type of services.

### **21A.15.XXX Concealed WCF**

“Concealed WCF”, sometimes referred to as a stealth or camouflaged facility, means the antenna or antenna array, antenna support structure, base station, and feed lines are not readily identifiable as such, and is designed to be aesthetically compatible with existing and proposed building(s) and uses on a site. Examples of concealed attached facility include, but are not limited to the following: painted antenna and feed lines to match the color of a building or structure, faux windows, dormers or other architectural features that blend with an existing or proposed building or structure. Examples of concealed antenna support structures can have a secondary, obvious function which may be, but is not limited to the following: church steeple, windmill, bell tower, clock tower, cupola, light standard, utility pole, flagpole with or without a flag, or tree.

### **21A.15.XXX Consolidation.**

“Consolidation” means removal of one or several antenna support structure(s) or attached WCF located within a 1,500-foot radius of the center of the consolidated antenna support structure and

its base station in order to encourage compliance with this chapter or to improve aesthetics or functionality of the overall wireless network.

**21A.15.XXX FAA.**

“FAA” means the Federal Aviation Administration.

**21A.15.XXX FCC.**

“FCC” means the Federal Communications Commission.

**21A.15.XXX Feed Lines.**

“Feed lines” are cables used as the interconnecting media between the transmission/receiving base station and the antenna.

**21A.15.XXX Flush-Mounted.**

“Flush-mounted” means any antenna or antenna array attached directly to the face of the antenna support structure, structure, or building. Where a maximum flush-mounting distance is given, that distance shall be measured from the outside edge of the support structure or building to the inside edge of the antenna.

**21A.15.XXX Least Visually Obtrusive Profile.**

“Least visually obtrusive profile” means the design of a wireless communication facility intended to present a visual profile that is the minimum profile necessary for the facility to properly function.

**21A.15.XXX Master Telecommunications Plan.**

“Master telecommunications plan” means a plan developed to establish public policy and applicable development standards related to the deployment of wireless telecommunications infrastructure.

**21A.15.XXX Non-concealed WCF**

“Non-concealed WCF” means an antenna or antenna array, antenna support structure, base station, and feed lines that are readily identifiable as such.

**21A.15.XXX Radio Frequency Emissions.**

“Radio frequency emissions” means any electromagnetic radiation or other communications signal emitted from an antenna or antenna-related equipment on the ground, antenna support structure, building, or other vertical projection.

### **21A.15.XXX Wireless Communications.**

“Wireless communications” means any personal wireless service, which includes but is not limited to, cellular, personal communication services (PCS), specialized mobile radio (SMR), enhanced specialized mobile radio (ESMR), unlicensed spectrum services utilizing devices described in Part 15 of the FCC rules and regulations (e.g., wireless internet services and paging).

### **21A.15.XXX Wireless Communication Facility.**

“Wireless communication facility” (WCF) means any manned or unmanned location for the transmission and/or reception of radio frequency signals, or other wireless communications, and usually consisting of an antenna or group of antennas, feed lines, and base station, and may include an antenna support structure. The following developments shall be deemed included in the general definition of a WCF: developments containing new, consolidated, or existing antenna support structures, public antenna support structures, and collocation on existing antenna support structures, collocation onto existing utility pole or cross-country electrical distribution tower, attached antennas or antenna arrays, base stations and feed lines whether concealed, or non-concealed. Included in this definition are: non-commercial amateur radio, amateur ham radio and citizen band antennas, satellite earth stations and antenna support structures, and antennas and/or antenna arrays for AM/FM/TV/HDTV broadcasting WCFs.

### **21A.15.XXX Wireless Right-of-Way Use Agreement.**

“Wireless Right-of-Way Use Agreement” or “WROWA” means the initial authorization, or renewal of an agreement to construct in, under, over (if permitted by City regulations), or across public ways of the City and to also provide wireless telecommunications service to persons or areas in the City.

### **21A.55.010 Purpose**

The purpose of this chapter is to:

- (1) Establish clear regulations for the siting and design of Wireless Communication Facilities consistent with Federal regulations.
- (2) Promote the health, safety, and general welfare of the public by regulating the siting of WCFs.
- (3) Minimize impacts of WCFs on surrounding areas by establishing standards for location, structural integrity, and compatibility.
- (4) Encourage the location and collocation of wireless communication equipment on existing structures.
- (5) Minimize visual, aesthetic, public safety, and environmental and wildlife effects.
- (6) Accommodate the growing need and demand for wireless communication services.
- (7) Respond to the policies embodied in the *Telecommunications Act of 1996* in such a manner as not to unreasonably discriminate between providers of functionally equivalent

personal wireless services or to prohibit or have the effect of prohibiting personal wireless services.

(8) Encourage orderly development in a preferred hierarchy using concealed technologies.

(9) Assure WCF development is consistent with the City's Wireless Master Plan.

**21A.55.020 Applicability**

(1) If a conflict arises between this chapter and the provisions of another chapter regarding wireless communication facilities this chapter shall govern.

(2) Facilities regulated by this chapter include the construction, modification, and placement of all WCFs, FCC regulated amateur radio antenna, dish antennas, and any antennas used for MMDS or Wireless Cable, and wireless service facilities (i.e. cellular phone service, PCS- personal communication services, wireless paging services, wireless internet services, etc.) Wireless services shall be subject to the following regulations to the extent that such requirements (a) Do not unreasonably discriminate among providers of functionally equivalent services; (b) Do not have the effect of prohibiting personal wireless services within the City of Sarmamish.

**21A.55.030 Exemptions**

The following are exempt from the provisions of this chapter:

(1) Amateur radio antenna operated by a federally licensed amateur radio operator as part of the Amateur or Business Radio Service.

(2) Citizen band or two-way radio antenna including any mast.

(3) Satellite earth stations (satellite dish) that are one meter (39.37 inches) or less in diameter in all residential districts and two meters or less in all other zoning districts and which are not greater than twenty feet above grade in residential districts and thirty-five feet above grade in all other zoning districts.

(4) A temporary, commercial wireless communications facility, for the purposes of providing coverage of a special event such as news coverage or sporting event, subject to approval by the City, except that such facility must comply with all federal and state requirements. Said wireless communications facility may be exempt from the provisions of this division up to one week after the duration of the special event.

(5) In the event a building permit is required for any emergency repair, notification in writing to the Director of Community Development shall occur within 24 hours of identification of the needed repair, filing of the building permit application shall be done in compliance with the City's adopted building code. (In the event a building permit is required for nonemergency maintenance, reconstruction, repair or replacement, filing of the building permit application shall be required prior to the commencement of such nonemergency activities.)

(6) Antenna modifications, provided:

(a) There is no increase in the number of antenna; and

(b) There is no increase in the height of the antenna support structure.

**21.A.55.040 Permit Required**

The following table summarizes the type of proposal and required land use approvals. All proposals are subject to the siting hierarchy requirements of this chapter.

Concealed Attached WCF Antenna	Consolidation of WCFs	Concealed Collocation	Flush or Non-Flush-mounted Antenna on Existing Antenna Support Structure	Concealed Antenna Support Structure	Combined on Existing WCF
P1 C	C	P1 C	P1 C	C	P1 C

P - Permitted Use - The use is allowed subject to the requirements of the code.  
 C - Conditional Use Permit- The use is allowed subject to the conditional use review procedures and requirements of the code.

*Notes:*

1. *If the proposal does not extend the height by more than 40' and it is demonstrated the proposal is consistent with any previous relevant approval conditions.*

**21A.55.050 Application requirements.**

In addition to any information required for CUP and/or building permit review an application for new WCFs or modifications to WCFs that require City approval shall provide the following information:

- (1) A site plan showing existing and proposed WCFs, access, base station, ancillary structures, warning signs, fencing, landscaping and any other items necessary to illustrate compliance with the development standards of this chapter.
- (2) A stamped statement by a State of Washington Registered Professional Engineer that the support structure shall comply with EIA/TIA-222-F (as Amended), allowable wind speed for the applicable zone in which the facility is located, and describing the general structural capacity of any proposed WCF(s), including:
  - (a) The number and type of antennas that can be accommodated;
  - (b) The basis for the calculation of capacity; and
  - (c) A written statement that the proposal complies with all Federal Guidelines regarding interference and ANSI standards as adopted by the FCC, including but not limited to Nonionizing Electromagnetic Radiation (NIER) standards.
- (3) A report by the applicant that includes a description of the proposed WCF, including height above grade, materials, color, lighting, and information demonstrating compliance with Siting Hierarchy, SMC 21A.56.070.
- (4) Where a permit for an attachment or collocation is required, the application shall also include the following information:
  - (a) The name and address of the operator(s) of proposed and existing antennas on the site;
  - (b) The height of any proposed antennas;

- (c) Manufacture, type, and model of such antennas;
- (d) Frequency, modulation, and class of service;and
- (e) A description of the wireless communication service that the applicant intends to offer to provide, or is currently offering or providing within the City.
- (5) A detailed visual simulation of the wireless communication facility shall be provided along with a written report from the applicant, including a map showing all locations where an unimpaird signal can be received for that facility.
- (6) Approved WROWA.
- (7) Other information as the Director of Community Development may reasonably require, including additional information specific to the City's Wireless Communication Facilities Master Plan.
- (8) Fees for review as established by the City's most current Fee Resolution.

The Director of Community Development may release an applicant from having to provide one or more of the pieces of information on this list upon a finding that in the specific case involved said information is not necessary to process or make a decision on the application being submitted.

**21A.55.060 Siting Hierarchy**

Siting of antenna or support structures shall adhere to the siting hierarchy of this section. The order of ranking for antenna or antenna support structures, from highest to lowest, shall be 1a, 1b, 1c, 1d, 1e, 2a, 2b, 2c, 2d, 3a, 3b, 3c, 3d and 3e. Where a lower ranking alternative is proposed, the applicant must file relevant information including but not limited to an affidavit by a licensed radio frequency engineer demonstrating that despite diligent efforts to adhere to the established hierarchy within the geographic search area, higher ranking options are not technically feasible, or justified given the location of the proposed wireless communications facility and network need.

Example:

A new facility meeting the definition of a Concealed Consolidated WCF is proposed; the applicant demonstrates that the new facility cannot be sited under hierarchy 1a-1e. The applicant then demonstrates the new facility cannot be sited under hierarchy 2a or 2b. The applicant then moves to hierarchy 2c and is able to propose a site.

- (1) Concealed ~~attached~~-WCF that is ~~also either~~ an Attached WCF; or, attached to an existing concealed or non-concealed Antenna Support Structure ~~or an attached WCF on an existing non-concealed antenna support structure~~:
  - (a) Within City classified arterial right-of-way.
  - (b) Within public parks, public open spaces, and on other publicly-owned land.
  - (c) Within other City street right-of-way.
  - (d) In any non-residential zoning district.
  - (e) In residential zoning districts on lots not used for single-family residential purposes.
- (2) Concealed Consolidation that is a Consolidation of Antenna Support Structures:
  - (a) Within City classified arterial right-of-way.
  - (b) Within public parks, public open spaces, and on other publicly-owned land.

- (c) In any non-residential zoning district.
- (d) In residential zoning districts on lots not used for single-family residential purposes.
- (3) New concealed antenna support structure:
  - (a) Within City classified arterial right-of-way.
  - (b) Within public parks, public open spaces, and on other publicly owned land.
  - (c) Within other City street right-of-way.
  - (d) In any non-residential zoning district.
  - (e) In residential zoning districts on lots not used for single-family residential purposes.

**21A.55.070 Base Station Hierarchy**

Siting of Base Stations shall adhere to the siting hierarchy of this section. The order of ranking, from highest to lowest, shall be 1, 2, 3, and 4. Where a lower ranking alternative is proposed, the applicant must demonstrate that a higher ranking option is not technically feasible, or justified given the location or size of the proposed base station.

- (1) Underground, if located within City right-of-way.
- (2) Within an existing building, provided the use of the building is not single family residential.
- (3) On the roof of an existing building provided the use of the building is not single family residential.
- (4) Fenced and landscaped or inside a building constructed for housing the base station from a consolidated WCF.

**21A.55.080 General Requirements.**

- (1) Within public parks and public open spaces the placement of antennas on existing structures, such as power poles, light poles for streets and parking lots, light standards for recreational fields and antenna support structures, is the preferred option subject to the approval of the property owner. If an existing structure cannot accommodate an antenna due to structural deficiency, or does not have the height required to provide adequate signal coverage, the structure may be replaced with a new structure, provided:
  - (a) The new structure will serve the original purpose.
  - (b) Does not exceed the original height by 40 feet or the maximum height allowed by this chapter. Any height increase in excess of 40 feet will require a conditional use permit.
  - (c) Meets all the requirements of this chapter.
- (2) Concealed attached antenna shall comply with the following requirements:
  - (a) Concealed antennas shall reflect the visual characteristics of the structure to which it is attached and shall be designed to architecturally match the façade, roof, wall, or structure on which they are affixed so that they blend with the existing structural design, color, and texture. This shall include the use of colors and materials, as appropriate. When located on structures such as buildings or water towers, the placement of the antenna on the structure shall reflect the following order of priority in order to minimize visual impact:
    - (i) A location as close as possible to the center of the structure; and
    - (ii) Along the outer edges or side-mounted; provided, that in this instance, additional means such as screens should be considered and may be required by

- the department on a case-by-case basis; and
- (iii) When located on the outer edge or side-mounted, be placed on the portion of the structure less likely to be seen from adjacent lands containing, in descending order of priority: existing residences, public parks and open spaces, and public roadways.
- (b) Notwithstanding the height limit of the underlying zone, the top of the concealed attached WCF shall not be more than 20 feet above the existing or proposed nonresidential building or structure, or more than 15 feet above a residential building or structure.
- (c) Feed lines shall be contained within a principal building or encased and the encasement painted to blend and match the design, color, and texture of the façade, roof, wall, or structure to which they are affixed.

(3) Concealed Antenna Support Structure shall comply with the following requirements:

- (a) Upon application for a conditional use permit or a building permit for a new concealed antenna support structure, whichever is required first, the applicant shall provide a map showing all existing antenna support structures or other suitable nonresidential structures located within one-quarter mile of the proposed structure with consideration given to engineering and structural requirements.
- (b) No new antenna support structure shall be permitted if an existing structure suitable for attachment of an antenna or collocation is located within one-quarter mile, unless the applicant demonstrates that the existing structure is physically or technologically unfeasible, or is not made available for sale or lease by the owner, or is not made available at a market rate cost, or would result in greater visual impact. The burden of proof shall be on the applicant to show that a suitable structure for mounting of antenna or collocation cannot be reasonably or economically used in accordance with these criteria.
- (c) In residential districts, new concealed antenna support structures shall only be permitted on lots whose principal use is not single-family residential, including but not limited to: schools, churches, synagogues, fire stations, parks, and other public property.
- (d) To the extent that there is no conflict with the color and lighting requirements of the Federal Communications Commission and the Federal Aviation Administration for aircraft safety purposes, new antenna support structures shall be concealed as defined by this Title and shall be configured and located in a manner to have the Least Visually Obtrusive Profile on the landscape and adjacent properties. New concealed antenna support structures shall be designed to complement or match adjacent structures and landscapes with specific design considerations such as architectural designs, height, scale, color, and texture and designed to blend with existing surroundings to the extent feasible. This shall be achieved through the use of compatible colors and materials, and alternative site placement to allow the use of topography, existing vegetation or other structures to screen the proposed concealed antenna support structure from adjacent lands containing, in descending order of priority: existing residences, public parks and open spaces, and public roadways.
- (e) At time of application the applicant shall file a letter, with the department, agreeing to allow collocation on the tower. The agreement shall commit the applicant to provide, either at a market rate cost or at another cost basis agreeable to the affected parties, the

opportunity to collocate the antenna of other service providers on the applicant's proposed tower to the extent that such collocation is technically and structurally feasible for the affected parties.

(f) All new concealed antenna support structures up to sixty (60) feet in height shall be engineered and constructed to accommodate no less than two (2) antenna arrays. All concealed antenna support structures between sixty-one (61) feet and one hundred (100) feet shall be engineered and constructed to accommodate no less than three (3) antenna arrays. All concealed antenna support structures between one hundred and one (101) and one hundred and forty (140) feet shall be engineered and constructed to accommodate no less than four (4) antenna arrays.

(g) Grading shall be minimized and limited only to the area necessary for the new WCF.

(4) Consolidation of WCFs shall comply with the following requirements:

Consolidation of two (2) or more existing WCFs may be permitted pursuant to the provisions of this chapter including a CUP and consideration of the following:

(a) WCF consolidation shall reduce the number of WCFs.

(b) If a consolidation involves the removal of WCFs from two or more different sites and if a consolidated WCF is to be erected on one of those sites, it shall be erected on the site that provides for the greatest compliance with the standards of this chapter.

(c) Consolidated WCFs shall be Concealed.

(d) All existing base station and ancillary equipment shall be brought into compliance with this chapter.

(e) New WCFs approved for consolidation of an existing WCF shall not be required to meet new setback standards so long as the new WCF and its base station and ancillary structures are no closer to any property lines or dwelling units as the WCF and base station and ancillary structures being consolidates. For example, if a new WCF is replacing an old one, the new one is allowed to have the same setbacks as the WCF being removed, even if the old one had nonconforming setbacks.

(f) If the consolidated WCF cannot meet the setback requirements it shall be located on the portion of the parcel on which it is situated which, giving consideration to the following, provide the optimum practical setback from adjacent properties:

(i) Topography and dimensions of the site;

(ii) Location of any existing structures to be retained.

(5) Collocated or Combined Facilities shall comply with the following requirements:

(a) Collocation of antennas onto existing antenna support structures meeting the dimensional standards of this chapter are permitted outright. Antenna mounts shall be flush-mounted onto existing antenna support structure; unless it is demonstrated through RF propagation analysis that flush-mounted antennas will not meet the network objectives of the desired coverage area. Furthermore, an antenna shall not extend vertically above the uppermost portion of the structure to which it is mounted or attached, as follows:

(i) Not more than 20 feet on a nonresidential structure; and

(ii) Not more than 15 feet on a residential structure.

(b) Collocation of antennas onto a new antenna support structures constructed after the effective date of this chapter shall be concealed.

(c) At the time of installation, the WCF base station and ancillary structures shall be brought into compliance with any applicable landscaping requirements.

(d) A collocated or combined WCF, its new base station, and any new ancillary structures shall be subject to the setbacks of the underlying zoning district.

(e) When a collocated or combined WCF is to be located on a nonconforming building or structure, then it will be subject to SMC 21A.70.

**(H)21A.55.090 Design standards.**

← --- Formatted: Bullets and Numbering

(1) All WCF's shall:

- a. Be designed and constructed to present the Least Visually Obtrusive Profile.
- b. Use colors such as grey, blue, or green that reduce visual impacts unless otherwise required by the City of Sammamish, FAA, or FCC.
- c. Flush-mount antenna when feasible. (4) Non-flush mounted antenna are allowed only upon written demonstration by the applicant that flush-mounting is not feasible.

(2) Base Stations.

(a) Base stations and ancillary structures shall be subject to the setbacks of the underlying zoning district.

(b) Base stations that are not located underground shall not be visible from public views. New base stations and ancillary structures shall be designed to complement or match adjacent structures and landscapes with specific design considerations such as architectural designs, height, scale, color, and texture and designed to blend with existing surroundings to the extent feasible. This shall be achieved through the use of compatible colors and building materials of existing buildings or structures on the property, and alternative site placement to allow the use of topography, existing vegetation or other structures to screen the base station and ancillary structures from pedestrian views. Where feasible, one building with multiple compartments shall be constructed to serve the total number of anticipated collocation tenants. If the applicant can demonstrate that one building is not feasible or practical due to site design or other constraints, then a master site plan shall be provided to demonstrate how all potential base stations and ancillary structures will be accommodated within the vicinity of the WCF.

(3) Height standards.

The height of the antenna support structure shall be measured from the natural undisturbed ground surface below the center of the base of the tower to the top of the tower or if higher to the top of the highest antenna or piece of equipment attached thereto. The height of any WCF shall not exceed the height provided in the table below.

Zone District(s)	Maximum Height of New Antenna Support Structures	Maximum Height of Consolidated Antenna Support Structures
CB, O	120'	140'
NB, R-1 – R-18	60'	80'

Note: *Height limits in right-of-way not zoned shall be forty feet (40') above existing utility or light poles.*

- (a) Increases to the height of an existing antenna support structure are permitted provided:
  - (i) It is consistent with all conditions of the CUP authorizing the use and subsequent approvals thereafter;
  - (ii) The existing conditions and the proposed changes are not in violation of the SMC;
  - (iii) Necessary to accommodate an actual collocation of the antenna for additional service providers or to accommodate the current provider's antenna required to utilize new technology, provide a new service, or increase capacity;
  - (iv) Height increases are limited to no more than 40 feet above the height of the existing antenna support structure unless explicitly allowed in the CUP.
  - (v) A nonconformance shall not be created or increased, except as otherwise provided by this chapter.
  - (vi) A detailed certification of compliance with the provisions of this section, prepared by a licensed professional engineer, is submitted and approved.

(4) Setback requirements.

- (a) Antenna support structures outside of the right-of-way shall have a setback from property lines of ten (10) feet from any property line and fifty (50) feet or one foot setback for every one foot in height from any Residentially zoned property, whichever provides the greatest setback.
- (b) Base Stations shall be subject to the setback requirements of the zone in which they are located.
- (c) The department shall consider the following criteria and give substantial consideration to on-site location and setback flexibility is authorized when reviewing applications for new antenna support structures and consolidations:
  - (i) Whether existing trees and vegetation can be preserved in such a manner that would most effectively screen the proposed tower from residences on adjacent properties;
  - (ii) Whether there are any natural landforms, such as hills or other topographic breaks, that can be utilized to screen the tower from adjacent residences;
  - (iii) Whether the applicant has utilized a tower design that reduces the silhouette

of the portion of the tower extending above the height of surrounding trees.

(5) Landscaping and Fencing requirements.

- (a) All ground mounted base stations and ancillary structures shall be enclosed with an opaque fence. In all Residential Zones, or a facility abutting a Residential Zone, or in any zone when the base station and ancillary structures adjoin a public right-of-way, the fence shall be opaque and made of wood, brick, or masonry. In the NB, CB, or O zone, if a chain link fence is installed slats shall be woven into the security fence. All fencing shall be subject to SMC 21A.30.190.
- (b) WCFs shall have perimeter landscaping as follows:
  - (i) In the NB, CB, or O zone, the base stations and ancillary structures shall be landscaped with eight feet of Type II landscaping pursuant to SMC [21A.35](#), along any lot line abutting a residential zone.
  - (ii) In Residential zones or abutting ROW, the base station and ancillary structures shall be landscaped with 10 feet of Type I landscaping pursuant to SMC [21A.35](#).
  - (iii) When a fence is used to prevent access to a WCF or base station, any landscaping required shall be placed outside of the fence.
  - (iv) Landscaping provisions may be modified in accordance with SMC 21A.35.

(6) Lighting standards.

Except as specifically required by the FCC or FAA WCFs shall not be illuminated, except lighting for security purposes that is compatible with the surrounding neighborhood.

Any lighting required by the FAA or FCC must be the minimum intensity and number of flashes per minute (i.e., the longest duration between flashes) allowable to minimize the potential attraction to migratory birds. Dual lighting standards (white blinking light in daylight and red blinking light at dusk and nighttime) are required and strobe light standards are prohibited unless required. The lights shall be oriented so as not to project directly onto surrounding residential property, and consistent with FAA and FCC requirements.

(7) Signage.

Commercial messages shall not be displayed on any WCF. The only signage that is permitted upon an antenna support structure, base station, or fence shall be informational, and for the purpose of identifying the antenna support structure (such as ASR registration number), as well as the party responsible for the operation and maintenance of the facility, its current address and telephone number, security or safety signs, and property manager signs (if applicable).

If more than two hundred twenty (220) voltage is necessary for the operation of the facility and is present in a ground grid or in the antenna support structure, signs located every twenty (20) feet and attached to the fence or wall shall display in large, bold, high contrast letters (minimum letter height of four (4) inches) the following: HIGH VOLTAGE - DANGER.

(8) Sounds.

Maximum permissible sound levels to intrude into the real property of another person from a wireless communication facility shall not exceed 45 dB(A). In the case of maintenance, construction, and emergencies these sound levels may be exceeded for short durations as required by the specific circumstance. (2 & 4)

**21A.55.100 Technical evaluation.**

The City may retain the services of an independent technical expert such as a registered professional electrical engineer accredited by the State of Washington who holds a federal communications general radio telephone operator license. The engineer will provide technical evaluation of permit applications for WCFs. The applicant shall pay all the costs of said review.

**21A.55.110 Interference.**

Whenever the City has encountered radio frequency interference with its public safety communications equipment, and it believes that such interference has been or is being caused by one or more WCFs, the following steps shall be taken:

(1) Upon notification by the City to WCF service providers potentially interfering with public safety communications equipment the providers shall cooperate and coordinate with the City and among themselves to investigate and mitigate the interference, if any, utilizing the procedures set forth in the joint wireless industry-public safety "Best Practices Guide," released by the FCC in February 2001, including the "Good Engineering Practices," as may be amended or revised by the FCC from time to time.

(2) If any WCF owner fails to cooperate with the City in complying with the owner's obligations under this section or if the FCC makes a determination of radio frequency interference with the City public safety communications equipment, the owner who fails to cooperate and/or the owner of the WCF which caused the interference shall be responsible, upon FCC determination of radio frequency interference, for reimbursing the City for all costs associated with ascertaining and resolving the interference, including but not limited to any engineering studies obtained by the jurisdiction to determine the source of the interference. For the purposes of this subsection, failure to cooperate shall include failure to initiate any response or action as described in the "Best Practices Guide" within 24 hours of the City's notification.

**21A.55.120 Cessation of use.**

(1) Antenna shall be removed, at the owner's expense, from WCFs within 180 days after the antenna is no longer operational; unless the abandonment is associated with a consolidation, in which case the removal shall occur within 90 days of cessation of use.

(2) The whole WCF shall be removed, at the owner's expense, within 180 days of the date the last antenna is removed.

(3) An owner wishing to extend the time for removal or reactivation shall submit a written request along with the appropriate documentation demonstrating the reason for such extension request. The City may extend the time for removal up to 90 additional days upon a showing of good cause with one additional 90-day extension. If the antenna support structure or antenna is not removed in a timely fashion, the City may give notice that it will contract for removal within

thirty (30) days following written notice to the owner. Thereafter, the City may cause removal of the antenna support structure with costs being borne by the current WCF owner or landowner.

(4) Upon removal of the WCF, base station, and ancillary structures, said area shall be returned to its natural state and topography and vegetated consistent with the natural surroundings or consistent with the current use of the land at the time of removal. The cost of rehabilitation shall be borne by the current WCF owner or landowner.