# **NEGATIVE DECLARATION**

FILE: S15-0014

PROJECT NAME: T-Mobile Keetak Street

NAME OF APPLICANT: T-Mobile, Karen Lienert

ASSESSOR'S PARCEL NOS.: 035-262-12

SECTION: 32 T: 12N R: 18E

**LOCATION:** Northeast side of Rancheria Court approximately 900 feet east of the intersection with Rancheria Drive in the Shingle Springs Area.

GENERAL PLAN AMENDMENT: FROM: TO:

**REZONING:** FROM: TO:

- □ TENTATIVE PARCEL MAP □ SUBDIVISION TO SPLIT ACRES INTO LOTS SUBDIVISION (NAME):
- SPECIAL USE PERMIT TO ALLOW: Conditional use permit request to allow the construction and operation of a wireless telecommunication facility consisting of a 100-foot tall monopine tower with six panel antennas and six tower mounted amplifiers mounted at 96 feet, and an equipment shelter with two air conditioning units surrounded by chain link fencing with green privacy slats, all within a 1,250 square foot lease area.
- OTHER:

# REASONS THE PROJECT WILL NOT HAVE A SIGNIFICANT ENVIRONMENTAL IMPACT:

NO SIGNIFICANT ENVIRONMENTAL CONCERNS WERE IDENTIFIED DURING THE INITIAL STUDY.

MITIGATION HAS BEEN IDENTIFIED WHICH WOULD REDUCE POTENTIALLY SIGNIFICANT IMPACTS.

# OTHER:

In accordance with the authority and criteria contained in the California Environmental Quality Act (CEQA), State Guidelines, and El Dorado County Guidelines for the Implementation of CEQA, the County Environmental Agent analyzed the project and based on the Initial Study, conditions have been added to the project to avoid or mitigate to a point of insignificance the potentially significant effects of the project. It has been determined that the project will not have a significant impact on the environment. Based on this finding, Planning Services hereby prepares this NEGATIVE DECLARATION. A period of thirty (30) days from the date of filing this Negative Declaration will be provided to enable public review of the project specifications and this document prior to action on the project by EL DORADO COUNTY. A copy of the project specifications is on file at El Dorado County Planning Services, 2850 Fairlane Court, Placerville, CA 95667.

# This Negative Declaration was adopted by the Planning Commission on February 9, 2017.

Executive Secretary

Exhibit J



# COUNTY OF EL DORADO PLANNING SERVICES 2850 FAIRLANE COURT PLACERVILLE, CA 95667

# INITIAL STUDY ENVIRONMENTAL CHECKLIST FORM

**Project Title:** S15-0014/T-Mobile Keetak Street

Lead Agency Name and Address: County of El Dorado, 2850 Fairlane Court, Placerville, CA 95667

Contact Person: Rob Peters, Associate Planner Phone Number: (530) 621-5355

Property Owner's Name and Address: Lake Valley Fire Protection District, 2211 Keetak St., South Lake Tahoe, CA 89511

Project Applicant's Name and Address: T-Mobile, Karen Lienert, 1755 Creekside Oaks Dr. #190, Sacramento, CA 95833

Project Agent's Name and Address: Same as Applicant

Project Agent's Name and Address: Peek Site-Com, 12852 Earhart Ave. #101, Auburn, CA 95602

**Project Location:** On the east side of Keetak Street approximately 375 feet north of intersection of Keetak Street and Cornelian Drive in the Meyers Community Plan area, South Lake Tahoe. 2211 Keetak Street.

Assessor's Parcel Number(s): 035-262-12

**Zoning:** Meyers Community Plan - Industrial Tract Use District - Design Community Combining Zone (MCP-4/DC)

**Section:** 32 **T:** 12N **R:** 18E

**General Plan Designation:** Adopted Plan (AP) - Tahoe Regional Plan, Plan Area Statement 125, Meyers Community Plan

**Description of Project:** Conditional use permit request to allow the construction and operation of a new wireless telecommunication facility consisting of a 100-foot tall monopine tower with six panel antennas, six tower mounted amplifiers mounted at 96 feet, and a 200-square foot equipment shelter with two air conditioning units surrounded by chain link fencing with green privacy slats, all within a 1,250 square foot lease area. No trees will be removed for the construction of site.

Surrounding	Surrounding Land Uses and Setting:									
	Zoning	General Plan	Land Use (e.g., Single Family Residences, Grazing, Park, School)							
Site:	Meyers Community Plan- Industrial Tract District	Adopted Plan	Vacant land							
North:	Meyers Community Plan- Industrial Tract District	Adopted Plan	Fire station							
South:	Meyers Community Plan- Industrial Tract District	Adopted Plan	Vacant land							
East:	Single-Unit Residential	Adopted Plan	Single Family Residences							
West:	Transportation Corridor	Adopted Plan	Keetak Street and State Highway 89							

<u>Briefly describe the environmental setting</u>: The 1.99-acre site is located on the east side of Keetak Street, adjacent to and south of the Lake Valley Fire Station, approximately 375 feet north of intersection of Keetak Street and Cornelian Drive 200 feet east of U.S. Highway 89 in the Meyer's Community Plan area, South Lake Tahoe. The project site sits at an approximate elevation of 6,360 feet above mean sea level. The site is vacant except for a fire station hose rack at the front property line. The lot is flat with various rocks, shrubs, and pine trees. A wood fence at the rear property line separates the vacant lot from single family residences. The lot includes a 10-foot-wide public utility easement along the entire east (rear) property line.

# Other public agencies whose approval is required (e.g., permits, financing approval, or participation agreement.):

- 1. Transportation Division: Review of Conditions of Approval.
- 2. El Dorado County Environmental Management: Review of Conditions of Approval.
- 3. Lake Valley Fire Protection District: Review and approval of Building Permit.
- 4. Building Services: Review and approval of Grading and Building Permits.
- 5. Air Quality Management District: Review and approval of Fugitive Dust Mitigation Plan.
- 6. Tahoe Regional Planning Agency (TRPA)

# ENVIRONMENTAL FACTORS POTENTIALLY AFFECTED

The environmental factors checked below would be potentially affected by this project, involving at least one impact that is a "Potentially Significant Impact" as indicated by the checklist on the following pages.

Aesthetics	Agriculture and Forestry Resources	Air Quality
Biological Resources	Cultural Resources	Geology / Soils
Greenhouse Gas Emissions	Hazards & Hazardous Materials	Hydrology / Water Quality
Land Use / Planning	Mineral Resources	Noise
Population / Housing	Public Services	Recreation
Transportation/Traffic	Tribal Cultural Resources	Utilities / Service Systems
Mandatory Findings of Significance		

#### DETERMINATION

#### On the basis of this initial evaluation:

- I find that the proposed project COULD NOT have a significant effect on the environment, and a NEGATIVE DECLARATION will be prepared.
- I find that although the proposed project could have a significant effect on the environment, there will not be a significant effect in this case because revisions in the project have been made by or agreed to by the project proponent. A MITIGATED NEGATIVE DECLARATION will be prepared.
- I find that the proposed project MAY have a significant effect on the environment, and an ENVIRONMENTAL IMPACT REPORT is required.
- I find that the proposed project MAY have a "potentially significant impact" or "potentially significant unless mitigated" impact on the environment, but at least one effect: 1) has been adequately analyzed in an earlier document pursuant to applicable legal standards; and 2) has been addressed by Mitigation Measures based on the earlier analysis as described in attached sheets. An ENVIRONMENTAL IMPACT REPORT is required, but it must analyze only the effects that remain to be addressed.
- I find that although the proposed project could have a significant effect on the environment, because all potentially significant effects: a) have been analyzed adequately in an earlier EIR or NEGATIVE DECLARATION, pursuant to applicable standards; and b) have been avoided or mitigated pursuant to that earlier EIR or NEGATIVE DECLARATION, including revisions or Mitigation Measures that are imposed upon the proposed project, nothing further is required.

Signature:	17-1	Date:	12-29-16
Printed Name:	Rob Peters, Associate Planner	For:	El Dorado County
Signature:	P	Date:	12/29/14
Printed Name:	Mel Pabalinas, Acting Principal Planner	For:	El Dorado County

# **PROJECT DESCRIPTION**

# Introduction

This Initial Study has been prepared in accordance with the California Environmental Quality Act (CEQA) to evaluate the potential environmental impacts resulting from the proposed Conditional Use Permit. The project would allow the construction of a 100-foot-tall monopine and associated ground equipment on a 1.99-acre vacant property. The project would be developed consistent with the MCP-4 zone district development standards, the Meyers Community Plan, and the rules and regulations of the Tahoe Regional Planning Agency (TRPA).

# Project Description

Conditional Use Permit to allow the construction and operation of a wireless telecommunication facility consisting of a 100-foot-tall monopine tower with six panel antennas and six tower mounted amplifiers at the 96 foot level, an approximately 200 square-foot equipment shelter with a motion sensor light above the door for technician access and two air conditioning units on west side of the shelter, all within a 1,250 square-foot lease area (Exhibit F). The project would result in approximately 749 square feet of proposed on-site coverage at the project site (Exhibit F) A small chain-link fence with green privacy slats would screen the air conditioning units from view. The twelve foot tall equipment shelter exterior will have with a green metal roof with gable ends and tan siding to match the existing fire station buildings on the adjacent parcel (Exhibit F and G). No trees will be removed for the construction of the facility; however, four 15-gallon pine trees would be planted west of the proposed facility to help screen the facility and to satisfy TRPA requirements. Access to the site would be through the existing fire station driveway.

The wireless communications facility has been designed as a monopine with foliage that matches the existing surrounding vegetation and would be pained to simulate a natural brown bark. The antennas are proposed to be mounted at 96 feet and covered with pine needle socks. The top of the pole would be at 100 feet above ground level with foliage extending another five feet to an overall structure height of 105 feet. The facility has been designed to accommodate up to two additional carriers to be collocated.

## Project Location and Surrounding Land Uses

The 1.99-acre site is located on the east side of Keetak Street, adjacent to and south of the Lake Valley Fire Station, approximately 375 feet north of intersection of Keetak Street and Cornelian Drive 200 feet east of U.S. Highway 89 in the Meyer's Community Plan area, South Lake Tahoe, within the Tahoe Regional Planning Agency's (TRPA's) jurisdiction (Exhibit E). The project site sits at an approximate elevation of 6,360 feet above mean sea level. The site is vacant except for a fire station hose rack at the front property line. The lot is flat with various rocks, shrubs, and pine trees. A wood fence at the rear property line separates the vacant lot from single family residences. The lot includes a 10-foot-wide public utility easement along the entire east (rear) property line.

The surrounding land uses include residential uses to the east, undeveloped industrial land to the south, a fire station to the north, and a public road, natural median, and State Highway to the west. The surrounding properties are zoned MCP-4 (Meyers Community Plan-Industrial Tract), R1 (Single-unit Residential) and TC (Transportation Corridor). There are pine trees, rocks and some shrubs within the natural median that provide some screening of the project site. A fire hydrant is located directly in front of the proposed tower facility.

#### Project Characteristics

# 1. Transportation/Circulation/Parking

Access to the tower facility during construction would be from the adjacent fire station via an existing driveway that has access directly from Keetak Street. Access to the site for future maintenance would be from a proposed 6-foot non-exclusive T-Mobile access easement.

# 2. Utilities and Infrastructure

The project site would not need sewer and water to the facility. Electricity would be provided to the site from a joint utility pole located on the east side of Keetak Street adjacent to the southwestern corner of the property.

#### 3. Construction Considerations

Minor lease area site construction, grading, and extension of existing utilities will be required for the project. Grading would include interior site preparation including surface grading, tower and equipment foundations and concrete flooring, and overall site surfacing preparation. The utilities serving the site will be installed within the proposed utility easements. All of these activities will take approximately 45-60 days. T-Mobile will have personnel on site daily during this construction period. All future construction activities would be completed in conformance with the County of El Dorado Grading and Erosion Control regulations, Air Quality Management District rules and regulations, and TRPA codes.

#### Project Schedule and Approvals

This Initial Study is being circulated for public and agency review for a 30-day period. Written comments on the Initial Study should be submitted to the project planner indicated in the Summary section, above. Following the close of the written comment period, the Initial Study will be considered by the Lead Agency in a public meeting and will be certified if it is determined to be in compliance with CEQA. The Lead Agency will also determine whether to approve the project.

# **EVALUATION OF ENVIRONMENTAL IMPACTS**

- 1. A brief explanation is required for all answers except "No Impact" answers that are adequately supported by the information sources a lead agency cites in the parentheses following each question. A "No Impact" answer is adequately supported if the referenced information sources show that the impact simply does not apply to projects like the one involved (e.g., the project falls outside a fault rupture zone). A "No Impact" answer should be explained where it is based on project-specific factors as well as general standards (e.g., the project will not expose sensitive receptors to pollutants, based on a project-specific screening analysis).
- 2. All answers must take account of the whole action involved, including off-site as well as on-site, cumulative as well as project-level, indirect as well as direct, and construction as well as operational impacts.
- 3. If the lead agency has determined that a particular physical impact may occur, the checklist answers must indicate whether the impact is potentially significant, less than significant with mitigation, or less than significant. "Potentially Significant Impact" is appropriate if there is a fair argument that an effect may be significant. If there are one or more "Potentially Significant Impact" entries when the determination is made, an EIR is required.
- 4. "Negative Declaration: Less Than Significant With Mitigation Incorporated" applies where the incorporation of Mitigation Measures has reduced an effect from "Potentially Significant Impact" to a "Less Than Significant Impact." The lead agency must describe the Mitigation Measures, and briefly explain how they reduce the effect to a less than significant level.
- 5. Earlier analyses may be used where, pursuant to the tiering, program EIR, or other CEQA process, an effect has been adequately analyzed in an earlier EIR or negative declaration (Section 15063(c)(3)(D)). In this case, a brief discussion should identify the following:
  - a. Earlier Analysis Used. Identify and state where they are available for review.
  - b. Impacts Adequately Addressed. Identify which effects from the above checklist were within the scope of and adequately analyzed in an earlier document pursuant to applicable legal standards, and state whether such effects were addressed by mitigation measures based on the earlier analysis.
  - c. Mitigation Measures. For effects that are "Less Than Significant With Mitigation Incorporated," describe the mitigation measures which were incorporated or refined from the earlier document and the extent to which they address site-specific conditions for the project.
- 6. Lead agencies are encouraged to incorporate into the checklist references to information sources for potential impacts (e.g., general plans, zoning ordinances). Reference to a previously prepared or outside document should, where appropriate, include a reference to the page or pages where the statement is substantiated.
- 7. Supporting Information Sources: A source list should be attached, and other sources used, or individuals contacted should be cited in the discussion.
- 8. This is only a suggested form, and lead agencies are free to use different formats; however, lead agencies should normally address the questions from this checklist that are relevant to a project's environmental effects in whatever format is selected.
- 9. The explanation of each issue should identify:
  - a. the significance criteria or threshold, if any, used to evaluate each question; and
  - b. the mitigation measure identified, if any, to reduce the impact to less than significant.

# **ENVIRONMENTAL IMPACTS**

<b>I.</b> 2	<b>AESTHETICS.</b> Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Have a substantial adverse effect on a scenic vista?			X	
b.	Substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a state scenic highway?			X	
c.	Substantially degrade the existing visual character quality of the site and its surroundings?			X	
d.	Create a new source of substantial light or glare which would adversely affect day or nighttime views in the area?			X	

#### **Regulatory Setting:**

#### Federal Laws, Regulations, and Policies

No federal regulations are applicable to aesthetics in relation to the Proposed Project.

# State Laws, Regulations, and Policies

In 1963, the California State Legislature established the California Scenic Highway Program, a provision of the Streets and Highways Code, to preserve and enhance the natural beauty of California (Caltrans, 2015). The state highway system includes designated scenic highways and those that are eligible for designation as scenic highways. Highway 89 is an officially designated state scenic corridor in the vicinity of the project site.

# Local Laws, Regulations, and Policies

The County has several standards and ordinances that address issues relating to visual resources. Many of these can be found in the County Zoning Ordinance (Title 130 of the County Code). The Zoning Ordinance consists of descriptions of the zoning districts, including identification of uses allowed by right or requiring a special-use permit and specific development standards that apply in particular districts based on parcel size and land use density. These development standards often involve limits on the allowable size of structures, required setbacks, and design guidelines. Included are requirements for setbacks and allowable exceptions, the location of public utility distribution and transmission lines, architectural supervision of structures facing a state highway, height limitations on structures and fences, outdoor lighting, and wireless communication facilities.

# Discussion:

A substantial adverse effect to Visual Resources would result in the introduction of physical features that are not characteristic of the surrounding development, substantially change the natural landscape, or obstruct an identified public scenic vista.

**a, b.** Scenic Vista and Scenic Resources. All of State Route 89 in El Dorado County has been designated a state scenic highway by Caltrans. The scenic vistas at this location are the views of the mountains. However, the project site is located within an industrial section of Lake Tahoe surrounded by other

development and pine trees, and construction of a cell tower facility at this property would not impact scenic views along State Route 89. Therefore, no scenic vistas, resources, trees, rock outcroppings, historic buildings, or designated scenic highways would be affected by this project. Impacts would be less than significant.

- c. **Visual Character.** The development of a cell tower facility is suitable within an industrial area. The monopine will be situated within other pine trees and will be covered in faux pine braches and painted green to blend with its surroundings. The small equipment shelter would be designed to blend with the adjacent fire station. Although there are residences on parcels directly east of the project site, the closest residence would be approximately 200 feet from the monopine and trees and fencing between the facility and the residences would help screen the view of the monopine and the equipment. Four 15-gallon pine trees would be planted west of the proposed facility to help screen the facility and to satisfy TRPA requirements. The proposed project would not degrade the visual character or quality of the site and its surroundings. Impacts would be less than significant.
- d. **Light and Glare.** One motion sensor light would be attached to the equipment shelter to provide light at the shelter entrance. There will be no lights on the monopine. All components of the facility would be constructed from non-reflective materials. The project has been conditioned to ensure that any lights are compliant with Section 130.34 (Outdoor Lighting) of the Zoning Ordinance, and be required to be fully shielded. This proposed development would not create substantial light or glare affecting day or nighttime views in the area. Impacts would be less than significant.

**FINDING:** As conditioned and with adherence to El Dorado County Code of Ordinances (County Code), for this "Aesthetics" category, impacts would be less than significant.

II. imj ma Mc mo wh env Cal of t Leg in l	AGRICULTURE AND FOREST RESOURCES. In determining whether bacts to agricultural resources are significant environmental effects, lead agencies y refer to the California Agricultural Land Evaluation and Site Assessment del (1997) prepared by the California Dept. of Conservation as an optional del to use in assessing impacts on agriculture and farmland. In determining ether impacts to forest resources, including timberland, are significant tironmental effects, lead agencies may refer to information compiled by ifornia Department of forestry and Fire Protection regarding the state's inventory forest land, including the Forest and Range Assessment Project and the Forest gacy Assessment project; and forest carbon measurement methodology provided forrest Protocols adopted by the California Air Resources Board. Would the ject:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Convert Prime Farmland, Unique Farmland, Farmland of Statewide Importance, or Locally Important Farmland (Farmland), as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to non-agricultural use?				X
b.	Conflict with existing zoning for agricultural use, or a Williamson Act Contract?				X
c.	Conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code section 12220(g)), timberland (as defined by Public Resources Code section 4526), or timberland zoned Timberland Production (as defined by Government Code section 51104(g))?				X
d.	Result in the loss of forest land or conversion of forest land to non-forest use?				Х
e.	Involve other changes in the existing environment which, due to their location or nature, could result in conversion of Farmland, to non-agricultural use or conversion of forest land to non-forest use?				X

# **Regulatory Setting:**

# Federal Laws, Regulations, and Policies

No federal regulations are applicable to agriculture and forest resources in relation to the Proposed Project.

## State Laws, Regulations, and Policies

#### Farmland Mapping and Monitoring Program

The Farmland Mapping and Monitoring Program (FMMP), administered by the California Department of Conservation (CDC), produces maps and statistical data for use in analyzing impacts on California's agricultural resources (CDC 2008). FMMP rates and classifies agricultural land according to soil quality, irrigation status, and other criteria. Important Farmland categories are as follows (CDC 2013a):

**Prime Farmland:** Farmland with the best combination of physical and chemical features able to sustain long-term agricultural production. These lands have the soil quality, growing season, and moisture supply needed to produce sustained high yields. Prime Farmland must have been used for irrigated agricultural production at some time during the 4 years before the FMMP's mapping date.

*Farmland of Statewide Importance:* Farmland similar to Prime Farmland, but with minor shortcomings, such as greater slopes or less ability to store soil moisture. Farmland of Statewide Importance must have been used for irrigated agricultural production at some time during the 4 years before the FMMP's mapping date.

**Unique Farmland**: Farmland of lesser quality soils used for the production of the state's leading agricultural crops. These lands are usually irrigated but might include non-irrigated orchards or vineyards, as found in some climatic zones. Unique Farmland must have been cropped at some time during the 4 years before the FMMP's mapping date.

*Farmland of Local Importance:* Land of importance to the local agricultural economy as determined by each county's board of supervisors and a local advisory committee.

#### California Land Conservation Act of 1965 (Williamson Act)

The California Land Conservation Act of 1965 (commonly referred to as the Williamson Act) allows local governments to enter into contracts with private landowners for the purpose of preventing conversion of agricultural land to non-agricultural uses (CDC 2013b). In exchange for restricting their property to agricultural or related open space use, landowners who enroll in Williamson Act contracts receive property tax assessments that are substantially lower than the market rate.

#### Z'berg-Nejedly Forest Practice Act

Logging on private and corporate land in California is regulated by the 1973 Z'berg-Nejedly Forest Practice Act. This Act established the Forest Practice Rules (FPRs) and a politically-appointed Board of Forestry to oversee their implementation. The California Department of Forestry (CALFIRE) works under the direction of the Board of Forestry and is the lead government agency responsible for approving logging plans and for enforcing the FPRs.

**Discussion:** A substantial adverse effect to Agricultural Resources would occur if:

- There is a conversion of choice agricultural land to nonagricultural use, or impairment of the agricultural productivity of agricultural land;
- The amount of agricultural land in the County is substantially reduced; or
- Agricultural uses are subjected to impacts from adjacent incompatible land uses.
- **a-b.** Conversion of Agricultural Land: The site is not located within an area designated for agriculture, an agricultural zone, or an Agricultural District. Wireless communication facilities are permitted in all zone

districts, subject to the applicable standards and permitting requirements, so the project would not conflict with existing zoning regulations for agricultural use. The property is not within an area that is under Williamson Act Contract and would not affect any properties under a Williamson Act Contract. There would be no impact.

c. Loss of Forest land or Conversion of Forest land: The site is not designated as Timberland Preserve Zone (TPZ) or other forestland according to the County General Plan, the Meyers Community Plan, and the County Zoning Ordinance. No trees are proposed for removal as part of the project. The proposed project activities and scale are such that there would be no change to the existing environment that would result in the conversion of farmland, agricultural land, or forestland. There would be no impact.

**<u>FINDING</u>**: For this "Agriculture" category, the thresholds of significance have not been exceeded and no impacts would be anticipated from the project.

_111	AIR QUALITY. Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Conflict with or obstruct implementation of the applicable air quality plan?			X	
b.	Violate any air quality standard or contribute substantially to an existing or projected air quality violation?			X	
c.	Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable federal or state ambient air quality standard (including releasing emissions which exceed quantitative thresholds for ozone precursors)?			X	
d.	Expose sensitive receptors to substantial pollutant concentrations?			X	
e.	Create objectionable odors affecting a substantial number of people?			X	

# **Regulatory Setting:**

# Federal Laws, Regulations, and Policies

The Clean Air Act is implemented by the U.S. Environmental Protection Agency (USEPA) and sets ambient air limits, the National Ambient Air Quality Standards (NAAQS), for six criteria pollutants: particulate matter of aerodynamic radius of 10 micrometers or less (PM10), particulate matter of aerodynamic radius of 2.5 micrometers or less (PM2.5), carbon monoxide (CO), nitrogen dioxide (NO2), ground-level ozone, and lead. Of these criteria pollutants, particulate matter and ground-level ozone pose the greatest threats to human health.

# State Laws, Regulations, and Policies

The California Air Resources Board (CARB) sets standards for criteria pollutants in California that are more stringent than the NAAQS and include the following additional contaminants: visibility-reducing particles, hydrogen sulfide, sulfates, and vinyl chloride. The Proposed Project is located within the Mountain Counties Air Basin, which is comprised of seven air districts: the Northern Sierra Air Quality Management District (AQMD), Placer County Air Pollution Control District (APCD), Amador County APCD, Calaveras County APCD, the Tuolumne County APCD, the Mariposa County APCD, and a portion of the El Dorado County AQMD, which consists of the western

portion of El Dorado County. The El Dorado County Air Pollution Control District manages air quality for attainment and permitting purposes within the west slope portion of El Dorado County.

USEPA and CARB regulate various stationary sources, area sources, and mobile sources. USEPA has regulations involving performance standards for specific sources that may release toxic air contaminants (TACs), known as hazardous air pollutants (HAPs) at the federal level. In addition, USEPA has regulations involving emission criteria for off-road sources such as emergency generators, construction equipment, and vehicles. CARB is responsible for setting emission standards for vehicles sold in California and for other emission sources, such as consumer products and certain off-road equipment. CARB also establishes passenger vehicle fuel specifications.

Air quality in the project area is regulated by the El Dorado County Air Quality Management District. California Air Resources Board and local air districts are responsible for overseeing stationary source emissions, approving permits, maintaining emissions inventories, maintaining air quality stations, overseeing agricultural burning permits, and reviewing air quality-related sections of environmental documents required to comply with CEQA. The AQMD regulates air quality through the federal and state Clean Air Acts, district rules, and its permit authority. National and state ambient air quality standards (AAQS) have been adopted by the Environmental Protection Agency and State of California, respectively, for each criteria pollutant: ozone, particulate matter, carbon monoxide, nitrogen dioxide, and sulfur dioxide.

The Environmental Protection Agency and State also designate regions as "attainment" (within standards) or "nonattainment" (exceeds standards) based on the ambient air quality. The County is in nonattainment status for both federal and state ozone standards and for the state PM10 standard, and is in attainment or unclassified status for other pollutants (California Air Resources Board 2013). County thresholds are included in the chart below.

Criteria Pollutant	El Dorado County Threshold	
Reactive Organic Gasses (ROG)	82 lbs/day	
Nitrogen Oxides (NOx)	82 lbs/day	
Carbon Monoxide (CO)	8-hour average: 6 parts per million (ppm)	1-hour average: 20 ppm
Particulate Matter (PM10):	Annual geometric mean: 30 µg/m3	24-hour average: 50 μg/m3
Particulate Matter (PM2.5):	Annual arithmetic mean: 15 µg/m3	24-hour average: 65 μg/m3
Ozone	8-hour average: 0.12 ppm	1-hour average: .09

The guide includes a Table (Table 5.2) listing project types with potentially significant emissions. ROG and NOx Emissions may be assumed to not be significant if:

- The project encompasses 12 acres or less of ground that is being worked at one time during construction;
- At least one of the recommended mitigation measures related to such pollutants is incorporated into the construction of the project;
- The project proponent commits to pay mitigation fees in accordance with the provisions of an established mitigation fee program in the district (or such program in another air pollution control district that is acceptable to District); or
- Daily average fuel use is less than 337 gallons per day for equipment from 1995 or earlier, or 402 gallons per day for equipment from 1996 or later

If the project meets one of the conditions above, APCD assumed that exhaust emissions of other air pollutants from the operation of equipment and vehicles are also not significant.

For Fugitive dust (PM10), if dust suppression measures will prevent visible emissions beyond the boundaries of the project, further calculations to determine PM emissions are not necessary. For the other criteria pollutants, including CO, PM10, SO2, NO2, sulfates, lead, and H2S, a project is considered to have a significant impact on air quality if it will cause or contribute significantly to a violation of the applicable national or state ambient air quality standard(s).

Naturally occurring asbestos (NOA) is also a concern in El Dorado County because it is known to be present in certain soils and can pose a health risk if released into the air. The AQMD has adopted an El Dorado County Naturally Occurring Asbestos Review Area Map that identifies those areas more likely to contain NOA (El Dorado County 2005).

**Discussion:** According to the El Dorado County Air Quality Management District (AQMD) Guide to Air Quality Assessment (2002) substantial adverse effect on air quality would occur if:

- Emissions of ROG and No<sub>x</sub> will result in construction or operation emissions greater than 82lbs/day (Table 3.2);
- Emissions of PM<sub>10</sub>, CO, SO<sub>2</sub> and No<sub>x</sub>, as a result of construction or operation emissions, will result in ambient pollutant concentrations in excess of the applicable National or State Ambient Air Quality Standard (AAQS). Special standards for ozone, CO, and visibility apply in the Lake Tahoe Air Basin portion of the County; or
- Emissions of toxic air contaminants cause cancer risk greater than 1 in 1 million (10 in 1 million if best available control technology for toxics is used) or a non-cancer Hazard Index greater than 1. In addition, the project must demonstrate compliance with all applicable District, State and U.S. EPA regulations governing toxic and hazardous emissions.

# Discussion:

A substantial adverse effect on Air Quality would occur if:

- Emissions of ROG and No<sub>x</sub>, will result in construction or operation emissions greater than 82lbs/day (See Table 5.2, of the El Dorado County Air Pollution Control District CEQA Guide);
- Emissions of PM<sub>10</sub>, CO, SO<sub>2</sub> and No<sub>x</sub>, as a result of construction or operation emissions, will result in ambient pollutant concentrations in excess of the applicable National or State Ambient Air Quality Standard (AAQS). Special standards for ozone, CO, and visibility apply in the Lake Tahoe Air Basin portion of the County; or
- Emissions of toxic air contaminants cause cancer risk greater than 1 in 1 million (10 in 1 million if best available control technology for toxics is used) or a non-cancer Hazard Index greater than 1. In addition, the project must demonstrate compliance with all applicable District, State and U.S. EPA regulations governing toxic and hazardous emissions.
- Air Ouality Plan. Air Ouality Plan: El Dorado County has adopted the Rules and Regulations of the El a. Dorado County Air Quality Management District (2000) establishing rules and standards for the reduction of stationary source air pollutants (ROG/VOC, NOx, and O3). The project would create air quality impacts that may contribute to an existing or projected air quality violation during construction. Construction activities associated with the project include grading and site improvements for utilities, driveway, monopine installation, graveling, and associated on-site activities. According to the APCD CEQA Guide, common construction activities generate emissions from the use of combustion engines (ROG, NOx, CO, Sox, PM10) from mobile heavy-duty diesel and gasoline-powered equipment, and worker commuter trips; fugitive dust (PM10) from soil disturbance or demolition; and evaporative emissions (ROG) from asphalt paving and agricultural coating applications. These activities would create short-term increases in particulate matter (PM10 and PM2.5) and would generate both reactive organic compounds (ROG) and nitrogen oxide (NOx) emissions from vehicle and equipment operation. However, the area of disturbance for this project encompasses far less than twelve acres. The site not located in an area of naturallyoccurring asbestos. The AQMD rules would apply to this project, including Rule 223 and 223.2, which regulates fugitive dust in general and during construction, to ensure that any construction related PM10 dust emissions would be reduced to acceptable levels. The temporary increase in air pollutant emissions associated with construction activities could result in contributions to cumulative pollutant levels in the region, however, compliance with standard conditions and building permit requirements would ensure that impacts are less than significant. Therefore, the potential impacts of the project would be less than significant.

- **b, c.** Air Quality Standards and Cumulative Impacts: As discussed above, the project will not result in any emissions of criteria pollutants that exceed the thresholds of significance, as determined by the APCD CEQA Guide. Additionally, El Dorado County AQMD reviewed the application materials for this project and determined that by implementing typical conditions including Rule 223 and 223.2 regarding fugitive dust, Rule 215 regarding the application of architectural coatings, and Rule 224 regarding cutback and emulsified asphalt paving materials, the project would have a less than significant impact in this category. The conditions would be implemented, reviewed, and approved by the AQMD prior to and in concurrence with the grading and building permit. Impacts would be less than significant.
- **d. Sensitive Receptors:** The CEQA Guidelines (14 CCR 15000) identify sensitive receptors as facilities that house or attract children, the elderly, people with illnesses, or others that are especially sensitive to the effects of air pollutants. Hospitals, schools, and convalescent hospitals are examples of sensitive receptors. No sources of substantial pollutant concentrations will be emitted by the wireless communications facility, and no sensitive receptors are near the proposed facility. Construction activities would be temporary, and compliance with AQMD Rules would also ensure fuguitive dust from construction activities remains within the project area or within 50 feet of disturbed areas. Impacts would be less than significant.
- e. Objectionable Odors: Construction may involve the use of gasoline or diesel-powered equipment that emits exhaust fumes. These activities would take place intermittently throughout the construction process, and persons near the construction work area may find these odors objectionable. However, the associated odors would dissipate within the immediate vicinity of the work area. The project is not in an area with a substantial number of people. Table 3-1 of the Guide to Air Quality Assessment (AQMD, 2002) does not list the proposed cellular communications facility use as a use known to create objectionable odors. The infrequency of the emissions, rapid dissipation of the exhaust into the air, and short-term nature of the construction activities would result in less than significant odor impacts.

**FINDING:** The proposed project would not affect the implementation of regional air quality regulations or management plans. The project would result in small increases in emissions due to construction and operation; however, existing regulations would reduce these impacts to a less-than-significant level. For this "Air Quality" category, as conditioned and with adherence to County Code, the proposed project would not be anticipated to cause substantial adverse effects to air quality, nor exceed established significance thresholds for air quality impacts.

IV	BIOLOGICAL RESOURCES. Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service?			X	
b.	Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, regulations, or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service?				X

c.	Have a substantial adverse effect on federally protected wetlands as defined by Section 404 of the Clean Water Act (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means?			X
d.	Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites?		X	
e.	Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?			X
f.	Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan?			X

# **Regulatory Setting:**

#### Federal Laws, Regulations, and Policies

#### Endangered Species Act

The Endangered Species Act (ESA) (16 U.S. Code [USC] Section 1531 *et seq.*; 50 Code of Federal Regulations [CFR] Parts 17 and 222) provides for conservation of species that are endangered or threatened throughout all or a substantial portion of their range, as well as protection of the habitats on which they depend. The U.S. Fish and Wildlife Service (USFWS) and the National Marine Fisheries Service (NMFS) share responsibility for implementing the ESA. In general, USFWS manages terrestrial and freshwater species, whereas NMFS manages marine and anadromous species.

Section 9 of the ESA and its implementing regulations prohibit the "take" of any fish or wildlife species listed under the ESA as endangered or threatened, unless otherwise authorized by federal regulations. The ESA defines the term "take" to mean "harass, harm, pursue, hunt, shoot, wound, kill, trap, capture, or collect, or to attempt to engage in any such conduct" (16 USC Section 1532). Section 7 of the ESA (16 USC Section 1531 *et seq.*) outlines the procedures for federal interagency cooperation to conserve federally listed species and designated critical habitats. Section 10(a)(1)(B) of the ESA provides a process by which nonfederal entities may obtain an incidental take permit from USFWS or NMFS for otherwise lawful activities that incidentally may result in "take" of endangered or threatened species, subject to specific conditions. A habitat conservation plan (HCP) must accompany an application for an incidental take permit.

#### Migratory Bird Treaty Act

The Migratory Bird Treaty Act (MBTA) (16 USC, Chapter 7, Subchapter II) protects migratory birds. Most actions that result in take, or the permanent or temporary possession of, a migratory bird constitute violations of the MBTA. The MBTA also prohibits destruction of occupied nests. USFWS is responsible for overseeing compliance with the MBTA.

# Bald and Golden Eagle Protection Act

The federal Bald and Golden Eagle Protection Act (16 U.S.C. 668-668c), first enacted in 1940, prohibits "taking" bald eagles, including their parts, nests, or eggs. The Act provides criminal penalties for persons who "take, possess, sell, purchase, barter, offer to sell, purchase or barter, transport, export or import, at any time or any manner, any bald eagle ... [or any golden eagle], alive or dead, or any part, nest, or egg thereof." The Act defines "take" as "pursue, shoot, shoot at, poison, wound, kill, capture, trap, collect, molest or disturb." The definition for "Disturb" includes injury to an eagle, a decrease in its productivity, or nest abandonment, by substantially interfering with normal breeding, feeding, or sheltering behavior. In addition to immediate impacts, this definition also covers

impacts that result from human-induced alterations initiated around a previously used nest site during a time when eagles are not present.

#### Clean Water Act

Clean Water Act (CWA) section 404 regulates the discharge of dredged and fill materials into waters of the U.S., which include all navigable waters, their tributaries, and some isolated waters, as well as some wetlands adjacent to the aforementioned waters (33 CFR Section 328.3). Areas typically not considered to be jurisdictional waters include non-tidal drainage and irrigation ditches excavated on dry land, artificially irrigated areas, artificial lakes or ponds used for irrigation or stock watering, small artificial waterbodies such as swimming pools, vernal pools, and water-filled depressions (33 CFR Part 328). Areas meeting the regulatory definition of waters of the U.S. are subject to the jurisdiction of U.S. Army Corps of Engineers (USACE) under the provisions of CWA Section 404. Construction activities involving placement of fill into jurisdictional waters of the U.S. are regulated by USACE through permit requirements. No USACE permit is effective in the absence of state water quality certification pursuant to Section 401 of CWA.

Section 401 of the CWA requires an evaluation of water quality when a proposed activity requiring a federal license or permit could result in a discharge to waters of the U.S. In California, the State Water Resources Control Board (SWRCB) and its nine Regional Water Quality Control Boards (RWQCBs) issue water quality certifications. Each RWQCB is responsible for implementing Section 401 in compliance with the CWA and its water quality control plan (also known as a Basin Plan). Applicants for a federal license or permit to conduct activities that may result in the discharge to waters of the U.S. (including wetlands or vernal pools) must also obtain a Section 401 water quality certification to ensure that any such discharge will comply with the applicable provisions of the CWA.

#### State Laws, Regulations, and Policies

#### California Fish and Game Code

The California Fish and Game Code includes various statutes that protect biological resources, including the Native Plant Protection Act of 1977 (NPPA) and the California Endangered Species Act (CESA). The NPPA (California Fish and Game Code Section 1900-1913) authorizes the Fish and Game Commission to designate plants as endangered or rare and prohibits take of any such plants, except as authorized in limited circumstances.

CESA (California Fish and Game Code Section 2050–2098) prohibits state agencies from approving a project that would jeopardize the continued existence of a species listed under CESA as endangered or threatened. Section 2080 of the California Fish and Game Code prohibits the take of any species that is state listed as endangered or threatened, or designated as a candidate for such listing. California Department of Fish and Wildlife (CDFW) may issue an incidental take permit authorizing the take of listed and candidate species if that take is incidental to an otherwise lawful activity, subject to specified conditions.

California Fish and Game Code Section 3503, 3513, and 3800 protect native and migratory birds, including their active or inactive nests and eggs, from all forms of take. In addition, Section 3511, 4700, 5050, and 5515 identify species that are fully protected from all forms of take. Section 3511 lists fully protected birds, Section 5515 lists fully protected fish, Section 4700 lists fully protected mammals, and Section 5050 lists fully protected amphibians.

#### Streambed Alteration Agreement

Sections 1601 to 1606 of the California Fish and Game Code require that a Streambed Alteration Application be submitted to CDFW for any activity that may substantially divert or obstruct the natural flow or substantially change the bed, channel, or bank of any river, stream, or lake. As a general rule, this requirement applies to any work undertaken within the 100-year floodplain of a stream or river containing fish or wildlife resources.

## California Native Plant Protection Act

The California Native Plant Protection Act (California Fish and Game Code Section 1900–1913) prohibits the taking, possessing, or sale of any plants with a state designation of rare, threatened, or endangered (as defined by CDFW). The California Native Plant Society (CNPS) maintains a list of plant species native to California that has low population numbers, limited distribution, or are otherwise threatened with extinction. This information is published in the Inventory of Rare and Endangered Plants of California (CNPS 2001). Potential impacts to populations of CNPS-listed plants receive consideration under CEQA review.

#### Forest Practice Act

Logging on private and corporate land in California is regulated by the Z'Berg-Nejedly Forest Practices Act (FPA), which took effect January 1, 1974. The act established the Forest Practice Rules (FPRs) and a politically-appointed Board of Forestry to oversee their implementation. The California Department of Forestry (CALFIRE) works under the direction of the Board of Forestry and is the lead government agency responsible for approving logging plans and for enforcing the FPRs. A Timber Harvest Plan (THP) must be prepared by a Registered Professional Forester (RPF) for timber harvest on virtually all non-federal land. The FPA also established the requirement that all non-federal forests cut in the State be regenerated with at least three hundred stems per acre on high site lands, and one hundred fifty trees per acre on low site lands.

#### Local Laws, Regulations, and Policies

The County General Plan also include policies that contain specific, enforceable requirements and/or restrictions and corresponding performance standards that address potential impacts on special-status plant species or create opportunities for habitat improvement. The El Dorado County General Plan designates the Important Biological Corridor (IBC) (Exhibits 5.12-14, 5.12-5 and 5.12-7, El Dorado County, 2003). Lands located within the overlay district are subject to the following provisions, given that they do not interfere with agricultural practices:

- Increased minimum parcel size;
- Higher canopy-retention standards and/or different mitigation standards/thresholds for oak woodlands;
- Lower thresholds for grading permits;
- Higher wetlands/riparian retention standards and/or more stringent mitigation requirements for wetland/riparian habitat loss;
- Increased riparian corridor and wetland setbacks;
- Greater protection for rare plants (e.g., no disturbance at all or disturbance only as recommended by U.S. Fish and Wildlife Service/California Department of Fish and Wildlife);
- Standards for retention of contiguous areas/large expanses of other (non-oak or non-sensitive) plant communities;
- Building permits discretionary or some other type of "site review" to ensure that canopy is retained;
- More stringent standards for lot coverage, floor area ratio (FAR), and building height; and
- No hindrances to wildlife movement (e.g., no fences that would restrict wildlife movement).

**Discussion:** A substantial adverse effect on Biological Resources would occur if the implementation of the project would:

- Substantially reduce or diminish habitat for native fish, wildlife or plants;
- Cause a fish or wildlife population to drop below self-sustaining levels;
- Threaten to eliminate a native plant or animal community;
- Reduce the number or restrict the range of a rare or endangered plant or animal;
- Substantially affect a rare or endangered species of animal or plant or the habitat of the species; or
- Interfere substantially with the movement of any resident or migratory fish or wildlife species.
- a. Special Status Species and Sensitive Natural Communities. This proposed cell tower facility would not have a substantial adverse effect, either directly or through habitat modification, on any species identified

as a candidate, sensitive, or special status species in local or regional plans, policies, and regulations or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service. The parcel is not habitat for the eight special status plants of El Dorado County, which are commonly found in the western portions of El Dorado County. Referencing the California Department of Fish and Wildlife BIOS website, no special status species are identified at the project site or within a 5 mile radius of the site. Impacts would be less than significant.

- **b, c. Riparian Habitat, Wetlands, Potentially Jurisdictional Waters of the U.S:** No riparian habitat, wetlands, or potentially jurisdictional waters of the U.S. are located on the project site. No significant impacts to wetlands or riparian habitat are anticipated by the construction and operation of the wireless communications facility at the site. There would be no impacts.
- **d. Migration Corridors.** Review of the El Dorado County *Deer Ranges Map* indicates that there are no mapped critical deer migration corridors at the project site. The project is not located within the Important Biological Corridor (IBC) General Plan Land Use Overlay. A large majority of the property will be left undeveloped, allowing for deer migration. Accordingly, the project would not substantially interfere with the movement of any native resident or migratory fish or wildlife species or with any established native resident or migratory wildlife corridors, or impede the use of wildlife nursery sites. Impacts would be less than significant.
- e. Local Biological Resources Policies: Local protection of biological resources includes the Important Biological Corridor (IBC) overlay, oak woodland preservation, rare plants, special-status species, and wetland preservation with the goal to preserve and protect sensitive natural resources within the County. The project would not conflict with any local policies or ordinances protecting biological resources, nor the provisions of an adopted Habitat Conservation Plan (HCP), Natural Community, Conservation Plan, or other approved local, regional, or state habitat conservation plan. There would be no impact.
- **f.** Adopted Plans: This project, as designed, does not conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan. There would be no impact.

**<u>FINDING</u>**: This site is not located within the USFWS Recovery Plan boundaries. No jurisdictional wetlands are present at the project site. The project proposes a relatively small footprint and no significant impacts to biological resources beyond the pre-project levels would be anticipated. Impacts would be less than significant.

V.	CULTURAL RESOURCES. Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Cause a substantial adverse change in the significance of a historical resource as defined in Section 15064.5?			X	
b.	Cause a substantial adverse change in the significance of archaeological resource pursuant to Section 15064.5?			X	
c.	Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?			X	

d.	Disturb any human remains, including those interred outside of formal cemeteries?			X	
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#### **Regulatory Setting:**

#### Federal Laws, Regulations, and Policies

## The National Register of Historic Places

The National Register of Historic Places (NRHP) is the nation's master inventory of known historic resources. The NRHP is administered by the National Park Service and includes listings of buildings, structures, sites, objects, and districts that possess historic, architectural, engineering, archaeological, or cultural significance at the national, state, or local level. The criteria for listing in the NRHP include resources that:

- A. Are associated with events that have made a significant contribution to the broad patterns of history (events);
- B. Are associated with the lives of persons significant in our past (persons);
- C. Embody the distinctive characteristics of a type, period, or method of construction, or that represent the work of a master, or that possess high artistic values, or that represent a significant and distinguishable entity whose components may lack individual distinction (architecture); or
- D. Have yielded or may likely yield information important in prehistory or history (information potential).

#### State Laws, Regulations, and Policies

#### California Register of Historical Resources

Public Resources Code Section 5024.1 establishes the California Register of Historical Resources (CRHR). The register lists all California properties considered to be significant historical resources. The CRHR includes all properties listed as or determined to be eligible for listing in the National Register of Historic Places (NRHP), including properties evaluated under Section 106 of the National Historic Preservation Act. The criteria for listing are similar to those of the NRHP. Criteria for listing in the CRHR include resources that:

- 1. Are associated with the events that have made a significant contribution to the broad patterns of California's history and cultural heritage;
- 2. Are associated with the lives of persons important in our past;
- 3. Embody the distinctive characteristics of a type, period, region, or method of construction, or represent the work of an important creative individual, or possess high artistic values; or
- 4. Have yielded, or may be likely to yield, information important in prehistory or history.

The regulations set forth the criteria for eligibility as well as guidelines for assessing historical integrity and resources that have special considerations.

#### The California Register of Historic Places

The California Register of Historic Places (CRHP) program encourages public recognition and protection of resources of architectural, historical, archeological and cultural significance, identifies historical resources for state and local planning purposes, determines eligibility for state historic preservation grant funding and affords certain protections under the California Environmental Quality Act. The criteria for listing in the CRHP include resources that:

- E. Are associated with events that have made a significant contribution to the broad patterns of local or regional history or the cultural heritage of California or the United States.
- F. Are associated with the lives of persons important to local, California or national history.
- G. Embody the distinctive characteristics of a type, period, region or method of construction or represents the work of a master or possesses high artistic values.

H. Have yielded, or have the potential to yield, information important to the prehistory or history of the local area, California or the nation.

The State Office of Historic Preservation sponsors the California Historical Resources Information System (CHRIS), a statewide system for managing information on the full range of historical resources identified in California. CHRIS provides an integrated database of site-specific archaeological and historical resources information. The State Office of Historic Preservation also maintains the CRHR, which identifies the State's architectural, historical, archeological and cultural resources. The CRHR includes properties listed in or formally determined eligible for the National Register and lists selected California Registered Historical Landmarks.

Public Resources Code (Section 5024.1[B]) states that any agency proposing a project that could potentially impact a resource listed on the CRHR must first notify the State Historic Preservation Officer, and must work with the officer to ensure that the project incorporates "prudent and feasible measures that will eliminate or mitigate the adverse effects."

California Health and Safety Code Section 7050.5 requires that, in the event of discovery or recognition of any human remains in any location other than a dedicated cemetery, there shall be no further excavation or disturbance of the site or any nearby area reasonably suspected to overlie adjacent remains until the coroner of the county in which the human remains are discovered has determined that the remains are not subject to the provisions of Section 27491 of the Government Code or any other related provisions of law concerning investigation of the circumstances, manner and cause of any death. If the coroner determines that the remains are not subject to his or her authority and if the coroner recognizes the human remains to be those of a Native American, or has reason to believe that they are those of a Native American, he or she shall contact, by telephone within 24 hours, the Native American Heritage Commission.

Section 5097.98 of the California Public Resources Code stipulates that whenever the commission receives notification of a discovery of Native American human remains from a county coroner pursuant to subdivision (c) of Section 7050.5 of the Health and Safety Code, it shall immediately notify those persons it believes to be most likely descended from the deceased Native American. The decedents may, with the permission of the owner of the land, or his or her authorized representative, inspect the site of the discovery of the Native American remains and may recommend to the owner or the person responsible for the excavation work means for treating or disposing, with appropriate dignity, the human remains and any associated grave goods. The descendants shall complete their inspection and make their recommendation within 24 hours of their notification by the Native American Heritage Commission. The recommendation may include the scientific removal and nondestructive analysis of human remains and items associated with Native American burials.

# CEQA and CEQA Guidelines

Section 21083.2 of CEQA requires that the lead agency determine whether a project may have a significant effect on unique archaeological resources. A unique archaeological resource is defined in CEQA as an archaeological artifact, object, or site about which it can be clearly demonstrated that there is a high probability that it:

- Contains information needed to answer important scientific research questions, and there is demonstrable public interest in that information;
- Has a special or particular quality, such as being the oldest of its type or the best available example of its type; or
- Is directly associated with a scientifically recognized important prehistoric or historic event or person.
- Although not specifically inclusive of paleontological resources, these criteria may also help to define "a unique paleontological resource or site."

Measures to avoid, conserve, preserve, or mitigate significant effects on these resources are also provided under CEQA Section 21083.2.

Section 15064.5 of the CEQA Guidelines notes that "a project with an effect that may cause a substantial adverse change in the significance of an historical resource is a project that may have a significant effect on the environment." Substantial adverse changes include physical changes to the historic resource or to its immediate

surroundings, such that the significance of the historic resource would be materially impaired. Lead agencies are expected to identify potentially feasible measures to mitigate significant adverse changes in the significance of an historic resource before they approve such projects. Historic resources are those that are:

- listed in, or determined to be eligible for listing in, the California Register of Historical Resources (CRHR) (Public Resources Code Section 5024.1[k]);
- included in a local register of historic resources (Public Resources Code Section 5020.1) or identified as significant in an historic resource survey meeting the requirements of Public Resources Code Section 5024.1(g); or
- determined by a lead agency to be historically significant.

CEQA Guidelines Section 15064.5 also prescribes the processes and procedures found under Health and Safety Code Section 7050.5 and Public Resources Code Section 5097.95 for addressing the existence of, or probable likelihood of, Native American human remains, as well as the unexpected discovery of any human remains within the project site. This includes consultation with the appropriate Native American tribes.

CEQA Guidelines Section 15126.4 provides further guidance about minimizing effects to historical resources through the application of mitigation measures. Mitigation measures must be legally binding and fully enforceable.

The lead agency having jurisdiction over a project is also responsible to ensure that paleontological resources are protected in compliance with CEQA and other applicable statutes. Paleontological and historical resource management is also addressed in Public Resources Code Section 5097.5, "Archaeological, Paleontological, and Historical Sites." This statute defines as a misdemeanor any unauthorized disturbance or removal of a fossil site or remains on public land and specifies that state agencies may undertake surveys, excavations, or other operations as necessary on state lands to preserve or record paleontological resources. This statute would apply to any construction or other related project impacts that would occur on state-owned or state-managed lands. The County General Plan contains policies describing specific, enforceable measures to protect cultural resources and the treatment of resources when found.

**Discussion:** In general, significant impacts are those that diminish the integrity, research potential, or other characteristics that make a historical or cultural resource significant or important. A substantial adverse effect on Cultural Resources would occur if the implementation of the project would:

- Disrupt, alter, or adversely affect a prehistoric or historic archaeological site or property that is historically or cultural significant to a community or ethnic or social group; or a paleontological site except as a part of a scientific study;
- Affect a landmark of cultural/historical importance;
- Conflict with established recreational, educational, religious or scientific uses of the area; or
- Conflict with adopted environmental plans and goals of the community where it is located.
- **a-c. Historic or Archeological Resources.** Based on the Cultural Resources Records Search, dated September 11, 2015, no prehistoric cultural resources are located within 1,450 feet of the site and no National Register of Historic Places eligible or listed structures are located within ½ mile of the site. Therefore, no known cultural resources would be affected by the proposed project and no additional cultural resource mitigation is needed. A standard condition of approval would protect any unforeseen finds during grading activities in the event of accidental discovery of historic or archeological resources. With this standard condition of approval, impacts would be less than significant.
- **d. Human Remains.** There is a very small likelihood of human remains discovery at the project site. Standard conditions of approval would be included to address accidental discovery of human remains during commercial building demolition. Impacts would be less than significant.

**<u>FINDING</u>**: No significant cultural resources have been identified on the project site. Standard conditions of approval would apply in the event of accidental discovery during project construction. This project would be anticipated to have a less than significant impact within the "Cultural Resources" category.

VI. TRIBAL CULTURAL RESOURCES. Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Cause a substantial adverse change in the significance of a Tribal Cultural Resource as defined in Section 21074?			X	

## **Regulatory Setting:**

#### Federal Laws, Regulations, and Policies

No federal laws, regulations, or policies apply to Tribal Cultural Resources (TCRs) and the Proposed Project.

#### State Laws, Regulations, and Policies

#### Assembly Bill (AB) 52

AB 52, which was approved in September 2014 and effective on July 1, 2015, requires that CEQA lead agencies consult with a California Native American tribe that is traditionally and culturally affiliated with the geographic area of a proposed project, if so requested by the tribe. The bill, chaptered in CEQA Section 21084.2, also specifies that a project with an effect that may cause a substantial adverse change in the significance of a TCR is a project that may have a significant effect on the environment.

Defined in Section 21074(a) of the Public Resources Code, TCRs are:

- 1. Sites, features, places, cultural landscapes, sacred places and objects with cultural value to a California Native American tribe that are either of the following:
  - a. Included or determined to be eligible for inclusion in the California Register of Historical Resources; or
  - b. Included in a local register of historical resources as defined in subdivision (k) of Section 5020.1.
- 2. A resource determined by the lead agency, in its discretion and supported by substantial evidence, to be significant pursuant to criteria set forth in subdivision (c) of Section 5024.1. In applying the criteria set forth in subdivision (c) of Section 5024.1 for the purposes of this paragraph, the lead agency shall consider the significance of the resource to a California Native American tribe.

TCRs are further defined under Section 21074 as follows:

- a. A cultural landscape that meets the criteria of subdivision (a) is a TCR to the extent that the landscape is geographically defined in terms of the size and scope of the landscape; and
- b. A historical resource described in Section 21084.1, a unique archaeological resource as defined in subdivision (g) of Section 21083.2, or a "nonunique archaeological resource" as defined in subdivision (h) of Section 21083.2 may also be a TCR if it conforms with the criteria of subdivision (a).

Mitigation measures for TCRs must be developed in consultation with the affected California Native American tribe pursuant to newly chaptered Section 21080.3.2, or according to Section 21084.3. Section 21084.3 identifies mitigation measures that include avoidance and preservation of TCRs and treating TRCs with culturally appropriate dignity, taking into account the tribal cultural values and meaning of the resource.

# Discussion:

In general, significant impacts are those that diminish the integrity, research potential, or other characteristics that make a TCR significant or important. To be considered a TCR, a resource must be either: (1) listed, or determined to be eligible for listing, on the national, state, or local register of historic resources, or: (2) a resource that the lead agency chooses, in its discretion, to treat as a TCR and meets the criteria for listing in the state register of historic resources pursuant to the criteria set forth in Public Resources Code Section 5024.1(c). A substantial adverse change to a TCR would occur if the implementation of the project would:

- Disrupt, alter, or adversely affect a TCR such that the significance of the resource would be materially impaired
- a. **Tribal Cultural Resources.** The project application was forwarded to those Tribes that requested review of projects in El Dorado County for consultation under AB52. No comments or correspondence were received by any of the Tribes. Further, the geographic area of the project site is not known to contain any TCRs. Impacts would be less than significant.

**<u>FINDING</u>**: No significant TCRs are known to exist on the project site. As a result, the proposed project would not cause a substantial adverse change to a TCR and impacts would be less than significant.

VI	I. GEOLOGY AND SOILS. Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Expose people or structures to potential substantial adverse effects, including the risk of loss, injury, or death involving:				
	<ul> <li>Rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault? Refer to Division of Mines and Geology Special Publication 42.</li> </ul>			X	
	ii) Strong seismic ground shaking?			X	
	iii) Seismic-related ground failure, including liquefaction?			X	
	iv) Landslides?			X	
b.	Result in substantial soil erosion or the loss of topsoil?			X	
c.	Be located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse?			X	
d.	Be located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994) creating substantial risks to life or property?			X	
e.	Have soils incapable of adequately supporting the use of septic tanks or alternative waste water disposal systems where sewers are not available for the disposal of waste water?				X

# **Regulatory Setting:**

# Federal Laws, Regulations, and Policies

#### National Earthquake Hazards Reduction Act

The National Earthquake Hazards Reduction Act of 1977 (Public Law 95-124) and creation of the National Earthquake Hazards Reduction Program (NEHRP) established a long-term earthquake risk-reduction program to better understand, predict, and mitigate risks associated with seismic events. The following four federal agencies are responsible for coordinating activities under NEHRP: USGS, National Science Foundation (NSF), Federal Emergency Management Agency (FEMA), and National Institute of Standards and Technology (NIST). Since its inception, NEHRP has shifted its focus from earthquake prediction to hazard reduction. The current program objectives (NEHRP 2009) are to:

- 1. Develop effective measures to reduce earthquake hazards;
- 2. Promote the adoption of earthquake hazard reduction activities by federal, state, and local governments; national building standards and model building code organizations; engineers; architects; building owners; and others who play a role in planning and constructing buildings, bridges, structures, and critical infrastructure or "lifelines";
- 3. Improve the basic understanding of earthquakes and their effects on people and infrastructure through interdisciplinary research involving engineering; natural sciences; and social, economic, and decision sciences; and
- 4. Develop and maintain the USGS seismic monitoring system (Advanced National Seismic System); the NSF-funded project aimed at improving materials, designs, and construction techniques (George E. Brown Jr. Network for Earthquake Engineering Simulation); and the global earthquake monitoring network (Global Seismic Network).

Implementation of NEHRP objectives is accomplished primarily through original research, publications, and recommendations and guidelines for state, regional, and local agencies in the development of plans and policies to promote safety and emergency planning.

#### State Laws, Regulations, and Policies

#### Alquist–Priolo Earthquake Fault Zoning Act

The Alquist–Priolo Earthquake Fault Zoning Act (Public Resources Code Section 2621 *et seq.*) was passed to reduce the risk to life and property from surface faulting in California. The Alquist–Priolo Act prohibits construction of most types of structures intended for human occupancy on the surface traces of active faults and strictly regulates construction in the corridors along active faults (earthquake fault zones). It also defines criteria for identifying active faults, giving legal weight to terms such as "active," and establishes a process for reviewing building proposals in and adjacent to earthquake fault zones. Under the Alquist-Priolo Act, faults are zoned and construction along or across them is strictly regulated if they are "sufficiently active" and "well defined." Before a project can be permitted, cities and counties are required to have a geologic investigation conducted to demonstrate that the proposed buildings would not be constructed across active faults.

Historical seismic activity and fault and seismic hazards mapping in the project vicinity indicate that the area has relatively low potential for seismic activity (El Dorado County 2003). No active faults have been mapped in the project area, and none of the known faults have been designated as an Alquist-Priolo Earthquake Fault Zone.

#### Seismic Hazards Mapping Act

The Seismic Hazards Mapping Act (SHMA) of 1990 (Public Resources Code Sections 2690–2699.6) establishes statewide minimum public safety standards for mitigation of earthquake hazards. While the Alquist–Priolo Act addresses surface fault rupture, the SHMA addresses other earthquake-related hazards, including strong ground shaking, liquefaction, and seismically induced landslides. Its provisions are similar in concept to those of the

Alquist–Priolo Act. The state is charged with identifying and mapping areas at risk of strong ground shaking, liquefaction, landslides, and other seismic hazards, and cities and counties are required to regulate development within mapped seismic hazard zones. In addition, the act addresses not only seismically induced hazards but also expansive soils, settlement, and slope stability.

Mapping and other information generated pursuant to the SHMA is to be made available to local governments for planning and development purposes. The State requires: (1) local governments to incorporate site-specific geotechnical hazard investigations and associated hazard mitigation, as part of the local construction permit approval process; and (2) the agent for a property seller or the seller if acting without an agent, must disclose to any prospective buyer if the property is located within a Seismic Hazard Zone. Under the SHMA, cities and counties may withhold the development permits for a site within seismic hazard zones until appropriate site-specific geologic and/or geotechnical investigations have been carried out and measures to reduce potential damage have been incorporated into the development plans.

# California Building Standards Code

Title 24 CCR, also known as the California Building Standards Code (CBC), specifies standards for geologic and seismic hazards other than surface faulting. These codes are administered and updated by the California Building Standards Commission. CBC specifies criteria for open excavation, seismic design, and load-bearing capacity directly related to construction in California.

**Discussion:** A substantial adverse effect on Geologic Resources would occur if the implementation of the project would:

- Allow substantial development of structures or features in areas susceptible to seismically induced hazards such as groundshaking, liquefaction, seiche, and/or slope failure where the risk to people and property resulting from earthquakes could not be reduced through engineering and construction measures in accordance with regulations, codes, and professional standards;
- Allow substantial development in areas subject to landslides, slope failure, erosion, subsidence, settlement, and/or expansive soils where the risk to people and property resulting from such geologic hazards could not be reduced through engineering and construction measures in accordance with regulations, codes, and professional standards; or
- Allow substantial grading and construction activities in areas of known soil instability, steep slopes, or shallow depth to bedrock where such activities could result in accelerated erosion and sedimentation or exposure of people, property, and/or wildlife to hazardous conditions (e.g., blasting) that could not be mitigated through engineering and construction measures in accordance with regulations, codes, and professional standards.

#### a. Seismic Hazards.

i) On June 10, 2016, the California Department of Conservation Division of Mines and Geology released Official Maps of Earthquake Fault Zones that included Alquist-Priolo fault zones in the Emerald Bay and Echo Lake Areas of Lake Tahoe (DOC, 2016a). The project is located in the Meyers Community Plan area, which is not within either of the fault zone areas. Impacts would be less than significant.

ii) The potential for seismic ground shaking in the project area would be considered remote for the reason stated in Section i) above. Any potential impacts due to seismic impacts would be addressed through compliance with the Uniform Building Code (UBC). All structures would be built to meet the construction standards of the UBC for the appropriate seismic zone. Impacts would be less than significant.

iii) El Dorado County is considered an area with low potential for seismic-related ground failure, including liquefaction. There are no or liquefaction zones located within the project area (DOC, 2016b). As stated in Section i) above, there are two Alquist-Priolo fault zones identified in the Lake Tahoe area. However, the project site is not located within either of those fault zones areas. Impacts would be less than significant.

iv) The project site is not located within an area subject to landslides as shown on the California Geological Survey Landslide Inventory and Mapping Program (DOC, 2016c). All grading activities would be required to comply with the El Dorado County Grading, Erosion Control and Sediment Ordinance. Impacts would be less than significant.

- **b.** Soil Erosion. According to the Soil Survey of the Tahoe Basin Area, California and Nevada, the onsite soil type is classified as Meeks gravelly loamy course sand, 0 to 5 percent slopes, stony. This soil type has a slow permeability, a low shrink-swell potential, its surface runoff is negligible, and is somewhat excessively drained. Future grading at the project site will require compliance with the El Dorado County Grading, Erosion Control and Sediment Ordinance. Therefore, impacts would be less than significant.
- c. Geologic Hazards. Based on the Seismic Hazards Mapping Program administered by the California Geological Survey, no portion of El Dorado County is located in a Seismic Hazard Zone or those areas prone to liquefaction (DOC 2016b), and the project is not located within the California Landslide Inventory (DOC 2016c). Therefore, the project site is not considered to be located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse. All grading activities would comply with the El Dorado County Grading, Erosion Control and Sediment Ordinance. Impacts would be less than significant.
- **d. Expansive Soils.** Expansive soils are those that greatly increase in volume when they absorb water and shrink when they dry out. When buildings are placed on expansive soils, foundations may rise each wet season and fall each dry season. This movement may result in cracking foundations, distortion of structures, and warping of doors and windows. The central portion of the county has a moderate expansiveness rating while the eastern and western portions have a low rating. Linear extensibility is used to determine the shrink-swell potential of soils. Pursuant to the Soil Report for El Dorado County the project site is not known to have expansive soils and has a low shrink-swell potential. No structures for human occupancy would be constructed as part of the proposed project. Prior to construction, a grading plan will be required to be approved in accordance with the El Dorado County Grading, Erosion Control and Sediment Ordinance. Impacts would be less than significant.
- e. Septic Capability. The project would not require the use or installation of a septic system. There would be no impact.

**FINDING:** A review of the soils and geologic conditions at the project site determined that the soil type is suitable for the proposed development. Any grading activities would be required to comply with the El Dorado County Grading, Erosion Control and Sediment Ordinance which would address potential impacts related to soil erosion, landslides and other geologic impacts. Development would be required to comply with UBC which would address potential seismic related impacts. For this 'Geology and Soils' category, impacts would be less than significant.

VI	II. GREENHOUSE GAS EMISSIONS. Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment?			X	
b.	Conflict with an applicable plan, policy or regulation adopted for the purpose of reducing the emissions of greenhouse gases?			X	

# **Background/Science**

Cumulative greenhouse gases (GHG) emissions are believed to contribute to an increased greenhouse effect and global climate change, which may result in sea level rise, changes in precipitation, habitat, temperature, wildfires, air pollution levels, and changes in the frequency and intensity of weather-related events. While criteria pollutants and toxic air contaminants are pollutants of regional and local concern (see Section III. Air Quality above); GHG are global pollutants. The primary land-use related GHG are carbon dioxide (CO<sub>2</sub>), methane (CH<sub>4</sub>) and nitrous oxides (N<sub>2</sub>O). The individual pollutant's ability to retain infrared radiation represents its "global warming potential" and is expressed in terms of CO<sub>2</sub> equivalents; therefore CO<sub>2</sub> is the benchmark having a global warming potential of 1. Methane has a global warming potential of 21 and thus has a 21 times greater global warming effect per metric ton of CH<sub>4</sub> than CO<sub>2</sub>. Nitrous Oxide has a global warming potential of 310. Emissions are expressed in annual metric tons of CO<sub>2</sub> equivalent units of measure (i.e., MTCO<sub>2</sub>e/yr). The three other main GHG are Hydroflourocarbons, Perflourocarbons, and Sulfur Hexaflouride. While these compounds have significantly higher global warming potentials (ranging in the thousands), all three typically are not a concern in land-use development projects and are usually only used in specific industrial processes.

# **GHG** Sources

The primary man-made source of  $CO_2$  is the burning of fossil fuels; the two largest sources being coal burning to produce electricity and petroleum burning in combustion engines. The primary sources of man-made  $CH_4$  are natural gas systems losses (during production, processing, storage, transmission and distribution), enteric fermentation (digestion from livestock) and landfill off-gassing. The primary source of man-made  $N_2O$  is agricultural soil management (fertilizers), with fossil fuel combustion a very distant second. In El Dorado County, the primary source of GHG is fossil fuel combustion mainly in the transportation sector (estimated at 70% of countywide GHG emissions). A distant second are residential sources (approximately 20%), and commercial/industrial sources are third (approximately 7%). The remaining sources are waste/landfill (approximately 3%) and agricultural (<1%).

# **Regulatory Setting:**

# Federal Laws, Regulations, and Policies

At the federal level, USEPA has developed regulations to reduce GHG emissions from motor vehicles and has developed permitting requirements for large stationary emitters of GHGs. On April 1, 2010, USEPA and the National Highway Traffic Safety Administration (NHTSA) established a program to reduce GHG emissions and improve fuel economy standards for new model year 2012-2016 cars and light trucks. On August 9, 2011, USEPA and the NHTSA announced standards to reduce GHG emissions and improve fuel efficiency for heavy-duty trucks and buses.

# Federal Laws, Regulations, and Policies

In September 2006, Governor Arnold Schwarzenegger signed Assembly Bill (AB) 32, the *California Climate Solutions Act of 2006* (Stats. 2006, ch. 488) (Health & Safety Code, Section 38500 et seq.). AB 32 requires a statewide GHG emissions reduction to 1990 levels by the year 2020. AB 32 requires the California Air Resources Board (CARB) to implement and enforce the statewide cap. When AB 32 was signed, California's annual GHG emissions were estimated at 600 million metric tons of CO<sub>2</sub> equivalent (MMTCO<sub>2</sub>e) while 1990 levels were estimated at 427 MMTCO<sub>2</sub>e. Setting 427 MMTCO<sub>2</sub>e as the emissions target for 2020, current (2006) GHG emissions levels must be reduced by 29%. CARB adopted the AB 32 Scoping Plan in December 2008 establishing various actions the state would implement to achieve this reduction (CARB, 2008). The Scoping Plan recommends a community-wide GHG reduction goal for local governments of 15%. In June 2008, the California Governor's Office of Planning and Research's (OPR) issued a Technical Advisory (OPR, 2008) providing interim guidance regarding a proposed project's GHG emissions and contribution to global climate change. In the absence of adopted local or statewide thresholds, OPR recommends the following approach for analyzing GHG emissions: Identify and quantify the project's GHG emissions, assess the significance of the impact on climate change; and if the impact is found to be significant, identify alternatives and/or Mitigation Measures that would reduce the impact to less than significant levels (CEC, 2006).

# Discussion:

CEQA does not provide clear direction on addressing climate change. It requires lead agencies identify project GHG emissions impacts and their "significance," but is not clear what constitutes a "significant" impact. As stated above, GHG impacts are inherently cumulative, and since no single project could cause global climate change, the CEQA test is if impacts are "cumulatively considerable." Not all projects emitting GHG contribute significantly to climate change. CEQA authorizes reliance on previously approved plans (i.e., a Climate Action Plan (CAP), etc.) and mitigation programs adequately analyzing and mitigating GHG emissions to a less than significant level. "Tiering" from such a programmatic-level document is the preferred method to address GHG emissions. El Dorado County does not have an adopted CAP or similar program-level document; therefore, the project's GHG emissions must be addressed at the project-level.

Unlike thresholds of significance established for criteria air pollutants in EDCAQMD's Guide to Air Quality Assessment (February 2002) ("CEQA Guide"), the District has not adopted GHG emissions thresholds for land use development projects. In the absence of County adopted thresholds, EDCAQMD recommends using the adopted thresholds of other lead agencies which are based on consistency with the goals of AB 32. Since climate change is a global problem and the location of the individual source of GHG emissions is somewhat irrelevant, it's appropriate to use thresholds established by other jurisdictions as a basis for impact significance determinations. Projects exceeding these thresholds would have a potentially significant impact and be required to mitigate those impacts to a less than significant level. Until the County adopts a CAP consistent with CEQA Guidelines Section 15183.5, and/or establishes GHG thresholds, the County will follow an interim approach to evaluating GHG emissions utilizing significance criteria adopted by the San Luis Obispo Air Pollution Control District (SLOAPCD) to determine the significance of GHG emissions.

SLOAPCD developed a screening table using CalEEMod which allows quick assessment of projects to "screen out" those below the thresholds as their impacts would be less than significant. These thresholds are summarized below:

Significance Determination Thresholds	
GHG Emission Source Category	Operational Emissions
Non-stationary Sources	1,150 MTCO <sub>2</sub> e/yr
	OR
	4.9 MT CO <sub>2</sub> e/SP/yr
Stationary Sources	10,000 MTCO <sub>2</sub> e/yr

 $\overline{SP}$  = service population, which is resident population plus employee population of the project

Projects below screening levels identified in Table 1-1 of SLOAPCD's CEQA Air Quality Handbook (pp. 1-3, SLOAPCD, 2012) are estimated to emit less than the applicable threshold. For projects below the threshold, no further GHG analysis is required.

# **Discussion**

a. The proposed project would generate GHG emissions primarily a result of facility construction in the form of construction equipment exhaust. The proposed project anticipates a construction period of approximately 45-60 days. During this time, a small net increase in GHG emissions would result from various construction activities. Construction-related GHG emissions would be associated with engine exhaust from heavy-duty construction equipment, transport trucks hauling materials, and worker commute trips. Construction-related traffic would be spread over the duration of the construction schedule and therefore, would be minimal on a daily basis. After completion of construction, all construction emissions would

cease. Operation of the facility would not require the use of water or require a substantial amount of electricity. The project would be required to incorporate modern construction and design features that reduce energy consumption to the extent feasible. Implementation of these features would help reduce potential GHG emissions resulting from the development of the proposed project. The project would generate some GHG emissions as a result of infrequent maintenance vehicle trips and back-up generator operations. According to the SLOAPCD Screening Table, the most accurate applicable screening level is 82,000 square feet for general light industry. The proposed project is a wireless telecommunications facility with a square footage of 900 square feet total lease area. Based on this equivalency, the GHG emissions from this project are estimated at less than 1,150 metric tons/year, thus, no further analysis for GHG emissions impact is required. Therefore, the proposed project would have a less than significant impact.

b. Because construction-related emissions would be temporary and below the minimum standard for reporting requirements under AB 32, the proposed project's GHG emissions would have a negligible cumulative contribution towards statewide and global GHG emissions. The proposed project would not conflict with the objectives of AB 32 or any other applicable plan, policy or regulation adopted for the purpose of reducing GHG emissions. Impacts would be less than significant.

**<u>FINDING</u>**: The project would result in less than significant impacts to GHG emissions because of the project size and inclusion of design features to address the emissions of GHG. For this "Greenhouse Gas Emissions" category, there would be no significant adverse environmental effect as a result of the project.

IX.	HAZARDS AND HAZARDOUS MATERIALS. Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials?			X	
b.	Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment?			X	
c.	Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?			X	
d.	Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment?				X
e.	For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project result in a safety hazard for people residing or working in the project area?				X
f.	For a project within the vicinity of a private airstrip, would the project result in a safety hazard for people residing or working in the project area?				X
g.	Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?				X
h.	Expose people or structures to a significant risk of loss, injury or death			X	

involving wildland fires, including where wildlands are adjacent to urbanized		
areas or where residences are intermixed with wildlands?		

#### **Regulatory Setting:**

Hazardous materials and hazardous wastes are subject to extensive federal, state, and local regulations to protect public health and the environment. These regulations provide definitions of hazardous materials; establish reporting requirements; set guidelines for handling, storage, transport, and disposal of hazardous wastes; and require health and safety provisions for workers and the public. The major federal, state, and regional agencies enforcing these regulations are USEPA and the Occupational Safety and Health Administration (OSHA); California Department of Toxic Substances Control (DTSC); California Department of Industrial Relations, Division of Occupational Safety and Health (Cal/OSHA); California Governor's Office of Emergency Services (Cal OES); and EDCAPCD.

#### Federal Laws, Regulations, and Policies

# Comprehensive Environmental Response, Compensation, and Liability Act

The Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA, also called the Superfund Act; 42 USC Section 9601 *et seq.*) is intended to protect the public and the environment from the effects of past hazardous waste disposal activities and new hazardous material spills. Under CERCLA, USEPA has the authority to seek the parties responsible for hazardous materials releases and to ensure their cooperation in site remediation. CERCLA also provides federal funding (through the "Superfund") for the remediation of hazardous materials contamination. The Superfund Amendments and Reauthorization Act of 1986 (Public Law 99-499) amends some provisions of CERCLA and provides for a Community Right-to-Know program.

#### Resource Conservation and Recovery Act

The Resource Conservation and Recovery Act of 1976 (RCRA; 42 USC Section 6901 *et seq.*), as amended by the Hazardous and Solid Waste Amendments of 1984, is the primary federal law for the regulation of solid waste and hazardous waste in the United States. These laws provide for the "cradle-to-grave" regulation of hazardous wastes, including generation, transportation, treatment, storage, and disposal. Any business, institution, or other entity that generates hazardous waste is required to identify and track its hazardous waste from the point of generation until it is recycled, reused, or disposed of.

USEPA has primary responsibility for implementing RCRA, but individual states are encouraged to seek authorization to implement some or all RCRA provisions. California received authority to implement the RCRA program in August 1992. DTSC is responsible for implementing the RCRA program in addition to California's own hazardous waste laws, which are collectively known as the Hazardous Waste Control Law.

#### Energy Policy Act of 2005

Title XV, Subtitle B of the Energy Policy Act of 2005 (the Underground Storage Tank Compliance Act of 2005) contains amendments to Subtitle I of the Solid Waste Disposal Act, the original legislation that created the Underground Storage Tank (UST) Program. As defined by law, a UST is "any one or combination of tanks, including pipes connected thereto, that is used for the storage of hazardous substances and that is substantially or totally beneath the surface of the ground." In cooperation with USEPA, SWRCB oversees the UST Program. The intent is to protect public health and safety and the environment from releases of petroleum and other hazardous substances from tanks. The four primary program elements include leak prevention (implemented by Certified Unified Program Agencies [CUPAs], described in more detail below), cleanup of leaking tanks, enforcement of UST requirements, and tank integrity testing.

# Spill Prevention, Control, and Countermeasure Rule

USEPA's Spill Prevention, Control, and Countermeasure (SPCC) Rule (40 CFR, Part 112) apply to facilities with a single above-ground storage tank (AST) with a storage capacity greater than 660 gallons, or multiple tanks with a

combined capacity greater than 1,320 gallons. The rule includes requirements for oil spill prevention, preparedness, and response to prevent oil discharges to navigable waters and adjoining shorelines. The rule requires specific facilities to prepare, amend, and implement SPCC Plans.

#### Occupational Safety and Health Administration

OSHA is responsible at the federal level for ensuring worker safety. OSHA sets federal standards for implementation of workplace training, exposure limits, and safety procedures for the handling of hazardous substances (as well as other hazards). OSHA also establishes criteria by which each state can implement its own health and safety program.

#### Federal Communications Commission Requirements

There is no federally mandated radio frequency (RF) exposure standard; however, pursuant to the Telecommunications Act of 1996 (47 USC Section 224), the Federal Communications Commission (FCC) established guidelines for dealing with RF exposure, as presented below. The exposure limits are specified in 47 CFR Section 1.1310 in terms of frequency, field strength, power density, and averaging time. Facilities and transmitters licensed and authorized by FCC must either comply with these limits or an applicant must file an environmental assessment with FCC to evaluate whether the proposed facilities could result in a significant environmental effect.

FCC has established two sets of RF radiation exposure limits—Occupational/Controlled and General Population/Uncontrolled. The less-restrictive Occupational/Controlled limit applies only when a person (worker) is exposed as a consequence of his or her employment and is "fully aware of the potential exposure and can exercise control over his or her exposure," otherwise the General Population limit applies (47 CFR Section 1.1310).

The FCC exposure limits generally apply to all FCC-licensed facilities (47 CFR Section 1.1307[b][1]). Unless exemptions apply, as a condition of obtaining a license to transmit, applicants must certify that they comply with FCC environmental rules, including those that are designed to prevent exposing persons to radiation above FCC RF limits (47 CFR Section1.1307[b]). Licensees at co-located sites (e.g., towers supporting multiple antennas, including antennas under separate ownerships) must take the necessary actions to bring the accessible areas that exceed the FCC exposure limits into compliance. This is a shared responsibility of all licensees whose transmission power density levels account for 5.0 or more percent of the applicable FCC exposure limits (47CFR 1.1307[b][3]).

# Code of Federal Regulations (14 CFR) Part 77

14 CFR Part 77.9 is designed to promote air safety and the efficient use of navigable airspace. Implementation of the code is administered by the Federal Aviation Administration (FAA). If an organization plans to sponsor any construction or alterations that might affect navigable airspace, a Notice of Proposed Construction or Alteration (FAA Form 7460-1) must be filed. The code provides specific guidance regarding FAA notification requirements. *State Laws, Regulations, and Policies* 

#### Safe Drinking Water and Toxic Enforcement Act of 1986 – Proposition 65

The Safe Drinking Water and Toxic Enforcement Act of 1986, more commonly known as Proposition 65, protects the state's drinking water sources from contamination with chemicals known to cause cancer, birth defects, or other reproductive harm. Proposition 65 also requires businesses to inform the public of exposure to such chemicals in the products they purchase, in their homes or workplaces, or that are released into the environment. In accordance with Proposition 65, the California Governor's Office publishes, at least annually, a list of such chemicals. OEHHA, an agency under the California Environmental Protection Agency (CalEPA), is the lead agency for implementation of the Proposition 65 program. Proposition 65 is enforced through the California Attorney General's Office; however, district and city attorneys and any individual acting in the public interest may also file a lawsuit against a business alleged to be in violation of Proposition 65 regulations.

# The Unified Program

The Unified Program consolidates, coordinates, and makes consistent the administrative requirements, permits, inspections, and enforcement activities of six environmental and emergency response programs. CalEPA and other state agencies set the standards for their programs, while local governments (CUPAs) implement the standards. For each county, the CUPA regulates/oversees the following:

- Hazardous materials business plans;
- California accidental release prevention plans or federal risk management plans;
- The operation of USTs and ASTs;
- Universal waste and hazardous waste generators and handlers;
- On-site hazardous waste treatment;
- Inspections, permitting, and enforcement;
- Proposition 65 reporting; and
- Emergency response.

# Hazardous Materials Business Plans

Hazardous materials business plans are required for businesses that handle hazardous materials in quantities greater than or equal to 55 gallons of a liquid, 500 pounds of a solid, or 200 cubic feet (cf) of compressed gas, or extremely hazardous substances above the threshold planning quantity (40 CFR, Part 355, Appendix A) (Cal OES, 2015). Business plans are required to include an inventory of the hazardous materials used/stored by the business, a site map, an emergency plan, and a training program for employees (Cal OES, 2015). In addition, business plan information is provided electronically to a statewide information management system, verified by the applicable CUPA, and transmitted to agencies responsible for the protection of public health and safety (i.e., local fire department, hazardous material response team, and local environmental regulatory groups) (Cal OES, 2015).

# California Occupational Safety and Health Administration

Cal/OSHA assumes primary responsibility for developing and enforcing workplace safety regulations in California. Cal/OSHA regulations pertaining to the use of hazardous materials in the workplace (CCR Title 8) include requirements for safety training, availability of safety equipment, accident and illness prevention programs, warnings about exposure to hazardous substances, and preparation of emergency action and fire prevention plans.

Hazard communication program regulations that are enforced by Cal/OSHA require workplaces to maintain procedures for identifying and labeling hazardous substances, inform workers about the hazards associated with hazardous substances and their handling, and prepare health and safety plans to protect workers at hazardous waste sites. Employers must also make material safety data sheets available to employees and document employee information and training programs. In addition, Cal/OSHA has established maximum permissible RF radiation exposure limits for workers (Title 8 CCR Section 5085[b]), and requires warning signs where RF radiation might exceed the specified limits (Title 8 CCR Section 5085 [c]).

# California Accidental Release Prevention

The purpose of the California Accidental Release Prevention (CalARP) program is to prevent accidental releases of substances that can cause serious harm to the public and the environment, to minimize the damage if releases do occur, and to satisfy community right-to-know laws. In accordance with this program, businesses that handle more than a threshold quantity of regulated substance are required to develop a risk management plan (RMP). This RMP must provide a detailed analysis of potential risk factors and associated mitigation measures that can be implemented to reduce accident potential. CUPAs implement the CalARP program through review of RMPs, facility inspections, and public access to information that is not confidential or a trade secret.

## California Department of Forestry and Fire Protection Wildland Fire Management

The Office of the State Fire Marshal and the California Department of Forestry and Fire Protection (CAL FIRE) administer state policies regarding wildland fire safety. Construction contractors must comply with the following requirements in the Public Resources Code during construction activities at any sites with forest-, brush-, or grass-covered land:

- Earthmoving and portable equipment with internal combustion engines must be equipped with a spark arrestor to reduce the potential for igniting a wildland fire (Public Resources Code Section 4442).
- Appropriate fire-suppression equipment must be maintained from April 1 to December 1, the highestdanger period for fires (Public Resources Code Section 4428).
- On days when a burning permit is required, flammable materials must be removed to a distance of 10 feet from any equipment that could produce a spark, fire, or flame, and the construction contractor must maintain the appropriate fire suppression equipment (Public Resources Code Section 4427).
- On days when a burning permit is required, portable tools powered by gasoline fueled internal combustion engines must not be used within 25 feet of any flammable materials (Public Resources Code Section 4431).

#### California Highway Patrol

CHP, along with Caltrans, enforce and monitor hazardous materials and waste transportation laws and regulations in California. These agencies determine container types used and license hazardous waste haulers for hazardous waste transportation on public roads. All motor carriers and drivers involved in transportation of hazardous materials must apply for and obtain a hazardous materials transportation license from CHP.

#### Local Laws, Regulations, and Policies

A map of the fuel loading in the County (General Plan Figure HS-1) shows the fire hazard severity classifications of the State Responsibility Areas in El Dorado County, as established by CDF. The classification system provides three classes of fire hazards: Moderate, High, and Very High. Fire Hazard Ordinance (Chapter 8.08) requires defensible space as described by the State Public Resources Code, including the incorporation and maintenance of a 30-foot fire break or vegetation fuel clearance around structures in fire hazard zones. The County's requirements on emergency access, signing and numbering, and emergency water are more stringent than those required by state law (Patton 2002). The Fire Hazard Ordinance also establishes limits on campfires, fireworks, smoking, and incinerators for all discretionary and ministerial developments.

**Discussion:** A substantial adverse effect due to hazards or hazardous materials would occur if implementation of the project would:

- Expose people and property to hazards associated with the use, storage, transport, and disposal of hazardous materials where the risk of such exposure could not be reduced through implementation of Federal, State, and local laws and regulations;
- Expose people and property to risks associated with wildland fires where such risks could not be reduced through implementation of proper fuel management techniques, buffers and landscape setbacks, structural design features, and emergency access; or
- Expose people to safety hazards as a result of former on-site mining operations.
- **a, b. Hazardous Materials:** The Federal Communication Commission (FCC) prohibits local governments from denying a wireless facility project based on concerns about the dangers of exposure to radio frequency or electromagnetic fields (EMF). This is due to inconclusive evidence about the health risk of exposure to radio frequency EMF.

The Telecommunications Act of 1996 became effective on February 8, 1996. This act preserves the authority of the State or local government over decisions regarding the placement, construction, and modifications of personal wireless services, subject to two limitations. Section 704(7)B(iii) requires any

denials to be in writing and supported by "substantial evidence." Section 704(7)B(iv) prohibits denial on the basis of radio frequency emissions if those emissions are compliant with Federal regulations.

The American National Standards Institute and the Institute of Electrical and Electronics Engineers (IEEE) have published a standard called ANSI/IEEE C95.1-1992, which until recently set recommended maximum power density levels for radio frequency (RF) energy originating from communications sites and other sources. The FCC has also produced its own guidelines, which are more stringent and supersede the ANSI standard. The FCC rules categorically exclude certain transmitting facilities from routine evaluations for compliance with the RF emission guidelines if it can be determined that it is unlikely to cause workers or the general public to become exposed to emission that exceed the guidelines. The following table represents the FCC limits for both occupational and general population exposures to different radio frequencies:

Frequency Range (F) (MHz)	Limits for Occupational Exposure (mW/cm <sup>2</sup> )*	Limits for General Public Exposure (mW/cm <sup>2</sup> )
0.3-1.34	100	100
1.34-3.0	100	$180/F^2$
3.0—30	900/F <sup>2</sup>	$180/F^2$
30-300	1.0	0.2
300-1,500	F/300	F/1500
1,500-100,000	5.0	1.0

\*mW/cm2=Milliwatt per square Centimeter

The Site Compliance Report, including the RF analysis, dated October 29, 2015 found that for a person anywhere at ground level, the maximum exposure level from the proposed Verizon operation would be less than one percent of the general public maximum permitted exposure limit (MPE) (Hammett, 2016; Attachment 7). The nearest residential structure is located approximately 200 feet east of the proposed monopine. The report validates the figures based on the FCC Regulations for measurements identifying quantitative standards for human exposure limits based on radio frequency emissions. Therefore, the risk of release of hazardous materials or emissions to the public is remote.

The project would not be anticipated to introduce, transport, store, or dispose of hazardous materials in such quantities that would create a hazard to people or the environment. The El Dorado County Environmental Management Division has conditioned the project to require a Hazardous Materials Business Plan for the storage of the reportable quantities of hazardous materials. Adherence to the Hazardous Materials Business Plan, if applicable, would ensure impacts are less than significant. The site is not located in an area of naturally occurring asbestos (El Dorado County, 2005). As such, impacts would be less than significant.

- c. Hazardous Materials Near Schools. The nearest school to the project site is the Lake Tahoe Environmental Science Magnet School, approximately 4,000 feet to the north of project site. The project will not emit hazardous emissions, but may involve the handling of reportable amounts of hazardous materials or substances. The El Dorado County Environmental Management Division has conditioned the project to require a Hazardous Materials Business Plan for the storage of the reportable quantities of hazardous materials. Adherence to the Hazardous Materials Business Plan would ensure impacts are less than significant.
- **d. Hazardous Sites.** The project site is not included on a list of hazardous materials sites pursuant to Government Code section 65962.5 (DTSC, 2015). There would be no impact with the approval of the proposed project.
- e. Aircraft Hazards. According to the El Dorado County Zoning Map, the project site is not within any airport safety zone or airport land use plan area. There would be no impact.
- **f. Private Airstrips:** The project site is not located within the vicinity of a private airport. There would be no impact.

- **g. Emergency Plan.** The proposed project consists of installation of ground equipment and a wireless telecommunications facility which would not necessitate alterations to any street and would generate less than two vehicle trips per month. The project was reviewed by the Lake Valley Fire Protection District and the Transportation Division. The project would not physically interfere with the implementation of the County adopted emergency response and/or evacuation plan for the project area. There would be no impact.
- h. Wildfire Hazards. The project site is in an area of very high hazard for wildland fire pursuant to Figure 5.8-4 of the 2004 General Plan Draft EIR. The Lake Valley Fire District has reviewed the project and has not expressed concerns about wildfire hazards. The project site is owned by and adjacent to the Lake Valley Fire Protection District fire station. There is also a fire hydrant located directly in front of the property at Keetak Street. Implementation of the fire district standards and California Building Codes would reduce the impacts of wildland fire to a less than significant level.

**FINDING:** The proposed project would not expose the area to hazards relating to the use, storage, transport, or disposal of hazardous materials. Any proposed use of hazardous materials would be subject to review and approval of a Hazardous Materials Business Plan issued by the Environmental Management Division. Further, any new structures would be subject to review and approval by the Lake Valley Fire District as part of standard building permit requirements. For this 'Hazards and Hazardous Materials' category, impacts would be less than significant.

<u>X.</u>	HYDROLOGY AND WATER QUALITY. Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Violate any water quality standards or waste discharge requirements?			X	
b.	Substantially deplete groundwater supplies or interfere substantially with groundwater recharge such that there would be a net deficit in aquifer volume or a lowering of the local groundwater table level (e.g., the production rate of pre-existing nearby wells would drop to a level which would not support existing land uses or planned uses for which permits have been granted)?				X
c.	Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river, in a manner which would result in substantial erosion or siltation on- or -off-site?			X	
d.	Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river, or substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or off-site?			X	
e.	Create or contribute runoff water which would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff?			X	
f.	Otherwise substantially degrade water quality?			X	
g.	Place housing within a 100-year flood hazard area as mapped on a federal Flood Hazard Boundary or Flood Insurance Rate Map or other flood hazard delineation map?				X
h.	Place within a 100-year flood hazard area structures which would impede or				X

	redirect flood flows?		
i.	Expose people or structures to a significant risk of loss, injury or death involving flooding, including flooding as a result of the failure of a levee or dam?		X
j.	Inundation by seiche, tsunami, or mudflow?		X

# **Regulatory Setting:**

## Federal Laws, Regulations, and Policies

#### Clean Water Act

The Clean Water Act (CWA) is the primary federal law that protects the quality of the nation's surface waters, including lakes, rivers, and coastal wetlands. The key sections pertaining to water quality regulation for the Proposed Project are CWA Section 303 and Section 402.

# Section 303(d) — Listing of Impaired Water Bodies

Under CWA Section 303(d), states are required to identify "impaired water bodies" (those not meeting established water quality standards), identify the pollutants causing the impairment, establish priority rankings for waters on the list, and develop a schedule for the development of control plans to improve water quality. USEPA then approves the State's recommended list of impaired waters or adds and/or removes waterbodies.

## Section 402—NPDES Permits for Stormwater Discharge

CWA Section 402 regulates construction-related stormwater discharges to surface waters through the NPDES, which is officially administered by USEPA. In California, USEPA has delegated its authority to the State Water Resources Control Board (SWRCB), which, in turn, delegates implementation responsibility to the nine RWQCBs, as discussed below in reference to the Porter-Cologne Water Quality Control Act.

The NPDES program provides for both general (those that cover a number of similar or related activities) and individual (activity- or project-specific) permits. General Permit for Construction Activities: Most construction projects that disturb 1.0 or more acre of land are required to obtain coverage under SWRCB's General Permit for Storm Water Discharges Associated with Construction and Land Disturbance Activities (Order 2009-0009-DWQ as amended by 2010-0014-DWQ and 2012-0006-DWQ). The general permit requires that the applicant file a public notice of intent to discharge stormwater and prepare and implement a Stormwater Pollution Prevention Plan (SWPPP). SWPPP must include a site map and a description of the proposed construction activities, demonstrate compliance with relevant local ordinances and regulations, and present a list of Best Management Practices (BMPs) that will be implemented to prevent soil erosion and protect against discharge of sediment and other construction-related pollutants to surface waters. Permittees are further required to monitor construction activities and report compliance to ensure that BMPs are correctly implemented and are effective in controlling the discharge of construction-related pollutants.

#### Municipal Stormwater Permitting Program

SWRCB regulates stormwater discharges from municipal separate storm sewer systems (MS4s) through its Municipal Storm Water Permitting Program (SWRCB, 2013). Permits are issued under two phases depending on the size of the urbanized area/municipality. Phase I MS4 permits are issued for medium (population between 100,000 and 250,000 people) and large (population of 250,000 or more people) municipalities, and are often issued to a group of co-permittees within a metropolitan area. Phase I permits have been issued since 1990. Beginning in 2003, SWRCB began issuing Phase II MS4 permits for smaller municipalities (population less than 100,000).
El Dorado County is covered under two SWRCB Regional Boards. The West Slope Phase II Municipal Separate Storm Sewer Systems (MS4) NPDES Permit is administered by the Central Valley Regional Water Quality Control Board (RWQCB) (Region Five). The Lake Tahoe Phase I MS4 NPDES Permit is administered by the Lahontan RWQCB (Region Six). The current West Slope MS4 NPDES Permit was adopted by the SWRCB on February 5, 2013. The Permit became effective on July 1, 2013 for a term of five years and focuses on the enhancement of surface water quality within high priority urbanized areas. The current Lake Tahoe MS4 NPDES Permit was adopted and took effect on December 6, 2011 for a term of five years. The Permit incorporated the Lake Tahoe Total Maximum Daily Load (TMDL) and the Lake Clarity Crediting Program (LCCP) to account for the reduction of fine sediment particles and nutrients discharged to Lake Tahoe.

On May 19, 2015 the El Dorado County Board of Supervisors formally adopted revisions to the Storm Water Quality Ordinance (Ordinance 4992). Previously applicable only to the Lake Tahoe Basin, the ordinance establishes legal authority for the entire unincorporated portion of the County. The purpose of the ordinance is to 1) protect health, safety, and general welfare, 2) enhance and protect the quality of Waters of the State by reducing pollutants in storm water discharges to the maximum extent practicable and controlling non-storm water discharges to the storm drain system, and 3) cause the use of Best Management Practices to reduce the adverse effects of polluted runoff discharges on Waters of the State.

#### National Flood Insurance Program

The Federal Emergency Management Agency (FEMA) administers the National Flood Insurance Program (NFIP) to provide subsidized flood insurance to communities complying with FEMA regulations that limit development in floodplains. The NFIP regulations permit development within special flood hazard zones provided that residential structures are raised above the base flood elevation of a 100-year flood event. Non-residential structures are required either to provide flood proofing construction techniques for that portion of structures below the 100-year flood elevation. The regulations also apply to substantial improvements of existing structures.

#### State Laws, Regulations, and Policies

#### Porter-Cologne Water Quality Control Act

The Porter–Cologne Water Quality Control Act (known as the Porter–Cologne Act), passed in 1969, dovetails with the CWA (see discussion of the CWA above). It established the SWRCB and divided the state into nine regions, each overseen by an RWQCB. SWRCB is the primary State agency responsible for protecting the quality of the state's surface water and groundwater supplies; however, much of the SWRCB's daily implementation authority is delegated to the nine RWQCBs, which are responsible for implementing CWA Sections 401, 402, and 303[d]. In general, SWRCB manages water rights and regulates statewide water quality, whereas RWQCBs focus on water quality within their respective regions.

The Porter–Cologne Act requires RWQCBs to develop water quality control plans (also known as basin plans) that designate beneficial uses of California's major surface-water bodies and groundwater basins and establish specific narrative and numerical water quality objectives for those waters. Beneficial uses represent the services and qualities of a waterbody (i.e., the reasons that the waterbody is considered valuable). Water quality objectives reflect the standards necessary to protect and support those beneficial uses. Basin plan standards are primarily implemented by regulating waste discharges so that water quality objectives are met. Under the Porter–Cologne Act, basin plans must be updated every 3 years.

**Discussion:** A substantial adverse effect on Hydrology and Water Quality would occur if the implementation of the project would:

- Expose residents to flood hazards by being located within the 100-year floodplain as defined by the Federal Emergency Management Agency;
- Cause substantial change in the rate and amount of surface runoff leaving the project site ultimately causing a substantial change in the amount of water in a stream, river or other waterway;

- Substantially interfere with groundwater recharge;
- Cause degradation of water quality (temperature, dissolved oxygen, turbidity and/or other typical stormwater pollutants) in the project area; or
- Cause degradation of groundwater quality in the vicinity of the project site.
- a. Water Quality Standards. Erosion control would be required as part of the building permit and grading permit. Adherence to County Code and the TRPA Code of Ordinances would require Best Management Practices (BMP's) to minimize degradation of water quality during demolition/construction and would not increase the level of sediment significantly above the current stormwater discharge levels. Operation of the proposed project would not involve any uses that would generate wastewater. Stormwater runoff from potential development would be directed to an engineered drainage system and would contain water quality protection features in accordance with a potential National Pollutant Discharge Elimination System (NPDES) stormwater permit, as deemed applicable. The project would not be anticipated to violate water quality standards. Impacts would be less than significant.
- **b. Groundwater Supplies.** The project is not anticipated to affect potential groundwater supplies above preproject levels. The project is of limited size and the facility will not require water use for operation. There would be no impact.
- **c-f. Drainage Patterns.** A site improvement and grading permit, as applicable, would be required through Development Services to address grading, erosion and sediment control at the lease area and access road. Project related construction activities would be required to adhere to the El Dorado County Grading, Erosion Control and Sediment Ordinance and would require TRPA approval. This includes the use of BMPs to minimize degradation of water quality during construction. Impacts would be less than significant.
- **g-j. Flood-related Hazards.** The project site is not located within any mapped 100-year flood areas and would not result in the construction of any structures that would impede or redirect flood flows (FEMA, 2008). No dams that would result in potential hazards related to dam failures are located in the project area. The risk of exposure to seiche, tsunami, or mudflows would be remote. There would be no impact.

**FINDING:** The proposed project would require a site improvement and grading permit through the Development Services Division, Building Services, and approval by TRPA, which would address any potentially applicable erosion and sediment control. No significant hydrological impacts are expected with the development of the project either directly or indirectly. For this "Hydrology" category, impacts are anticipated to be less than significant.

XI.	LAND USE PLANNING. Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Physically divide an established community?				X
b.	Conflict with any applicable land use plan, policy, or regulation of an agency with jurisdiction over the project (including, but not limited to, the general plan, specific plan, local coastal program, or zoning ordinance) adopted for the purpose of avoiding or mitigating an environmental effect?			X	
c.	Conflict with any applicable habitat conservation plan or natural community conservation plan?				X

California State law requires that each City and County adopt a general plan "for the physical development of the City and any land outside its boundaries which bears relation to its planning." Typically, a general plan is designed to address the issues facing the City or County for the next 15-20 years. The general plan expresses the community's development goals and incorporates public policies relative to the distribution of future public and private land uses. The El Dorado County General Plan was adopted in 2004. The 2013-2021 Housing Element was adopted in 2013.

**Discussion:** A substantial adverse effect on Land Use would occur if the implementation of the project would:

- Result in the conversion of Prime Farmland as defined by the State Department of Conservation;
- Result in conversion of land that either contains choice soils or which the County Agricultural Commission has identified as suitable for sustained grazing, provided that such lands were not assigned urban or other nonagricultural use in the Land Use Map;
- Result in conversion of undeveloped open space to more intensive land uses;
- Result in a use substantially incompatible with the existing surrounding land uses; or
- Conflict with adopted environmental plans, policies, and goals of the community.
- **a. Established Community.** The development of the cell tower facility in the Industrial Tract District would not result in the new roadways, land divisions, rail lines, bridges or other improvements which would physically divide an established community. There would be no impact.
- **b.** Land Use Consistency. The proposed project is consistent with the specific, fundamental, and mandatory land use development goals, objectives, and policies of the 2004 General Plan, the goals and policies of the TRPA's Code of Ordinances, and is consistent with the development standards contained within the El Dorado County Zoning Ordinance. The project proposes a cell tower facility consistent with the Tahoe Regional Plan, Plan Area Statement 125 (Meyers Community Plan) with approval of a special use permit, and the El Dorado County MCP-4 Zone District, with approval of a conditional use permit. The applicant has designed the wireless telecommunications facility in compliance with applicable regulations, addressing aesthetics and health and safety concerns. As conditioned, impacts would be less than significant.
- **c. Habitat Conservation Plan.** The proposed project is not located in an area covered by a Habitat Conservation Plan or a Natural Community Conservation Plan. There would be no impact.

**<u>FINDING</u>**: The proposed use of the land would be consistent with the County General Plan, County Zoning Ordinance, and the Meyers Community Plan with the issuance of a Conditional Use Permit. There would be no significant impact to land use goals or standards resulting from the project. As conditioned, and with adherence to County Code, no significant impacts would be expected for this "Lan Use Planning" category.

XI	I. MINERAL RESOURCES. Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the state?				X
b.	Result in the loss of availability of a locally-important mineral resource recovery site delineated on a local general plan, specific plan or other land use plan?				X

#### Federal Laws, Regulations, and Policies

No federal laws, regulations, or policies apply to mineral resources and the Proposed Project.

#### State Laws, Regulations, and Policies

#### Surface Mining and Reclamation Act

The Surface Mining and Reclamation Act of 1975 (SMARA) requires that the State Mining and Geology Board identify, map, and classify aggregate resources throughout California that contain regionally significant mineral resources. Designations of land areas are assigned by CDC and California Geological Survey following analysis of geologic reports and maps, field investigations, and using information about the locations of active sand and gravel mining operations. Local jurisdictions are required to enact planning procedures to guide mineral conservation and extraction at particular sites and to incorporate mineral resource management policies into their general plans.

The California Mineral Land Classification System represents the relationship between knowledge of mineral deposits and their economic characteristics (grade and size). The nomenclature used with the California Mineral Land Classification System is important in communicating mineral potential information in activities such as mineral land classification, and usage of these terms are incorporated into the criteria developed for assigning mineral resource zones. Lands classified MRZ-2 are areas that contain identified mineral resources. Areas classified as MRZ-2a or MRZ-2b (referred to hereafter as MRZ-2) are considered important mineral resource areas.

#### Local Laws, Regulations, and Policies

El Dorado County in general is considered a mining region capable of producing a wide variety of mineral resources. Metallic mineral deposits, including gold, are considered the most significant extractive mineral resources. Exhibit 5.9-6 shows the MRZ-2 areas within the county based on designated Mineral Resource (-MR) overlay areas. The -MR overlay areas are based on mineral resource mapping published in the mineral land classification reports referenced above. The majority of the county's important mineral resource deposits are concentrated in the western third of the county.

According to General Plan Policy 2.2.2.7, before authorizing any land uses within the -MR overlay zone that will threaten the potential to extract minerals in the affected area, the County shall prepare a statement specifying its reasons for considering approval of the proposed land use and shall provide for public and agency notice of such a statement consistent with the requirements of Public Resources Code section 2762. Furthermore, before finally approving any such proposed land use, the County shall balance the mineral values of the threatened mineral resource area against the economic, social, or other values associated with the proposed alternative land uses. Where

the affected minerals are of regional significance, the County shall consider the importance of these minerals to their market region as a whole and not just their importance to the County.

Where the affected minerals are of Statewide significance, the County shall consider the importance of these minerals to the State and Nation as a whole. The County may approve the alternative land use if it determines that the benefits of such uses outweigh the potential or certain loss of the affected mineral resources in the affected regional, Statewide, or national market.

**Discussion:** A substantial adverse effect on Mineral Resources would occur if the implementation of the project would:

- Result in obstruction of access to, and extraction of mineral resources classified MRZ-2x, or result in land use compatibility conflicts with mineral extraction operations.
- **a, b. Mineral Resources:** The project site has not been delineated as an Important Mineral Resource Area (El Dorado County, 2003). There would be no impact.

**<u>FINDING</u>**: No impacts to energy and mineral resources are expected with the development of the wireless telecommunications facility. For this "Mineral Resources" category, there would be no impacts.

XI	I. NOISE. Would the project result in:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Exposure of persons to or generation of noise levels in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies?			X	
b.	Exposure of persons to or generation of excessive groundborne vibration or groundborne noise levels?			X	
c.	A substantial permanent increase in ambient noise levels in the project vicinity above levels existing without the project?			X	
d.	A substantial temporary or periodic increase in ambient noise levels in the project vicinity above levels existing without the project?			X	
e.	For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project expose people residing or working in the project area to excessive noise level?				X
f.	For a project within the vicinity of a private airstrip, would the project expose people residing or working in the project area to excessive noise levels?				X

#### **Regulatory Setting:**

No federal or state laws, regulations, or policies for construction-related noise and vibration that apply to the Proposed Project. However, the Federal Transit Administration (FTA) Guidelines for Construction Vibration in Transit Noise and Vibration Impact Assessment state that for evaluating daytime construction noise impacts in

outdoor areas, a noise threshold of 90 dBA Leq and 100 dBA Leq should be used for residential and commercial/industrial areas, respectively (FTA 2006).

For construction vibration impacts, the FTA guidelines use an annoyance threshold of 80 VdB for infrequent events (fewer than 30 vibration events per day) and a damage threshold of 0.12 inches per second (in/sec) PPV for buildings susceptible to vibration damage (FTA 2006).

#### Discussion:

A substantial adverse effect due to Noise would occur if the implementation of the project would:

- Result in short-term construction noise that creates noise exposures to surrounding noise sensitive land uses in excess of 60dBA CNEL;
- Result in long-term operational noise that creates noise exposures in excess of 60 dBA CNEL at the adjoining property line of a noise sensitive land use and the background noise level is increased by 3dBA, or more; or
- Results in noise levels inconsistent with the performance standards contained in Table 6-1 and Table 6-2 in the El Dorado County General Plan.
- **a.** Noise Exposures: The proposed project will not expose people to noise levels in excess of standards established in the General Plan or Zoning Ordinance. Short-term construction-related noise would be required to comply with grading and construction permitting requirements and the noise performance standards contained in the General Plan. Noise would also result from the operation of the two air conditioning units attached to the equipment shelter. These air conditioning units are on the west side of the shelter furthest away and directed away from the residences to the east. The project does not include a back-up generator. According to Table 130.37.060.1 and 130.37.060.2 in the El Dorado County Zoning Ordinance, non-transportation noise in Rural Regions is limited to a time-averaged level of 50dB during the day (7 a.m. to 7 p.m.), 45 dB in the evening (7 p.m. to 10 p.m.) and 40 dB at night (10 p.m. to 7 a.m.) at a point 100 feet away from the nearest off-site sensitive receptor. The noise levels for the air conditioning units would be below 40.0 dB at 100 feet from the off-site residence. The noise produced as a result of this project would comply with the standards in the General Plan and Zoning Ordinance and would be less than significant.
- **b. Groundborne Shaking:** The project may generate ground borne vibration or shaking events during project construction, which is anticipated to take approximately 45-60 days. These potential impacts would be limited to project construction. Impacts are anticipated to be less than significant.
- c. Permanent Noise Increase. Routine maintenance visits would occur approximately once or twice a month. The vehicle noise from the addition of the maintenance visit(s) would not be measurable and would not exceed the noise standards contained in the County General Plan and Zoning Ordinance. The project would include intermittent operation of air conditioning units that would not exceed the noise standards contained in the County General Plan and Zoning Ordinance. Impacts would be considered less than significant.
- e, f. Aircraft Noise. The site is located more than two miles from the South Lake Tahoe Airport. The project site is not located within an airport land use plan area and would an unmanned facility, except for during routine maintenance. The project would not expose people residing or working in the project area to excessive noise levels. There would be no impact.

**<u>FINDING</u>**: As conditioned, and with adherence to County Code, no significant direct or indirect impacts to noise levels are expected with the development of the wireless telecommunications facility. For this "Noise" category, the thresholds of significance would not be exceeded.

<u>X</u> [	V. POPULATION AND HOUSING. Would the project:	Potentially Significant Impact	Less Than Significant With Mittgation Incorporated	Less Than Significant Impact	No Impact
a.	Induce substantial population growth in an area, either directly (i.e., by proposing new homes and businesses) or indirectly (i.e., through extension of roads or other infrastructure)?				X
b.	Displace substantial numbers of existing housing, necessitating the construction of replacement housing elsewhere?				X
c.	Displace substantial numbers of people, necessitating the construction of replacement housing elsewhere?				X

No federal or state laws, regulations, or policies apply to population and housing and the Proposed Project.

**Discussion:** A substantial adverse effect on Population and Housing would occur if the implementation of the project would:

- Create substantial growth or concentration in population;
- Create a more substantial imbalance in the County's current jobs to housing ratio; or
- Conflict with adopted goals and policies set forth in applicable planning documents.
- a-c. **Population Growth, Housing Displacement, and Replacement Housing:** The proposed project will not produce any housing, employment areas, roads or other infrastructure. The facility will require monthly maintenance. No housing or people would be displaced as a result of the proposed project. Therefore, there would be no impact to Population and Housing.

**<u>FINDING</u>**: The project would not displace housing. There would be no potential for a significant impact due to substantial growth with the communications facility either directly or indirectly. For this "Population and Housing" category, the thresholds of significance would not be anticipated to be exceeded.

<b>XV. PUBLIC SERVICES.</b> Would the project result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, need for new or physically altered governmental facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times or other performance objectives for any of the public services:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Fire protection?			X	
b. Police protection?				X
c. Schools?				X
d. Parks?				X

e.	Other government services?		X

## Federal Laws, Regulations, and Policies

## California Fire Code

The California Fire Code (Title 24 CCR, Part 9) establishes minimum requirements to safeguard public health, safety, and general welfare from the hazards of fire, explosion, or dangerous conditions in new and existing buildings. Chapter 33 of CCR contains requirements for fire safety during construction and demolition.

**Discussion:** A substantial adverse effect on Public Services would occur if the implementation of the project would:

- Substantially increase or expand the demand for fire protection and emergency medical services without increasing staffing and equipment to meet the Department's/District's goal of 1.5 firefighters per 1,000 residents and 2 firefighters per 1,000 residents, respectively;
- Substantially increase or expand the demand for public law enforcement protection without increasing staffing and equipment to maintain the Sheriff's Department goal of one sworn officer per 1,000 residents;
- Substantially increase the public school student population exceeding current school capacity without also including provisions to adequately accommodate the increased demand in services;
- Place a demand for library services in excess of available resources;
- Substantially increase the local population without dedicating a minimum of 5 acres of developed parklands for every 1,000 residents; or
- Be inconsistent with County adopted goals, objectives or policies.
- **a. Fire Protection.** The Lake Valley Fire Protection District provides structural fire protection to the project site. The cell tower facility is located adjacent to the Lake Valley Fire Protection District fire station and the lease area is on the District's property. There is a fire hydrant located directly in front of the lease area along Keetak Street. Therefore, the cell tower facility will not significantly impact fire protection services. Impacts would be less than significant.
- **b. Police Protection.** Police services would continue to be provided by the El Dorado County Sheriff's Department. Due to the size and scope of the project and the fact that no additional permanent residents would result from this project, the demand for additional police protection would not be required. There would be no impact.
- **c-e.** Schools, Parks and Government Services: There are no components of operating the proposed project that would include any permanent population-related increases that would substantially contribute to increased demand on schools, parks, or other governmental services that could, in turn, result in the need for new or expanded facilities. There would be no impact.

**<u>FINDING</u>**: As discussed above, there would be no significant impacts to public services as a result of a wireless communication facility. For this "Public Services" category, impacts are anticipated to be less than significant.

XV	<b>1. RECREATION.</b> Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility would occur or be accelerated?				X
b.	Include recreational facilities or require the construction or expansion of recreational facilities which might have an adverse physical effect on the environment?				X

#### National Trails System

The National Trails System Act of 1968 authorized The National Trails System (NTS) in order to provide additional outdoor recreation opportunities and to promote the preservation of access to the outdoor areas and historic resources of the nation. The Appalachian and Pacific Crest National Scenic Trails were the first two components, and the System has grown to include 20 national trails.

The National Trails System includes four classes of trails:

- 1. National Scenic Trails (NST) provide outdoor recreation and the conservation and enjoyment of significant scenic, historic, natural, or cultural qualities. The Pacific Coast Trail falls under this category. The PCT passes through the Desolation Wilderness area along the western plan area boundary.
- 2. National Historic Trails (NHT) follow travel routes of national historic significance. The National Park Service has designated two National Historic Trail (NHT) alignments that pass through El Dorado County, the California National Historic Trail and the Pony Express National Historic Trail. The California Historic Trail is a route of approximately 5,700 miles including multiple routes and cutoffs, extending from Independence and Saint Joseph, Missouri, and Council Bluffs, Iowa, to various points in California and Oregon. The Pony Express NHT commemorates the route used to relay mail via horseback from Missouri to California before the advent of the telegraph.
- 3. National Recreation Trails (NRT) are in, or reasonably accessible to, urban areas on federal, state, or private lands. In El Dorado County there are 5 NRTs.

#### State Laws, Regulations, and Policies

#### The California Parklands Act

The California Parklands Act of 1980 (Public Resources Code Section 5096.141-5096.143) recognizes the public interest for the state to acquire, develop, and restore areas for recreation and to aid local governments to do the same. The California Parklands Act also identifies the necessity of local agencies to exercise vigilance to see that the parks, recreation areas, and recreational facilities they now have are not lost to other uses.

The California state legislature approved the California Recreational Trail Act of 1974 (Public Resources Code Section 2070-5077.8) requiring that the Department of Parks and Recreation prepare a comprehensive plan for California trails. The California Recreational Trails Plan is produced for all California agencies and recreation providers that manage trails. The Plan includes information on the benefits of trails, how to acquire funding, effective stewardship, and how to encourage cooperation among different trail users.

The 1975 Quimby Act (California Government Code Section 66477) requires residential subdivision developers to help mitigate the impacts of property improvements by requiring them to set aside land, donate conservation easements, or pay fees for park improvements. The Quimby Act gave authority for passage of land dedication ordinances to cities and counties for parkland dedication or in-lieu fees paid to the local jurisdiction. Quimby exactions must be roughly proportional and closely tied (nexus) to a project's impacts as identified through traffic studies required by CEQA. The exactions only apply to the acquisition of new parkland; they do not apply to the physical development of new park facilities or associated operations and maintenance costs.

The County implements the Quimby Act through section120.12.090 of the County Code. The County Code sets standards for the acquisition of land for parks and recreational purposes, or payments of fees in lieu thereof, on any land subdivision. Other projects, such as ministerial residential or commercial development, could contribute to the demand for park and recreation facilities without providing land or funding for such facilities.

#### Local Laws, Regulations, and Policies

The 2004 El Dorado County General Plan Parks and Recreation Element establishes goals and policies that address needs for the provision and maintenance of parks and recreation facilities in the County, with a focus on providing recreational opportunities and facilities on a regional scale, securing adequate funding sources, and increasing tourism and recreation-based businesses. The Recreation Element describes the need for 1.5 acres of regional parkland, 1.5 acres of community parkland, and 2 acres of neighborhood parkland per 1,000 residents. Another 95 acres of park land are needed to meet the General Plan guidelines.

**Discussion:** A substantial adverse effect on Recreational Resources would occur if the implementation of the project would:

- Substantially increase the local population without dedicating a minimum of 5 acres of developed parklands for every 1,000 residents; or
- Substantially increase the use of neighborhood or regional parks in the area such that substantial physical deterioration of the facility would occur.
- **a, b. Parks and Recreational Services:** The project does not include any increase in permanent population that would contribute to increased demand on recreation facilities or contribute to increased use of existing facilities. There would be no impact.

**<u>FINDING</u>**: As discussed above, there would be no significant impacts to this "Recreation" catagory as a result of the construction and operation of a wireless communication facility.

XV	II. TRANSPORTATION/TRAFFIC. Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Conflict with an applicable plan, ordinance or policy establishing measures of effectiveness for the performance of the circulation system, taking into account all modes of transportation including mass transit and non-motorized travel and relevant components of the circulation system, including but not limited to intersections, streets, highways and freeways, pedestrian and bicycle paths, and mass transit?			X	
b.	Conflict with an applicable congestion management program, including, but not limited to level of service standards and travel demand measures, or other standards established by the county congestion management agency for designated roads or highways?				X
c.	Result in a change in air traffic patterns, including either an increase in traffic levels or a change in location that results in substantial safety risks?				X
d.	Substantially increase hazards due to a design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)?				X
e.	Result in inadequate emergency access?				X
f.	Conflict with adopted policies, plans, or programs regarding public transit, bicycle, or pedestrian facilities, or otherwise decrease the performance or safety of such facilities?				X

#### Federal Laws, Regulations, and Policies

No federal laws, regulations, or policies apply to transportation/traffic and the Proposed Project.

#### State Laws, Regulations, and Policies

Caltrans manages the state highway system and ramp interchange intersections. This state agency is also responsible for highway, bridge, and rail transportation planning, construction, and maintenance.

#### Local Laws, Regulations, and Policies

According to the transportation element of the County General Plan, Level of Service (LOS) for County-maintained roads and state highways within the unincorporated areas of the county shall not be worse than LOS E in the Community Regions or LOS D in the Rural Centers and Rural Regions. Level of Service is defined in the latest edition of the Highway Capacity Manual (Transportation Research Board, National Research Council). There are some roadway segments that are excepted from these standards and are allowed to operate at LOS F, although none of these are located in the project area. According to Policy TC-Xe, "worsen" is defined as any of the following number of project trips using a road facility at the time of issuance of a use and occupancy permit for the development project:

A. A two percent increase in traffic during a.m., p.m. peak hour, or daily;

- B. The addition of 100 or more daily trips; or
- C. The addition of 10 or more trips during the a.m. or p.m. peak hour.

**Discussion:** The Transportation and Circulation Policies contained in the County General Plan establish a framework for review of thresholds of significance and identification of potential impacts of new development on the County's road system. These policies are enforced by the application of the Transportation Impact Study (TIS) Guidelines, the County Design and Improvements Standards Manual, and the County Encroachment Ordinance, with review of individual development projects by the Transportation and Long Range Planning Divisions of the Community Development Agency. A substantial adverse effect on Traffic would occur if the implementation of the project would:

- Result in an increase in traffic, which is substantial in relation to the existing traffic load and capacity of the street system;
- Generate traffic volumes which cause violations of adopted level of service standards (project and cumulative); or
- Result in, or worsen, Level of Service (LOS) F traffic congestion during weekday, peak-hour periods on any highway, road, interchange or intersection in the unincorporated areas of the county as a result of a residential development project of 5 or more units.
- **a. Traffic Increases:** No substantial traffic increases would result from the proposed project, as the only added trips would result from monthly maintenance visits. Comments concerning the proposed facility were received from the Transportation Division and do not indicate that the LOS would be significantly impacted by the proposed project. Access to the site would be from an existing driveway on the adjacent fire station property for construction and from a 6-foot access easement from Keetak Street for maintenance. This application is consistent with the June 7, 2016 voter-approved ballot Measure E because the project will not cause traffic to reach LOS F during peak hours. Additionally, Measure E applies to residential development projects of five or more units or parcels, and S15-0014 is a conditional use permit for a commercial wireless telecommunications facility. Impacts would be less than significant.
- **b.** Levels of Service Standards: The LOS established by the County would not be exceeded by the project, nor would the surrounding road circulation system be impacted. There would be no impact.
- c. Air Traffic: The site is located more than two miles from the South Lake Tahoe Airport. The 100-foot height (105-foot with extending branches) is similar to some of the trees in the area and would not create an air traffic hazard. There would be no impact.
- **d. Design Hazards:** The design and location of the project is not anticipated to create any significant hazards. The Transportation Division analysis identified no issues for the project and all applicable recommended conditions of approval have been incorporated into the permit approval. There would be no impact.
- e. Emergency Access: The project would not result in inadequate emergency access as the facility would be located on Lake Valley Fire District property and adjacent to the existing fire station. The project was reviewed by the Transportation Division and the Lake Valley Fire Protection District to ensure that adequate access would be provided to meet County Fire Safe requirements and County Design Improvement Standards Manual criteria. No comments were provided that identified any issues with emergency access to the site and the wireless facility. There would be no impact.
- **f.** Alternative Transportation: The project would not conflict with adopted plans, polices or programs relating to alternative transportation. There would be no impact.

**<u>FINDING</u>**: As discussed above, no significant traffic impacts are expected with the wireless telecommunications facility either directly or indirectly. For this Transportation/Traffic category, the thresholds of significance would not be exceeded and impacts are anticipated to be less than significant.

XV	<b>III. UTILITIES AND SERVICE SYSTEMS.</b> Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Exceed wastewater treatment requirements of the applicable Regional Water Quality Control Board?				X
b.	Require or result in the construction of new water or wastewater treatment facilities or expansion of existing facilities, the construction of which could cause significant environmental effects?				X
c.	Require or result in the construction of new stormwater drainage facilities or expansion of existing facilities, the construction of which could cause significant environmental effects?			X	
d.	Have sufficient water supplies available to serve the project from existing entitlements and resources, or are new or expanded entitlements needed?				X
e.	Result in a determination by the wastewater treatment provider which serves or may serve the project that it has adequate capacity to serve the project's projected demand in addition to the provider's existing commitments?				X
f.	Be served by a landfill with sufficient permitted capacity to accommodate the project's solid waste disposal needs?				X
g.	Comply with federal, state, and local statutes and regulations related to solid waste?				X

#### Federal Laws, Regulations, and Policies

#### Energy Policy Act of 2005

The Energy Policy Act of 2005, intended to reduce reliance on fossil fuels, provides loan guarantees or tax credits for entities that develop or use fuel-efficient and/or energy efficient technologies (USEPA, 2014). The act also increases the amount of biofuel that must be mixed with gasoline sold in the United States (USEPA, 2014).

#### State Laws, Regulations, and Policies

#### California Integrated Waste Management Act of 1989

The California Integrated Waste Management Act of 1989 (Public Resources Code, Division 30) requires all California cities and counties to implement programs to reduce, recycle, and compost wastes by at least 50 percent by 2000 (Public Resources Code Section 41780). The state, acting through the California Integrated Waste Management Board (CIWMB), determines compliance with this mandate. Per-capita disposal rates are used to determine whether a jurisdiction's efforts are meeting the intent of the act.

#### California Solid Waste Reuse and Recycling Access Act of 1991

The California Solid Waste Reuse and Recycling Access Act of 1991 (Public Resources Code Sections 42900-42911) requires that all development projects applying for building permits include adequate, accessible areas for collecting and loading recyclable materials.

#### California Integrated Energy Policy

Senate Bill 1389, passed in 2002, requires the California Energy Commission (CEC) to prepare an Integrated Energy Policy Report for the governor and legislature every 2 years (CEC 2015a). The report analyzes data and provides policy recommendations on trends and issues concerning electricity and natural gas, transportation, energy efficiency, renewable energy, and public interest energy research (CEC 2015a). The 2014 Draft Integrated Energy Policy Report Update includes policy recommendations, such as increasing investments in electric vehicle charging infrastructure at workplaces, multi-unit dwellings, and public sites (CEC 2015b).

#### Title 24–Building Energy Efficiency Standards

Title 24 Building Energy Efficiency Standards of the California Building Code are intended to ensure that building construction, system design, and installation achieve energy efficiency and preserve outdoor and indoor environmental quality (CEC 2012). The standards are updated on an approximately 3-year cycle. The 2013 standards went into effect on July 1, 2014.

#### Urban Water Management Planning Act

California Water Code Sections 10610 *et seq.* requires that all public water systems providing water for municipal purposes to more than 3,000 customers, or supplying more than 3,000 acre-feet per year (AFY), prepare an urban water management plan (UWMP).

#### Other Standards and Guidelines

#### Leadership in Energy & Environmental Design

Leadership in Energy & Environmental Design (LEED) is a green building certification program, operated by the U.S. Green Building Council (USGBC) that recognizes energy efficient and/or environmentally friendly (green) components of building design (USGBC, 2015). To receive LEED certification, a building project must satisfy prerequisites and earn points related to different aspects of green building and environmental design (USGBC, 2015). The four levels of LEED certification are related to the number of points a project earns: (1) certified (40–49 points), (2) silver (50–59 points), (3) gold (60–79 points), and (4) platinum (80+ points) (USGBC, 2015). Points or credits may be obtained for various criteria, such as indoor and outdoor water use reduction, and construction and demolition (C&D) waste management planning. Indoor water use reduction entails reducing consumption of building fixtures and fittings by at least 20% from the calculated baseline and requires all newly installed toilets, urinals, private lavatory faucets, and showerheads that are eligible for labeling to be WaterSense labeled (USGBC, 2014). Outdoor water use reduction may be achieved by showing that the landscape does not require a permanent irrigation system beyond a maximum 2.0-year establishment period, or by reducing the project's landscape water requirement by at least 30% from the calculated baseline for the site's peak watering month (USGBC, 2014). C&D waste management points may be obtained by diverting at least 50% of C&D material and three material streams, or generating less than 2.5 pounds of construction waste per square foot of the building's floor area (USGBC, 2014).

**Discussion:** A substantial adverse effect on Utilities and Service Systems would occur if the implementation of the project would:

- Breach published national, state, or local standards relating to solid waste or litter control;
- Substantially increase the demand for potable water in excess of available supplies or distribution capacity without also including provisions to adequately accommodate the increased demand, or is unable to provide an adequate on-site water supply, including treatment, storage and distribution;

- Substantially increase the demand for the public collection, treatment, and disposal of wastewater without also including provisions to adequately accommodate the increased demand, or is unable to provide for adequate on-site wastewater system; or
- Result in demand for expansion of power or telecommunications service facilities without also including provisions to adequately accommodate the increased or expanded demand.
- **a. Wastewater Requirements:** This project will have no use of water, associated plumbing, or wastewater systems. Construction and operation of the project would not involve discharges of untreated domestic wastewater that would violate water quality control board requirements. There would be no impact.
- **b. Construction of New/Expansion of Existing Wastewater Treatment Facilities:** As mentioned above, this facility would not involve the use of water or the generation of wastewater. No new or expanded wastewater treatment facilities would be required for the proposed wireless communication facility. There would be no impact.
- c. Construction of New/Expansion of Existing Stormwater Drainage Facilities: All required drainage facilities for the project would be built in conformance with the County of El Dorado Drainage Manual, as determined by Development Services standards, and comply with TRPA requirements during the grading and building permit processes. Stormwater runoff is anticipated to be minimal. Impacts would be considered less than significant.
- **d. Sufficient Water Supply:** As mentioned above, the proposed project would not require the use of water for operation of the wireless telecommunications facility, so no new entitlements would be needed. There would be no impact.
- e. Adequate Capacity: The project does not involve the treatment of wastewater for operation. There would be no need to determine whether or not there would be adequate capacity. There would be no impact.
- **f, g.** Solid Waste Disposal and Solid Waste Requirements: Operation and continued maintenance of the tower and related ground equipment would not generate solid waste or affect recycling goals. There would be no impact.

**<u>FINDING</u>**: No significant utility and service system impacts would be expected with the wireless telecommunications facility either directly or indirectly. For this "Utilities and Service Systems" category, the thresholds of significance would not be exceeded.

XI	X. MANDATORY FINDINGS OF SIGNIFICANCE. Does the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Have the potential to degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, reduce the number or restrict the range of a rare or endangered plant or animal, or eliminate important examples of the major periods of California history or prehistory?			X	
b.	Have impacts that are individually limited, but cumulatively considerable? ("Cumulatively considerable" means that the incremental effects of a project are considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects)?			X	
c.	Have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly?			X	

#### **Discussion**:

- **a.** No substantial evidence contained in the project record has been found that would indicate that this project would have the potential to significantly degrade the quality of the environment when using thresholds preestablished as benchmarks. These benchmarks are established by General Plan Policies, the Grading, Erosion, and Sediment Control Ordinance, Drainage Manual, and in Zoning Ordinance. As proposed and conditioned, and with adherence to County permit requirements, this project would not be anticipated to have the potential to substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, reduce the number or restrict the range of a rare or endangered plant or animal, or eliminate important examples of California history or pre-history. Any impacts from the project would be anticipated to be less than significant due to the design of the project and required standards that would be implemented by any required project-specific improvements on the property.
- b. The project would not involve development or changes in land use that would result in an excessive increase in population growth. Impacts due to increased demand for public services associated with the project would be offset by the payment of fees as required by service providers to extend the necessary infrastructure services. The project would not be anticipated to contribute substantially to increased traffic in the area and the project would not require an increase in the wastewater treatment capacity of the County. Due to the small size of the proposed project, types of activities proposed, and site-specific environmental conditions, which have been disclosed in the Project Description and analyzed in Items I through XVIII, there would be no significant impacts anticipated related to agriculture resources, air quality, biological resources, cultural resources, geology/soils, hazards/hazardous materials, hydrology/water quality, land use/planning, mineral resources, noise, population/housing, public services, recreation, traffic/transportation, tribal cultural resources, or utilities/service systems that would combine with similar effects such that the project's contribution would be cumulatively considerable. For these issue areas, either no impacts, or less than significant impacts would be anticipated. By conforming to the County General Plan and Zoning Ordinance regulations, TRPA requirements, as well as the inherent visual screening provided by the design of a monopine wireless communications tower and related ground equipment the visual impacts of the project would be less than significant. The cumulative contribution to the viewshed would be less than significant.

As outlined and discussed in this document, as conditioned and with compliance with County Codes, this project would be anticipated to have a less than significant project-related environmental effect which would cause substantial adverse effects on human beings, either directly or indirectly. Based on the analysis in this study, it has been determined that the project would have less than significant cumulative impacts.

c. Based on the discussion contained in this document, no potentially significant impacts to human beings are anticipated to occur with respect to potential project impacts. The project would include standard conditions of approval required for screening and buffering the ground equipment and monopine wireless communication tower with an appearance substantially consistent with the existing surrounding vegetation. Adherence to these standard conditions would be expected to reduce potential impacts to a less than significant level. As discussed in the Noise section, short term noise increases in the project area as a result of project construction and operation. Any future development of the project by any potential future carriers would require environmental review through the Conditional Use Permit revision process. As conditioned, and with adherence to County Code, impacts are anticipated to be less than significant.

## **INITIAL STUDY ATTACHMENTS**

Attachment 1	Location Map
Attachment 2	Aerial Map
Attachment 3	Site Plan, Sheet A-1
Attachment 4	Enlarged Site Plan, Sheet A-1.1
Attachment 5	South and West Elevations, Sheet A-2
Attachment 6	Visual Simulations, Monopine Tower
Attachment 7	
	VA, October 29, 2015.

#### SUPPORTING INFORMATION SOURCE LIST

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File No.S15-0014 Aerial Map

Attachment 2

0 25 50 75 100 Feet 17-0120 E 57 of 85

	108' TALL		4"FIR	18"FIR / /
	24"PINE		18"FIR	REACE
•	26' TO TATION		(E) ASPHAL	5 <sup>0</sup> / /
	FIRE S			
(E) FIRE HYDRANT	► _ `			
(E) WATER ME	TER 16"PINE	+/- 31'		
	8"PINE 47'TALL	<b>```</b>	PINE	
				$\Delta$
T.E.				(E) PORTABLE H(
ETTAK STR	EEFT			(E) JOINT UTILITY T-MOBILE TELCO
	LAND COV	APN 035-262- ERAGE CALCULATIONS (	-12 IN SQUARE FOOTA	GE)
	BASE ALLOWABLE COVERAGE	12.451		
	LAND CAPABILITY: IPES 849 BAILEY CLASS 5	<u>BASE ALLOWAB</u> 23% 25%	LE COVERAGE	
	ALL POTENTIAL COVERAGE WAS TRA TRPA FILE NO. 19960043 & 199604	ANSFERRED OFF THE PF 480 PER TRPA FILE NO	ROPERTY AS PART . LCAP2015–0398	OF
	<u>EXISTING COVERAGE:</u> FIRE HOSE DRYING RACK	1.5 1.5		
	<u>PROPOSED ON -SITE COVERAGE:</u> EQUIPMENT SHELTER CONC. STOOP CONC. MONOPINE FOUNDATION (UNDERGROUND)	200 20 529		
	PROPOSED NEW COVERAGE: TOTAL AMOUNT OF COVERAGE TO E (TRPA FILE NUMBER ERSP2016-055	749.00 BE TRANSFERRED AS P. 50) 750.5	ART OF PROJECT	
		Attach	mont 2	



	PROPOSED B.M.P. DESCRIPTION	PROPOSED TEMPORARY B.M.P. TIMING/STAGE
Â	CONTINUOUS 8" PINE NEEDLE WATTLE PLACED DOWN SLOPE FROM SITE. SEE DETAIL ER-2 SHEET C-3	AFTER CLEARING (GRUBBING) SITE SHELTER & TOWER FOUNDATIONS U PERMANENT B.M.P.'S ARE IN PLACE
B	NEW UTILITY TRENCH CONTROL	WHEN RAIN IS FORECAST COVER EX DIRT & PLACE CONTINUOUS 8" STF WATTLE DOWN SLOPE FROM TRENCH
¢	NEW 2" CLEAN CRUSHED ROCK OVER 4" ROAD BASE W/ WEED BARRIER @ SITE AROUND NEW MONOPINE	KEEP BARE DIRT DAMP.





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Photosimulation of the view looking north from the intersection of Wasabe Drive and Luther Pass Road.

Keetak Street 2211 Keetak Street S. Lake Tahoe, CA 89511 SC14544



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200 North Glebe Road, Suite 1000, Arlington, VA 22203-3728 703.276.1100 • 703.276.1169 fax info@sitesafe.com • www.sitesafe.com

# T-Mobile Site ID – SC14544B Site Name – Keetak Street Site Compliance Report

# 2223 Keetak Street South Lake Tahoe, CA 96150

Latitude: N38-50-55.90 Longitude: W120-1-08.58 Structure Type: Monopole

Report generated date: October 29, 2015 Report by: Leo Romero Customer Contact: Michelle Steffler

# T-Mobile Will Be Compliant based on FCC Rules and Regulations.

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**ATTACHMENT 7** 

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# T-Mobile Keetak Street - SC14544B Radio Frequency (RF) Site Compliance Report



2223 Keetak Street, South Lake Tahoe, CA 96150



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# 1 Executive Summary

T-Mobile has contracted with Sitesafe, Inc. (Sitesafe), an independent Radio Frequency (RF) regulatory and engineering consulting firm, to determine whether the proposed communications site, SC14544B - Keetak Street, located at 2223 Keetak Street, South Lake Tahoe, CA, is in compliance with Federal Communication Commission (FCC) Rules and Regulations for RF emissions.

This report contains a detailed summary of the RF environment at the site including:

- diagram of the site;
- inventory of the make / model of all antennas
- theoretical MPE based on modeling.

This report addresses exposure to radio frequency electromagnetic fields in accordance with the FCC Rules and Regulations for all individuals, classified in two groups, "Occupational or Controlled" and "General Public or Uncontrolled." This **site will be compliant** with the FCC rules and regulations, as described in OET Bulletin 65.

This document and the conclusions herein are based on the information provided by T-Mobile.

If you have any questions regarding RF safety and regulatory compliance, please do not hesitate to contact Sitesafe's Customer Support Department at (703) 276-1100.



# 2 Regulatory Basis

## 2.1 FCC Rules and Regulations

In 1996, the Federal Communication Commission (FCC) adopted regulations for the evaluating of the effects of RF emissions in 47 CFR § 1.1307 and 1.1310. The guideline from the FCC Office of Engineering and Technology is Bulletin 65 ("OET Bulletin 65"), Evaluating Compliance with FCC Guidelines for Human Exposure to Radio Frequency Electromagnetic Fields, Edition 97-01, published August 1997. Since 1996 the FCC periodically reviews these rules and regulations as per their congressional mandate.

FCC regulations define two separate tiers of exposure limits: Occupational or "Controlled environment" and General Public or "Uncontrolled environment". The General Public limits are generally five times more conservative or restrictive than the Occupational limit. These limits apply to accessible areas where workers or the general public may be exposed to Radio Frequency (RF) electromagnetic fields.

Occupational or Controlled limits apply in situations in which persons are exposed as a consequence of their employment and where those persons exposed have been made fully aware of the potential for exposure and can exercise control over their exposure.

An area is considered a Controlled environment when access is limited to these aware personnel. Typical criteria are restricted access (i.e. locked or alarmed doors, barriers, etc.) to the areas where antennas are located coupled with proper RF warning signage. A site with Controlled environments is evaluated with Occupational limits.

All other areas are considered Uncontrolled environments. If a site has no access controls or no RF warning signage it is evaluated with General Public limits.

The theoretical modeling of the RF electromagnetic fields has been performed in accordance with OET Bulletin 65. The Maximum Permissible Exposure (MPE) limits utilized in this analysis are outlined in the following diagram:





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Frequency Range (MHz)	Electric Field Strength (E) (V/m)	Magnetic Field Strength (H) (A/m)	Power Density (S) (mW/cm <sup>2</sup> )	Averaging Time  E  <sup>2</sup> ,  H  <sup>2</sup> or S (minutes)
0.3-3.0	614	1.63	(100)*	6
3.0-30	1842/f	4.89/f	$(900/f^2)^*$	6
30-300	61.4	0.163	1.0	6
300-1500			f/300	6
1500-	223		5	6
100,000				

#### Limits for Occupational/Controlled Exposure (MPE)

#### Limits for General Population/Uncontrolled Exposure (MPE)

Frequency Range (MHz)	Electric Field Strength (E) (V/m)	lectric Magnetic Field Field Firength (E) Strength V/m) (H) (A/m)		Averaging Time  E  <sup>2</sup> ,  H  <sup>2</sup> or S (minutes)		
0.3-1.34	614	1.63	(100)*	30		
1.34-30	824/f	2.19/f	$(180/f^2)^*$	30		
30-300	27.5	0.073	0.2	30		
300-1500			f/1500	30		
1500-			1.0	30		
100,000						
f - from	uoneu in MUs	*Diana	unun nauturale	ant nowar density		

#### f = frequency in MHz \*Plane-wave equivalent power density

#### 2.2 OSHA Statement

The General Duty clause of the OSHA Act (Section 5) outlines the occupational safety and health responsibilities of the employer and employee. The General Duty clause in Section 5 states:

(a) Each employer -

- shall furnish to each of his employees employment and a place of employment which are free from recognized hazards that are causing or are likely to cause death or serious physical harm to his employees;
- (2) shall comply with occupational safety and health standards promulgated under this Act.
- (b) Each employee shall comply with occupational safety and health standards and all rules, regulations, and orders issued pursuant to this Act which are applicable to his own actions and conduct.

OSHA has defined Radiofrequency and Microwave Radiation safety standards for workers who may enter hazardous RF areas. Regulation Standards 29 CFR § 1910.147 identify a generic Lock Out Tag Out procedure aimed to control the unexpected energization or start up of machines when maintenance or service is being performed.



# 3 Site Compliance

### 3.1 Site Compliance Statement

Upon evaluation of the cumulative RF emission levels from all operators at this site, Sitesafe has determined that:

This **site will be compliant** with the FCC rules and regulations, as described in OET Bulletin 65.

The compliance determination is based on theoretical modeling, RF signage placement recommendations, proposed antenna inventory and the level of restricted access to the antennas at the site. Any deviation from the T-Mobile's proposed deployment plan could result in the site being rendered non-compliant.

## 3.2 Actions for Site Compliance

Based on common industry practice and our understanding of FCC and OSHA requirements, this section provides a statement of recommendations for site compliance. RF alert signage recommendations have been proposed based on theoretical analysis of MPE levels. Barriers can consist of locked doors, fencing, railing, rope, chain, paint striping or tape, combined with RF alert signage.

Sitesafe found one or more issues that led to our determination. The site will be made compliant if the following changes are implemented:

#### **Monopine Access Location**

Install a 10-Step Guideline Sign per T-Mobile signage policy. Yellow caution sign required.

- T-Mobile Proposed Alpha Sector Location No action required.
- T-Mobile Proposed Beta Sector Location

No action required.

**T-Mobile Proposed Gamma Sector Location** 

No action required.

**Note:** The Max cumulative simulated Radio Frequency Exposure (RFE) on the Ground level is 0% of the general public MPE limit.



# 4 Safety Plan and Procedures

The following items are general safety recommendations that should be administered on a site by site basis as needed by the carrier.

<u>General Maintenance Work</u>: Any maintenance personnel required to work immediately in front of antennas and / or in areas indicated as above 100% of the Occupational MPE limits should coordinate with the wireless operators to disable transmitters during their work activities.

<u>Training and Qualification Verification</u>: All personnel accessing areas indicated as exceeding the General Population MPE limits should have a basic understanding of EME awareness and RF Safety procedures when working around transmitting antennas. Awareness training increases a workers understanding to potential RF exposure scenarios. Awareness can be achieved in a number of ways (e.g. videos, formal classroom lecture or internet based courses).

<u>Physical Access Control:</u> Access restrictions to transmitting antennas locations is the primary element in a site safety plan. Examples of access restrictions are as follows:

- Locked door or gate
- Alarmed door
- Locked ladder access
- Restrictive Barrier at antenna (e.g. Chain link with posted RF Sign)

**<u>RF Signage</u>**: Everyone should obey all posted signs at all times. RF signs play an important role in properly warning a worker prior to entering into a potential RF Exposure area.

Assume all antennas are active: Due to the nature of telecommunications transmissions, an antenna transmits intermittently. Always assume an antenna is transmitting. Never stop in front of an antenna. If you have to pass by an antenna, move through as quickly and safely as possible thereby reducing any exposure to a minimum.

<u>Maintain a 3 foot clearance from all antennas:</u> There is a direct correlation between the strength of an EME field and the distance from the transmitting antenna. The further away from an antenna, the lower the corresponding EME field is.

<u>Site RF Emissions Diagram</u>: Section 5 of this report contains an RF Diagram that outlines various theoretical Maximum Permissible Exposure (MPE) areas at the site. The modeling is a worst case scenario assuming a duty cycle of 100% for each transmitting antenna at full power. This analysis is based on one of two access control criteria: General Public criteria means the access to the site is uncontrolled and anyone can gain access. Occupational criteria means the access is restricted and only properly trained individuals can gain access to the antenna locations.



# 5 Analysis

## 5.1 RF Emissions Diagram

The RF diagram(s) below display theoretical spatially averaged percentage of the Maximum Permissible Exposure for all systems at the site unless otherwise noted. These diagrams use modeling as prescribed in OET Bulletin 65 and assumptions detailed in Appendix B.

The key at the bottom of each diagram indicates if percentages displayed are referenced to FCC General Population Maximum Permissible Exposure (MPE) limits. Color coding on the diagram is as follows:

- Gray represents areas predicted to be at 5% of the MPE limits, or below.
- Green represents areas predicted to be between 5% and 100% of the MPE limits.
- Blue represents areas predicted to be between 100% and 500% of the MPE limits.
- Yellow represents areas predicted to be between 500% and 5000% of the MPE limits.
- Red areas indicated predicted levels greater than 5000% of the MPE limits.

General Population diagrams are specified when an area is accessible to the public; i.e. personnel that do not meet Occupational or RF Safety trained criteria, could gain access.

If trained occupational personnel require access to areas that are delineated as **Blue** or above 100% of the limit, Sitesafe recommends that they utilize the proper personal protection equipment (RF monitors), coordinate with the carriers to reduce or shutdown power, or make real-time power density measurements with the appropriate power density meter to determine real-time MPE levels. This will allow the personnel to ensure that their work area is within exposure limits.

The key at the bottom also indicates the level or height of the modeling with respect to the main level. The origin is typically referenced to the main rooftop level, or ground level for a structure without access to the antenna level. For example:

Average from 0 feet above to 6 feet above origin

and

Average from 20 feet above to 26 feet above origin

The first indicates modeling at the main rooftop (or ground) level averaged over 6 feet. The second indicates modeling at a higher level (possibly a penthouse level) of 20 feet averaged over 6 feet.

Abbrevia	tions used in the RF Emissions Diagrams	
PH=##'	Penthouse at ## feet above main roof	

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RF Emissions Simulation For: Keetak Street Composite View



RF Emissions Simulation For: Keetak Street Elevation View







## 6 Antenna Inventory

The Antenna Inventory shows all transmitting antennas at the site. This inventory was provided by the customer, and was utilized by Sitesafe to perform theoretical modeling of RF emissions. The inventory coincides with the site diagrams in this report, identifying each antenna's location at SC14544B - Keetak Street. The antenna information collected includes the following information:

- Licensee or wireless operator name
- Frequency or frequency band
- Transmitter power Effective Radiated Power ("ERP"), or Equivalent Isotropic Radiated Power ("EIRP") in Watts
- Antenna manufacturer make, model, and gain

For other carriers at this site, the use of "Generic" as an antenna model, or "Unknown" for an operator means the information with regard to carrier, their FCC license and/or antenna information was not available nor could it be secured while on site. Equipment, antenna models and nominal transmit power were used for modeling, based on past experience with radio service providers.



The following antenna inventory, on this and the following page, were provided by the customer and were utilized to create the site model diagrams:

Table 3: Antenna Inventory												
Ant #	Operated By	TX Freq (MHz)	ERP (Watts)	Antenna Gain (dBd)	Az (Deg)	Antenna Model	Ant Type	Len (ff)	Horizontal Half Power Beamwidth (Deg)	Location		
										x	Y	Z (AGL)
1	T-MOBILE (Proposed)	1900	8834.5	18.67	321	Cellmax CMA-BDHH/6521-E0-6	Panel	6.8	65	118.3'	130.7'	82'
1	T-MOBILE (Proposed)	2100	9912.5	19.17	321	Cellmax CMA-BDHH/6521-E0-6	Panel	6.8	65	118.3'	130.7'	82'
2	T-MOBILE (Proposed)	1900	8834.5	18.67	180	Cellmax CMA-BDHH/6521-E0-6	Panel	6.8	65	123.2'	122.5'	82'
2	T-MOBILE (Proposed)	2100	9912.5	19.17	180	Cellmax CMA-BDHH/6521-E0-6	Panel	6.8	65	123.2'	122.5'	82'
3	T-MOBILE (Proposed)	1900	8834.5	18.67	230	Cellmax CMA-BDHH/6521-E0-6	Panel	6.8	65	113.9'	122.5	82'
3	T-MOBILE (Proposed)	2100	9912.5	19.17	230	Cellmax CMA-BDHH/6521-E0-6	Panel	6.8	65	113.9'	122.5'	82'

NOTE: X, Y and Z indicate relative position of the antenna to the origin location on the site, displayed in the model results diagram. Specifically, the Z reference indicates antenna height above the main site level unless otherwise indicated. ERP values provided by the client and used in the modeling may be greater than are currently deployed. For other carriers at this site the use of "Generic" as an antenna model or "Unknown" for a wireless operator means the information with regard to carrier, their FCC license and/or antenna information was not available nor could it be secured while on site. Equipment, antenna models and nominal transmit power were used for modeling, based on past experience with radio service providers.



# 7 Engineer Certification

The professional engineer whose seal appears on the cover of this document hereby certifies and affirms that:

I am registered as a Professional Engineer in the jurisdiction indicated in the professional engineering stamp on the cover of this document; and

That I am an employee of Sitesafe, Inc., in Arlington, Virginia, at which place the staff and I provide RF compliance services to clients in the wireless communications industry; and

That I am thoroughly familiar with the Rules and Regulations of the Federal Communications Commission (FCC) as well as the regulations of the Occupational Safety and Health Administration (OSHA), both in general and specifically as they apply to the FCC Guidelines for Human Exposure to Radio-frequency Radiation; and

That I have thoroughly reviewed this Site Compliance Report and believe it to be true and accurate to the best of my knowledge as assembled by and attested to by Leo Romero.

October 29, 2015



## Appendix A - Statement of Limiting Conditions

Sitesafe will not be responsible for matters of a legal nature that affect the site or property.

Due to the complexity of some wireless sites, Sitesafe performed this analysis and created this report utilizing best industry practices and due diligence. Sitesafe cannot be held accountable or responsible for anomalies or discrepancies due to actual site conditions (i.e., mislabeling of antennas or equipment, inaccessible cable runs, inaccessible antennas or equipment, etc.) or information or data supplied by T-Mobile, the site manager, or their affiliates, subcontractors or assigns.

Sitesafe has provided computer generated model(s) in this Site Compliance Report to show approximate dimensions of the site, and the model is included to assist the reader of the compliance report to visualize the site area, and to provide supporting documentation for Sitesafe's recommendations.

Sitesafe may note in the Site Compliance Report any adverse physical conditions, such as needed repairs, observed during the survey of the subject property or that Sitesafe became aware of during the normal research involved in performing this survey. Sitesafe will not be responsible for any such conditions that do exist or for any engineering or testing that might be required to discover whether such conditions exist. Because Sitesafe is not an expert in the field of mechanical engineering or building maintenance, the Site Compliance Report must not be considered a structural or physical engineering report.

Sitesafe obtained information used in this Site Compliance Report from sources that Sitesafe considers reliable and believes them to be true and correct. Sitesafe does not assume any responsibility for the accuracy of such items that were furnished by other parties. When conflicts in information occur between data provided by a second party and physical data collected by Sitesafe, the physical data will be used.



### Appendix B – Assumptions and Definitions

#### **General Model Assumptions**

In this site compliance report, it is assumed that all antennas are operating at **full power at all times**. Software modeling was performed for all transmitting antennas located on the site. Sitesafe has further assumed a 100% duty cycle and maximum radiated power.

The site has been modeled with these assumptions to show the maximum RF energy density. Sitesafe believes this to be a worst-case analysis, based on best available data. Areas modeled to predict emissions greater than 100% of the applicable MPE level may not actually occur, but are shown as a worst-case prediction that could be realized real time. Sitesafe believes these areas to be safe for entry by occupationally trained personnel utilizing appropriate personal protective equipment (in most cases, a personal monitor).

Thus, at any time, if power density measurements were made, we believe the realtime measurements would indicate levels below those depicted in the RF emission diagram(s) in this report. By modeling in this way, Sitesafe has conservatively shown exclusion areas – areas that should not be entered without the use of a personal monitor, carriers reducing power, or performing real-time measurements to indicate real-time exposure levels.

### **Use of Generic Antennas**

For the purposes of this report, the use of "Generic" as an antenna model, or "Unknown" for an operator means the information about a carrier, their FCC license and/or antenna information was not provided and could not be obtained while on site. In the event of unknown information, Sitesafe will use our industry specific knowledge of equipment, antenna models, and transmit power to model the site. If more specific information can be obtained for the unknown measurement criteria, Sitesafe recommends remodeling of the site utilizing the more complete and accurate data. Information about similar facilities is used when the service is identified and associated with a particular antenna. If no information is available regarding the transmitting service associated with an unidentified antenna, using the antenna manufacturer's published data regarding the antenna's physical characteristics makes more conservative assumptions.

Where the frequency is unknown, Sitesafe uses the closest frequency in the antenna's range that corresponds to the highest Maximum Permissible Exposure (MPE), resulting in a conservative analysis.



### Definitions

5% Rule – The rules adopted by the FCC specify that, in general, at multiple transmitter sites actions necessary to bring the area into compliance with the guidelines are the shared responsibility of all licensees whose transmitters produce field strengths or power density levels at the area in question in excess of 5% of the exposure limits. In other words, any wireless operator that contributes 5% or greater of the MPE limit in an area that is identified to be greater than 100% of the MPE limit is responsible taking corrective actions to bring the site into compliance.

**Compliance** – The determination of whether a site is safe or not with regards to Human Exposure to Radio Frequency Radiation from transmitting antennas.

Decibel (dB) - A unit for measuring power or strength of a signal.

**Duty Cycle** – The percent of pulse duration to the pulse period of a periodic pulse train. Also, may be a measure of the temporal transmission characteristic of an intermittently transmitting RF source such as a paging antenna by dividing average transmission duration by the average period for transmission. A duty cycle of 100% corresponds to continuous operation.

*Effective (or Equivalent) Isotropic Radiated Power (EIRP)* – The product of the power supplied to the antenna and the antenna gain in a given direction relative to an isotropic antenna.

*Effective Radiated Power (ERP)* – In a given direction, the relative gain of a transmitting antenna with respect to the maximum directivity of a half wave dipole multiplied by the net power accepted by the antenna from the connecting transmitter.

Gain (of an antenna) – The ratio of the maximum intensity in a given direction to the maximum radiation in the same direction from an isotropic radiator. Gain is a measure of the relative efficiency of a directional antennas as compared to an omni directional antenna.

General Population/Uncontrolled Environment – Defined by the FCC, as an area where RFR exposure may occur to persons who are **unaware** of the potential for exposure and who have no control of their exposure. General Population is also referenced as General Public.

Generic Antenna – For the purposes of this report, the use of "Generic" as an antenna model means the antenna information was not provided and could not be obtained while on site. In the event of unknown information, Sitesafe will use our industry specific knowledge of antenna models to select a worst case scenario antenna to model the site.

*Isotropic Antenna* – An antenna that is completely non-directional. In other words, an antenna that radiates energy equally in all directions.

Maximum Measurement – This measurement represents the single largest measurement recorded when performing a spatial average measurement.



Maximum Permissible Exposure (MPE) – The rms and peak electric and magnetic field strength, their squares, or the plane-wave equivalent power densities associated with these fields to which a person may be exposed without harmful effect and with acceptable safety factor.

**Occupational/Controlled Environment** – Defined by the FCC, as an area where Radio Frequency Radiation (RFR) exposure may occur to persons who are **aware** of the potential for exposure as a condition of employment or specific activity and can exercise control over their exposure.

**OET Bulletin 65** – Technical guideline developed by the FCC's Office of Engineering and Technology to determine the impact of Radio Frequency radiation on Humans. The guideline was published in August 1997.

**OSHA (Occupational Safety and Health Administration)** – Under the Occupational Safety and Health Act of 1970, employers are responsible for providing a safe and healthy workplace for their employees. OSHA's role is to promote the safety and health of America's working men and women by setting and enforcing standards; providing training, outreach and education; establishing partnerships; and encouraging continual process improvement in workplace safety and health. For more information, visit <u>www.osha.gov</u>.

**Radio Frequency Radiation** – Electromagnetic waves that are propagated from antennas through space.

**Spatial Average Measurement** – A technique used to average a minimum of ten (10) measurements taken in a ten (10) second interval from zero (0) to six (6) feet. This measurement is intended to model the average energy an average sized human body will absorb while present in an electromagnetic field of energy.

Transmitter Power Output (TPO) – The radio frequency output power of a transmitter's final radio frequency stage as measured at the output terminal while connected to a load.



## Appendix C - Rules & Regulations

### **Explanation of Applicable Rules and Regulations**

The FCC has set forth guidelines in OET Bulletin 65 for human exposure to radio frequency electromagnetic fields. Specific regulations regarding this topic are listed in Part 1, Subpart I, of Title 47 in the Code of Federal Regulations. Currently, there are two different levels of MPE - General Public MPE and Occupational MPE. An individual classified as Occupational can be defined as an individual who has received appropriate RF training and meets the conditions outlined below. General Public is defined as anyone who does not meet the conditions of being Occupational. FCC and OSHA Rules and Regulations define compliance in terms of total exposure to total RF energy, regardless of location of or proximity to the sources of energy.

It is the responsibility of all licensees to ensure these guidelines are maintained at all times. It is the ongoing responsibility of all licensees composing the site to maintain ongoing compliance with FCC rules and regulations. Individual licensees that contribute less than 5% MPE to any total area out of compliance are not responsible for corrective actions.

OSHA has adopted and enforces the FCC's exposure guidelines. A building owner or site manager can use this report as part of an overall RF Health and Safety Policy. It is important for building owners/site managers to identify areas in excess of the General Population MPE and ensure that only persons qualified as Occupational are granted access to those areas.

#### **Occupational Environment Explained**

The FCC definition of Occupational exposure limits apply to persons who:

- are exposed to RF energy as a consequence of their employment;
- have been made aware of the possibility of exposure; and
- can exercise control over their exposure.

OSHA guidelines go further to state that persons must complete RF Safety Awareness training and must be trained in the use of appropriate personal protective equipment.

In order to consider this site an Occupational Environment, the site must be controlled to prevent access by any individuals classified as the General Public. Compliance is also maintained when any non-occupational individuals (the General Public) are prevented from accessing areas indicated as Red or Yellow in the attached RF Emissions diagram. In addition, a person must be aware of the RF environment into which they are entering. This can be accomplished by an RF Safety Awareness class, and by appropriate written documentation such as this Site Compliance Report.

All T-Mobile employees who require access to this site must complete RF Safety Awareness training and must be trained in the use of appropriate personal protective equipment.



## Appendix D - General Safety Recommendations

The following are general recommendations appropriate for any site with accessible areas in excess of 100% General Public MPE. These recommendations are not specific to this site. These are safety recommendations appropriate for typical site management, building management, and other tenant operations.

1. All individuals needing access to the main site (or the area indicated to be in excess of General Public MPE) should wear a personal RF Exposure monitor, successfully complete proper RF Safety Awareness training, and have and be trained in the use of appropriate personal protective equipment.

2. All individuals needing access to the main site should be instructed to read and obey all posted placards and signs.

3. The site should be routinely inspected and this or similar report updated with the addition of any antennas or upon any changes to the RF environment including:

- adding new antennas that may have been located on the site
- removing of any existing antennas
- changes in the radiating power or number of RF emitters

4. Post the appropriate **NOTICE**, **CAUTION**, or **WARNING** sign at the main site access point(s) and other locations as required. Note: Please refer to RF Exposure Diagrams in Appendix B, to inform <u>everyone</u> who has access to this site that beyond posted signs there may be levels in excess of the limits prescribed by the FCC. The signs below are examples of signs meeting FCC guidelines.



5. Ensure that the site door remains locked (or appropriately controlled) to deny access to the general public if deemed as policy by the building/site owner.

6. For a General Public environment the four color levels identified in this analysis can be interpreted in the following manner:

- Gray represents area at below 5% of the General Public MPE limits or below. This level is safe for a worker to be in at any time.
- Green represents areas predicted to be between 5% and 100% of the General Public MPE limits. This level is safe for a worker to be in at any time.



- Blue represents areas predicted to be between 100% and 500% of the General Public MPE limits. This level is safe for a worker to be in at any time.
- Yellow represents areas predicted to be between 500% and 5000% of the General Public MPE limits. This level is safe for a worker to be in.
- Red areas indicated predicted levels greater than 5000% of the General Public MPE limits. This level is not safe for the General Public to be in.

7. For an Occupational environment the four color levels identified in this analysis can be interpreted in the following manner:

- Areas indicated as Gray are at 5% of the Occupational MPE limits or below. This level is safe for a worker to be in at any time.
- Green represents areas predicted to be between 5% and 20% of the Occupational MPE limits. This level is safe for a worker to be in at any time.
- Yellow represents areas predicted to be between 20% and 100% of the Occupational MPE limits. Only individuals that have been properly trained in RF Health and Safety should be allowed to work in this area. This is not an area that is suitable for the General Public to be in.
- Red areas indicated predicted levels greater than 100% of the Occupational MPE limits. This level is not safe for the Occupational worker to be in for prolonged periods of time. Special procedures must be adhered to such as lock out tag out procedures to minimize the workers exposure to EME.

8. Use of a Personal Protective Monitor: When working around antennas, Sitesafe strong recommends the use of a Personal Protective Monitor (PPM). Wearing a PPM will properly forewarn the individual prior to entering an RF exposure area.

Keep a copy of this report available for all persons who must access the site. They should read this report and be aware of the potential hazards with regards to RF and MPE limits.

### Additional Information

Additional RF information is available by visiting both www.Sitesafe.com and www.fcc.gov/oet/rfsafety. OSHA has additional information available at: http://www.osha-slc.gov/SLTC/radiofrequencyradiation.