National Telecommunications and Information Administration
Broadband Technology Opportunities Program
Finding of No Significant Impact
Los Angeles Regional Interoperable Communication System Joint Powers Authority
LA-RICS Long Term Evolution Project

REVISED - September 2015

Summary

The National Telecommunications Information Administration (NTIA) is issuing this revised Finding of No Significant Impact (FONSI) to reflect project changes resulting from proposed resumption of construction at project site LAPDPAC, 12312 Culver Blvd, Los Angeles, CA, which evaluated in the Final LA-RICS LTE System Environmental Assessment (Final EA), dated October 14, 2014. This FONSI is effective as of September 2, 2015, and supersedes the Revised FONSI issued August 11, 2015.

The Los Angeles Regional Interoperable Communication System Joint Powers Authority (LA-RICS) applied to the Broadband Technology Opportunities Program (BTOP) for a grant to construct a 700 MHz Long Term Evolution (LTE) wireless broadband communications network, consisting of 231 existing telecommunication sites. After completion of the Final EA on October 14, 2014 and issuance of the original FONSI on October 15, 2014, LA-RICS was notified of community concerns regarding the placement of proposed LTE equipment at several sites, which resulted in the passage of a motion on March 24, 2015 by the Los Angeles County Board of Supervisors suspending LA-RICS LTE construction at Los Angeles County Fire Department sites. Following the Board of Supervisors action, the Los Angeles City Council voted on April 1, 2015, to suspend construction at all Los Angeles Fire Department (LAFD) and Los Angeles Police Department (LAPD) sites. As a result of these actions, the BTOP grant was suspended between April 3, 2015 and May 1, 2015, during which NTIA directed LA-RICS to cease project installation work immediately, re-design the LTE system for review by NTIA in consultation with Federal agencies, and develop a Supplemental EA of the proposed project changes. In July 2015, LA-RICS completed Supplemental Environmental Assessment #1 (SEA1) based on the revised project changes for nine new LTE sites and NTIA issued a Revised FONSI on July 10, 2015. In August 2015, LA-RICS developed SEA2 to address the remaining network sites included in the project re-design.

In a letter dated July 15, 2015, the Los Angeles Police Department (LAPD) asked LA-RICS to complete construction of site LAPDPAC, which was a partly constructed component of the original project design evaluated in the October 14, 2015 Final EA, and for which construction was stopped following the BTOP grant suspension.

The final re-design of the proposed LTE network includes 83 LTE sites (vs. the original 231 LTE site design), all of which were previously analyzed in the Final EA, SEA1, or SEA2.

The Revised LTE network will consist of 83 existing telecommunication sites. New monopole structures and associated infrastructure will be installed at 30 LTE sites. Antenna structures will

be placed on existing buildings at 10 sites. The remaining 27 collocation sites will have antennas installed on existing towers. On a site-by-site basis, existing equipment (including existing towers) at these 68 LTE sites will be considered for use to minimize project costs and potential environmental impacts. In addition, 15 cell on wheels (COW) LTE sites will be established throughout Los Angeles County. The new wireless network will provide broadband services for mission-critical communications to support emergency services in Los Angeles County and allow for interoperability among local, State, and Federal entities. The network will be located wholly within Los Angeles County, with exception of one site straddling the boundary between Los Angeles and San Bernardino counties (LTE Site Claremont Microwave Tower [CLM]). The Revised Project is still referred to as the LA-RICS Long Term Evolution Project (Project).

The National Telecommunications and Information Administration (NTIA) awarded this grant through BTOP, as part of the American Recovery and Reinvestment Act (ARRA). The funding must be obligated and the Project completed within three years. This timeline will comply with the laws and regulations governing the use of this ARRA grant funding.

BTOP supports the deployment of broadband infrastructure in unserved and underserved areas of the United States and its Territories. As a condition of receiving BTOP grant funding, recipients must comply with all relevant Federal legislation, including the National Environmental Policy Act of 1969 (NEPA). Specifically, NEPA limits the types of actions that the grantee can initiate prior to completing required environmental reviews. Some actions may be categorically excluded from further NEPA analyses based on the specific types and scope of work to be conducted. For projects that are not categorically excluded from further environmental review, the grant recipient must prepare an Environmental Assessment (EA) that meets the requirements of NEPA. After a sufficiency review, NTIA may adopt the EA, use it as the basis for finding that the Project will not have a significant impact on the environment, and issue a FONSI. Following such a finding, the BTOP grant recipient may then begin construction or other activities identified in the EA, in accordance with any special protocols or identified environmental protection measures.

The Revised Project includes:

- Installing a new monopole tower, broadband radio base station (known as eNodeB), network and backhaul equipment, antennas and cabling, and an emergency backup power generator at 31 "non-collocation" sites;
- Installing new antenna structures onto existing buildings, a new outdoor equipment cabinet, cabling, and a backup generator at 10 other "non-collocation" sites;
- Installing eNodeB equipment, network and backhaul equipment, antennas and cabling, and an emergency backup power generator at 28 "collocation sites," which have existing tower structures;
- On a site-by-site basis, possibly utilizing existing space and existing equipment (including existing towers) at the 68 LTE sites rather than installing new equipment and/or towers;

- Installing underground conduit for sites where a monopole tower is proposed to provide electrical wiring and communications cable pathway between the outdoor system components (i.e., the equipment cabinets and the emergency generator) and the nearest utility supply on site premises, and between the monopole and the equipment cabinets; and
- Establishing 15 COW sites, which will consist of a trailer (33-foot long by 22-foot wide) containing a new 70-foot monopole tower (plus up to 15-foot lightening rod), network and backhaul equipment, antennas and cabling, equipment cabinets, and an emergency backup power generator. The COW sites also may include trenching for power cable placement, wall and fence construction, and placement of grounding equipment.

An EA for the Project was completed by LA-RICS in October 2014, SEA1 was finalized in July 2015, and SEA2 was finalized in August 2015. Based on a review of the analysis in the EA and supplemental documentation, NTIA has determined that the Project, implemented in accordance with the preferred alternative and programmatic agreement (PA), and incorporating best management practices (BMPs), construction management requirements (CMRs), and mitigation measures (MM), will not result in any significant environmental impacts. Therefore, the preparation of an EIS is not required. The basis for this determination is described in this Revised FONSI, which is effective September 2, 2015.

Additional information and copies of the Executive Summary of the EA and FONSI are available to all interested persons and the public through the BTOP website (www2.ntia.doc.gov) and the following contact:

Frank J. Monteferrante, Ph.D.
Environmental Compliance Specialist
Broadband Technology Opportunities Program
National Telecommunications and Information Administration
U.S. Department of Commerce
H.C. Hoover Bldg. Room 4827
1401 Constitution Avenue, NW
Washington, DC 20230
Tel. 202-482-4208
Fax 202-501-8009
Email: FMonteferrante@ntia.doc.gov

Purpose and Need

The purpose of this Project is to provide dedicated broadband communication capability and capacity to improve public safety services throughout Los Angeles County. Public safety entities in the Los Angeles region currently use commercial telecommunications services (e.g., cellular phones). These are typically available on a first-come-first-serve basis, without priority to public

safety entities, which can become unavailable during large-scale incidents. Additionally many of the local public safety agencies use aging systems, making interagency communication a challenge. The LA-RICS project will provide a system that offers a high degree of reliability when needed most by emergency response providers.

Project Description

LA-RICS will construct a wireless broadband network by using 83 existing publicly owned or administered safety facilities or communications sites, currently developed for use in emergency services and/or as communications structures. Los Angeles County and other county/city public services agencies own or administer 82 of the 83 sites. The remaining site (Lost Hills Malibu Sheriff's Station [LHS]) is located within the Santa Monica Mountains National Recreation Area (SMMNRA) in the city of Calabasas and overseen by the National Park Service (NPS).

For all of the proposed sites, LA-RICS will enter into agreements for lease, special use, right-of-way agreements, or outgrant with the site owners/administrators before beginning construction. No permanent acquisition or change of ownership will be required at any site.

New self-supporting monopoles will be installed at 31 non-collocation and 15 COW LTE sites. Heights of the new monopoles will range from 45 feet to 70 feet above ground level. Maximum diameter of the base of the monopoles will be 7 feet. Lightning rods up to 15-feet long will be affixed to the apex of each new monopole, resulting in a maximum tower height of 85 feet above ground level. Soil excavation for installation of the monopoles at the non-collocation sites will be approximately 7 feet in diameter and up to 36 feet deep. For the COW sites, the monopoles will be mounted on a trailer that would be towed to the site and placed permanently on paved or previously disturbed areas.

Depending on local jurisdiction and LTE site owner requirements, some monopoles will be disguised as palm trees, pine trees, flagpoles, or hose towers, or incorporated into architectural elements. Disguises would be designed in coordination with LA-RICS and local jurisdictions, as well as Federal and State land administrators. Each LTE site will be equipped with up to four lockable equipment cabinets, used to house the eNodeB and backhaul equipment, network equipment, and backup batteries. The cabinets will be mounted on 12-inch concrete pads, measuring 18 feet by 9 feet. In addition, the LTE sites will be equipped with a 35kW diesel generator installed at ground level on a 12-inch thick concrete pad, measuring 12 feet by 6 feet. If site space is available, the equipment cabinets can be collocated with emergency generators on concrete pads up to 234 square feet.

For the COW LTE sites, the equipment cabinet and backup generator will be contained on the trailer. Each COW site would require up to 150 feet of new fencing or concrete masonry wall to enclose the equipment. A grounding ring, consisting of a copper metal rod directly buried or placed in conduit within a trench surrounding each COW trailer; or a grounding rod, consisting

of copper conductor pounded into the soil; would be installed. Trenching of up to 500 feet for power or fiber acquisition is also anticipated at each site.

At 10 LTE sites, antenna structures will be mounted on rooftops, parapet, or walls of existing buildings. The antenna structures will be up to 34 feet tall (including a 15-foot lightning rod, if one does not already exist) above existing rooflines. An outdoor equipment cabinet will be mounted on the roof near the antennas. Ground disturbance for ancillary equipment and other appurtenances (e.g., generators) at sites with roof- or wall-mounted antenna installation will be similar to that described for monopole sites.

The remaining 27 sites are the "collocation" facilities, which are existing towers with capacities to hold new LTE antenna equipment. These sites will receive eNodeB equipment, network and backhaul equipment, antennas and cabling, and an emergency backup power. Existing buildings will be used to house the equipment cabinets indoors and existing generator equipment will be used for backup power. There will be no ground disturbance at the colocation facilities. Table 1-1 summarizes the construction to occur under this Revised Project at the 83 LTE sites.

LA-RICS will install new antennas on new monopoles, existing towers, and existing buildings, in accordance with applicable Federal Communications Commission (FCC) regulations and industry standards. Each LTE site is currently served by utility-provided power, and the LTE equipment will remain connected to existing power grids using existing utility infrastructure. LA-RICS will coordinate with site owners and administrators if electrical upgrades are required at any LTE site.

Table 1-1. Revised LA-RICS Project Summary for the 83 LTE Sites

LA-RICS Project Site Name	Project Summary	Primary Proposed Structure	Supporting Infrastructure	Power or Communication Trenching	Ground Disturbance (sq. ft.)
LASDCVS	One new monopole, LTE (eNodeB) radio base station and fiber / microwave backhaul, and backup power generator	45-foot free-standing monopole tower plus 15-foot lightning rod (maximum height 60 feet above ground level)	Tower foundation, 6 to 12 new broadband panel antennas, 2 to 8 new microwave backhaul antennas, equipment cabinets, emergency backup power generator with integrated sub-base fuel tank, security fencing and lighting, alarms, and signage	300 feet long x 2 feet wide	3,600

LA-RICS Project Site Name	Project Summary	Primary Proposed Structure	Supporting Infrastructure	Power or Communication Trenching	Ground Disturbance (sq. ft.)
ARCPD01, AZPD001, BMT, CEN, CPTFD04, ELMNTPD, LAPDDVN, LAPDHWD, LAPDNHD, LAPDNWT, LAPDPAC, LAPDWIL, LAPP001, LASDALD, LASDCSN, LASDIDT, LASDLKD, LASDLNX, LASDNWK, LASDPRV, LASDSCV, LASDTEM, LDWP243, MLM, ONK, SEP, SWP, VEFD001, VEFD003, WHD	30 new monopoles, LTE (eNodeB) radio base stations with fiber / microwave backhaul, and backup power generators	70-foot free-standing monopole tower plus 15-foot lightning rod (maximum height 85 feet above ground level)	Tower foundation, 6 to 12 new broadband panel antennas, 2 to 8 new microwave backhaul antennas, equipment cabinets, emergency backup power generator with integrated sub-base fuel tank, security fencing and lighting, alarms, and signage	100 to 500 feet long x 2 feet wide	3,600
BURPD01, LAPD077, LAPDVNS, LBPDHQ, PASDNPD, RANCHO	Collocation of new telecommunication equipment on and in 6 existing buildings, including LTE (eNodeB) radio base stations with fiber / microwave backhaul, and backup power generators	Building or roof-mount	6 to 12 new broadband panel antennas, 2 to 8 new microwave backhaul antennas, equipment cabinets, emergency backup power generator, security fencing (for new ground-based infrastructure) and lighting, alarms, and signage	100 to 500 feet long x 2 feet wide	1,000-3,600
CCT, LACHAR, LACOLV, LACUSC	Collocation of new telecommunication equipment on and in 4 existing buildings, including LTE (eNodeB) radio base stations with fiber / microwave backhaul (no backup power generators proposed for these sites)	Building or roof-mount	6 to 12 new broadband panel antennas, 2 to 8 new microwave backhaul antennas, equipment cabinets, security fencing (for new ground-based infrastructure) and lighting, alarms, and signage	100 to 500 feet long x 2 feet wide	500-1500

LA-RICS Project Site Name	Project Summary	Primary Proposed Structure	Supporting Infrastructure	Power or Communication Trenching	Ground Disturbance (sq. ft.)
CLM, FCCF, FS5, GARD001, LAN, LAPDFTH, LAPDHLB, LAPDMIS, LAPDNED, LAPDOLY, LAPDRAM, LAPDTOP, LAPDWLA, LAPDWVD, LASDNCC, LASDSDM, LBECOC, LBFD012(N), LHS, MOR, PASA001, PHN, PLM, SDW, SLA, VPC, WAL	Collocation of new telecommunication equipment on and in 27 existing towers, including LTE (eNodeB) radio base stations with fiber / microwave backhaul, and backup power generators	Existing tower	6 to 12 new broadband panel antennas, 2 to 8 new microwave backhaul antennas, equipment cabinets, emergency backup power generator with integrated sub-base fuel tank, security fencing and lighting, alarms, and signage	100 to 500 feet long x 2 feet wide	3,600
LASDMVS, CHPWVLLY, LADPW38, BLR2DPW, CHPNWHLL, SCECART, SCELGNBL, SCELNIDO, SCELONG, SCEMAD, SCEMERC, SCEMESA, SCEMNRV, SCEMRGO, SCESTUD	15 COW sites, including a trailer containing new monopole tower, LTE (eNodeB) radio base stations with fiber / microwave backhaul, and backup power generators	COW with 70-foot monopole tower plus 15-foot lightning rod (maximum height 85 feet above ground level)	Trailer (33-feet long by 22-feet wide) with monopole, up to 12 new broadband panel antennas, 2 to 8 new microwave backhaul antennas, equipment cabinets, emergency backup power generator	100 to 500 feet long x 2 feet wide	1,300

For sites where a monopole tower is proposed, underground conduit will be installed in a trench measuring 2 feet wide by 3 feet deep to provide electrical wiring and communications cable pathway between the outdoor system components and the nearest utility supply on site premises, and between the monopole and the equipment cabinets. Trenching will not exceed 500 feet at any LTE site and will occur only in previously disturbed or developed designated work areas. For sites where antennas are proposed to be mounted on a rooftop penthouse or to be mounted to the parapet or wall of an existing building, electric connection will be made via electrical metallic conduits surface-mounted to the roof or through existing cable pathways in the building.

Construction at all LA-RICS LTE sites will comply with the applicable building codes and property owner requirements. At Federally owned sites, permits with accompanying construction drawings will be submitted for review and approval by the appropriate Federal land manager/administrator.

Ground disturbance will be less than the 3,600 square feet required at each site, to install LTE system equipment, monopole towers, ancillary components, and cables. All excavation work will be completed within existing property boundaries. Where feasible, excavated earth will be used as backfill – excess material will be removed from the site for proper disposal. Total potential ground disturbance for the Project (83 LTE sites combined) is approximately than 6.5 acres. No new disturbance will occur for storage of equipment or material at any site. No road improvements or construction are planned.

Alternatives

The EA includes an analysis of the alternatives for implementing the Project to meet the purpose and need. NTIA also requires that an EA include a discussion of the no action alternative. The following summarizes the alternatives analyzed in the EA.

Preferred Alternative. This alternative involves construction of a wireless broadband network by using 83 existing publicly owned or administered safety facilities or communications sites, currently developed for use in emergency services and/or as communications structures. New monopole towers, along with supporting infrastructure, will be installed at 31 non-collocation sites. At 10 additional non-collocation sites, new antenna structures, including supporting infrastructure, will be installed onto existing buildings. In addition, LA-RICS will install eNodeB equipment, network and backhaul equipment, antennas and cabling at 27 collocation sites with existing tower structures. On a site-by-site basis during final design, existing space and existing equipment (including existing towers) may be utilized at the 83 LTE sites rather than installing new equipment and/or towers. Also installed at each site would be outdoor system components (i.e., the equipment cabinets and the emergency generator) and conduits for cable connections. Furthermore, 15 COW LTE sites will be established throughout Los Angeles County. Each COW LTE site will consist of a 33-foot long by 22-foot wide trailer containing a new monopole tower, network and backhaul equipment, antennas and cabling, equipment cabinets, and an emergency backup power generator. Trenching for power, wall and fence construction, and placement of grounding equipment may be required.

No Action Alternative. No action was also considered. This alternative represents conditions as they currently exist in the Project area. Under the no action alternative, the emergency broadband network would not be constructed and the public service agencies within Los Angeles County would continue to rely upon a variety of existing technologies and radio frequency spectra, limiting their ability to communicate with each other during routine activities or emergency incidents. The EA examined this alternative as a baseline for evaluating impacts relative to other alternatives being considered.

Alternatives Considered But Not Carried Forward. In addition to the Preferred Alternative, LA-RICS considered three alternatives: collocation for all 83 sites, an all-buried network, and an aerial network. The collocation alternative required that sufficient tower and associated

infrastructure be available at hundreds of publicly-owned sites throughout the county, and the sites could not be sold, transferred, or abandoned so that continued operation by the LTE system would be secured. This alternative was not carried forward as there was insufficient available infrastructure and, of the available infrastructure, access and security of the LTE equipment could not be guaranteed. The all-buried alternative would require extensive acquisition of easements and/or right-of-way throughout Los Angeles County, which would increase the complexity of and time required for installation. Potentially significant trenching and blasting associated with buried cable installation may also result in environmental impacts in rural and urban areas. Therefore, it was determined that the buried cable alternative would not be a viable alternative. Installation of an all-aerial network was found to be infeasible due to limited capacity on existing poles and towers, the need to install additional utility poles in areas where they currently do not exist, and costs of system-wide installation and ongoing maintenance of aerial cable. Based on these assessments, only the Preferred Alternative and the No Action Alternative were retained for full evaluation in the EA.

Findings and Conclusions

The EA analyzed existing conditions and environmental consequences of the preferred alternative and the no action alternative in 11 major resource areas, including Noise, Air Quality and Greenhouse Gases, Geology and Soils, Water Resources, Biological Resources, Historic and Cultural Resources, Aesthetic and Visual Resources, Land Use, Infrastructure, Socioeconomic Resources, and Human Health and Safety. Cumulative impacts were also evaluated.

Noise

This Project will have short-term impacts on noise due to the use of machinery, such as jackhammers and pile drivers. However, this noise will be restricted to the construction phase of the Project and there are few sensitive noise receptors along the proposed route. In urban areas, where installation and construction equipment may be more disruptive, LA-RICS will restrict construction activities to daylight hours and certain days of the week. Moreover, construction activities are not expected to exceed 30 days, with only intermittent noise generated during that period. Equipment installed at the LTE sites will result in minor increases of noise in the immediate vicinity, due primarily to emergency back-up generator use and heating, ventilating and air conditioning (HVAC) systems for the equipment cabinets. Based on the analysis, no significant noise impacts are expected as a result of project activities and operation.

Air Quality

Operation of equipment and vehicles for site construction activities will result in emissions of air pollutants and fugitive dust. However, these air pollutant emissions will be limited to the construction period, and no significant short-term, direct impacts to regional air quality in the South Coast Air Basin and Mojave Desert Air Basin are expected. The Project will also result in short-term, minor increases in the use of fossil fuel and associated greenhouse (GHG) emissions during construction. LA-RICS estimates that the Project will result in the release of approximately 7,758.9 metric tons of carbon dioxide equivalent emissions. Thus, GHG

emissions are expected to be well under the Council on Environmental Quality's presumptive annual effects threshold of 25,000 metric tons of carbon dioxide equivalent emissions. Long-term operation and maintenance of the network will result in minimal air emissions. Based on the analysis, no significant impacts on air quality are expected.

Geology and Soils

Two LTE sites, Olive View UCLA Medical Center (LACOLV) and Aqueduct Cascades (LDWP243), are located within an Alquist-Priolo Earthquake Fault Zone. Implementation of the LTE system at these sites is necessary to provide coverage for Los Angeles County and because other potential nearby sites would not meet the necessary criteria for site selection. Compliance with Los Angeles County building code standards and permit requirements will ensure that this LTE facility is constructed to avoid hazards from earthquakes. Additionally, a geotechnical investigation will be conducted to evaluate the foundation conditions of these two sites and the potential for geologic/seismic hazards affecting the site. A geotechnical report will be prepared by a geotechnical engineer registered in the State of California, in cooperation with a certified engineering geologist and other technical experts, as necessary. Final design of structures will include design criteria specified or recommended in the geotechnical report prior to approval or issuance of construction permits. With implementation of these requirements, no significant impact due to seismic hazards is anticipated.

Ground disturbance will include the excavation of up to 80 cubic yards of earth to construct each new monopole foundation and provide for the installation of ancillary components. Utility installation for new LTE monopole and COW sites will require underground conduit to be placed in a trench measuring 2 feet wide by 3 feet deep, and not exceeding 500 feet in length at any LTE site. After the conduits are installed, the disturbed soil surface will be restored to its original condition. Trenching will occur only in previously disturbed or developed designated work areas. Overall, ground disturbance is expected to be minor and the Project is not expected to result in substantial erosion. The potential for erosion during construction would be minimized through implementation of erosion, sediment, tracking, wind erosion, non-stormwater management, and waste management and material pollution BMPs. Based on these assessments and implementation of the BMPs, no significant impact on geology and soils is expected to occur as a result of this Project.

Water Resources

Surface water, including streams and wetland features, are not present within the project limits for any of the 83 LTE sites. LA-RICS will ensure best practices during Project construction to ensure water quality is not degraded, beneficial uses impaired, and/or water quality standards violated due to erosion, a construction fuel leak, or other pollutant entering a nearby stream or other waterbody. BMPs will be implemented to control sediment and pollutants in storm water and non-storm water runoff associated with construction according to protocols established by the California Stormwater Quality Association (CASQA). Furthermore, the Project will not contribute to runoff because new construction will take place in previously disturbed areas. Underground utility surveys will be completed to identify and avoid underground pipelines and

tanks prior to ground disturbance during construction. Water used during construction will come from existing water connections located at 62 of the LTE sites. Water will be transported to the remaining two LTE sites (BMT and PHN) where existing plumbing connections might not be available. Three sites are located wholly or partially in a FEMA Flood Zone A (100-year floodplain). The LTE design at these locations will comply with applicable municipal flood hazard ordinances and will not change potential flood flows compared to existing conditions. The Project will not substantially interfere with groundwater recharge, or alter the course of any stream or river. Based on these assessments and implementation of the BMPs, the Project will have no significant impacts on water resources.

Biological Resources

LA-RICS collected preliminary background information on threatened and endangered species within the Project area through correspondence with the U.S. Fish and Wildlife Service (USFWS) and California Department of Fish and Game (CDFG). They also reviewed the California Natural Diversity Database, the West Mojave Plan Habitat Conservation Plan, and the ANF Land Management Plan. Through these efforts, LA-RICS identified State and federally listed threatened and endangered species, and critical habitat. In addition, a reconnaissance field survey was conducted for each Project site, including a 500-foot buffer, to identify the potential occurrence of special-status species, vegetation communities, or habitats that could support these species. Based on this data, 17 Federal threatened, endangered, or candidate species were identified as potentially occurring in the Project area. These species are identified in the *Biological Assessment LA-RICS Long Term Evolution Project* report (UltraSystems Environmental, Inc., May 2014). LA-RICS also determined that suitable habitat for the coastal California gnatcatcher (*Polioptila californica*) is present within Site PHN.

On May 12, 2014, NTIA entered into informal consultation with the USFWS regarding potential significant impacts to federally listed threatened and endangered species from Project activities on the Palos Verdes blue butterfly (*Glaucopsyche lygdamus palosverdesensis*), Arroyo toad (*Anaxyrus californicus*), Desert tortoise (*Gopherus agassizii*), California condor (*Gymnogyps californianus*), coastal California gnatcatcher, least Bell's vireo, southwestern willow flycatcher (*Empidonax traillii extimus*), and western snowy plover, or their designated critical habitat. A Biological Assessment was submitted to the USFWS on May 12, 2014. In a letter dated July 18, 2014, the USFWS concurred with NTIA's determination that the LA-RICS project may affect, but is not likely to adversely affect the Palos Verdes blue butterfly (*Glaucopsyche lygdamus palosverdesensis*), arroyo toad (*Anaxyrus californicus*), California condor, least Bell's vireo, southwestern willow flycatcher (*Empidonax traillii extimus*), desert tortoise (*Gopherus agassizii*), coastal California gnatcatcher, and western snowy plover, and their designated critical habitats.

As part of the SEA1 analysis, four new sites (LBECOC, LBFD012(N), PASDNPD, and VPC) were reviewed by USFWS in late May and early June 2015. In an email dated June 4, 2015, USFWS concurred with the no effect determination for these four sites.

For SEA2, six new sites (BLR2DPW, CHPNWHLL, LADPW38, LDWP243, ONK, and SDW) were evaluated in a Supplemental Biological Assessment, which was submitted to the USFWS in July 2015. In a letter dated August 4, 2015, USFWS concurred with the no effect determination for these six sites.

A series of biological CMRs have been developed to minimize or avoid potential effects to biological resources, including federally protected species, during construction and operation of the LTE system and are included in the project design for each site. The construction contractor will be required to provide biologists with appropriate expertise to perform pre-construction surveys and monitor construction activities, and supervise implementation of the biological CMRs. The biologists provided by the construction contractor will be approved by LA-RICS.

Where State or Federal-listed threatened or endangered plants have a potential to occur on a LTE site, LA-RICS will have a biological monitor onsite whenever project-related activities have the potential to impact sensitive or native species. Habitat protection zones will be established to avoid impacts to sensitive or native habitats outside of, but adjacent to the work area.

In addition to considering potential impacts on listed species, LA-RICS evaluated potential impacts on migratory birds and other wildlife. The Project may temporarily affect wildlife, including migratory birds. Should active bird nests be identified along the Project route, a biological monitor will be present during times of construction in areas containing active bird nests, and a protective buffer will be established around the nest. Non-federally listed species, including the Burrowing owl, Golden and bald eagle, Mohave ground squirrel, Monarch butterfly, and non-listed amphibians, reptiles, and small mammals, were also identified for specific protection through employment of CMRs. The short-term presence of construction vehicles, equipment, and crews may also result in temporary noise and visual impacts to amphibian, reptilian, fish, insect, mollusk, and crustacean species. Direct and indirect impacts to these species will be minimized through the implementation of CMRs.

In an effort to avoid and minimize the spread of invasive plants and their parts, contractor vehicles and equipment will be cleaned prior to the arrival at constructions sites. In addition, biological monitors will identify areas of native vegetation to be protected. Post-construction surveys for noxious weeds shall be conducted during April through May to determine the presence of invasive species. Any populations of noxious weeds shall be immediately treated under the direction of a botanist.

LA-RICS will implement additional protective measures and CMRs, which are identified in Appendix A of the Final EA, SEA1, and SEA2. No further impacts from construction, operation, or maintenance of installation equipment are anticipated. Based on this analysis and implementation of the recommended protective measures and CMRs, LA-RICS will be able to construct the wireless network with no significant adverse impacts on biological resources.

Historic and Cultural Resources

In a letter dated November 5, 2010, NTIA initiated consultation with the California State Historic Preservation Officer (SHPO). This letter included a Project map and Project description, and documented the determination that the LA-RICS Long Term Evolution Project had the potential to affect historic properties. Since the original notification, LA-RICS revised the original project description and engaged an archaeologist with UltraSystems to analyze the archaeological and architectural resources within the Project's area of potential effect (APE). In a letter dated August 27, 2013, NTIA provided with the SHPO with an updated project description and associated mapping.

On August 30, 2013, NTIA provided Project details, through a modified version of the Federal Communication Commission's (FCC) Tower Construction Notification System (TCNS), to two tribes interested in the Project's geographical location in California. On February 30, 2014, NTIA issued a subsequent TCNS notification updating the Project area to include San Bernardino and Orange Counties, which included an additional 10 tribal representatives that were not previously identified by TCNS. Nine tribes did not provide a response. The Morongo Band of Mission Indians and Cahuilla Band of Mission Indians responded to TCNS confirming that they have no interest in the Project. On March 21, 2014, the Soboba Band of Luiseño Indians requested additional cultural resources information through TCNS. As requested, LA-RICS provided the Tribe with specific site information and an overview map for 16 requested sites. In letters dated September 3 and 5, 2014, the Tribe concluded that they have no concern about the 16 sites.

In addition, on July 16, 2013 UltraSystems contacted the California Native American Heritage Commission (NAHC) to request a review of their Sacred Lands Inventory to determine if sacred lands or other resources of significance to the Native American community were known to exist in proximity to the proposed Project.

As part of the SEA1 analysis, NTIA issued a subsequent TCNS notification updating the Project area to include Site PASDNPD. One tribe did not provide a response. The Santa Ynez Band of Mission Indians responded to TCNS confirming that they will not be commenting and will defer comment to local tribes. On May 20, 2015, the Soboba Band of Luiseño Indians requested additional cultural resources information through TCNS, as well as the Eastern Shoshone Tribe in their TCNS response June 2, 2015. As requested, LA-RICS provided the two Tribes with specific site information and an overview map for Site PASDNPD. Tribal consultations are still ongoing.

For SEA2, NTIA issued an additional TCNS notification updating the Project area to include the 15 COW LTE sites. Two tribes did not provide a response. The Santa Ynez Band of Mission Indians responded to TCNS confirming that they do not have an interest in these sites. On July 10, 2015, the Soboba Band of Luiseño Indians requested additional cultural resources information through TCNS. As requested, LA-RICS provided the Tribe with specific site information and an overview map for the 15 COW LTE sites. Tribal consultation is still ongoing.

During early Project coordination with the parties involved with Section 106 review, it was determined that the effects on historic properties would not be fully determined prior to approval of the undertaking considering the Project timeline and the number of parties involved. Therefore, a phased process for compliance with the National Historic Preservation Act (NHPA) Section 106 is appropriate. In an effort to meet the ARRA requirement to complete the Project by September 2015, and in light of on-going Project design and engineering, NTIA and LA-RICS decided to pursue a Programmatic Agreement (PA) to streamline Section 106 compliance. Preparation of a Project-specific PA is consistent with the provisions of the NHPA Section 106 implementing regulations (36 CFR Part 800) which permit Federal agencies to use PAs to establish alternative procedures for Section 106 compliance. The PA clearly lays out a process for SHPO concurrence, including addressing individual site comments, and resolution of adverse effects. On October 3, 2014, NTIA entered into a PA with the SHPO for the Project. LA-RICS must comply with all provisions of the PA, which are hereby incorporated by reference.

By adhering to the process for identifying, evaluating, and resolving any effects to historic properties set forth in the PA, this Project will not have any significant adverse effect on historic properties.

Aesthetic and Visual Resources

The planned telecommunications network will include new towers and wireless network equipment on existing towers and buildings, which are located on ridge tops, in rural and urban areas. Placement of additional wireless antennae on existing towers and structures will not significantly diminish visual quality. The effects of viewing an additional antenna will have minimal impact on local aesthetics and visual resources. The overall height of the new towers planned for this Project will be up to 85-feet high (including a 15-foot lightening rod), self-supporting, and free of guy wires to minimize potential visual impacts. The proposed LTE sites are planned to be placed within existing publicly-owned or administered safety facilities or communications sites. The towers, antennas, and equipment buildings are expected to blend in with existing development, other towers and structures, and/or the surrounding environment.

The Project will cause temporary disturbance at two sites, LHS and LBPDHQ (Long Beach Police Department Headquarter), located in areas having visual resources that are protected by Federal, State or local plans, policies and regulations. Five sites are located near the coastal zone, and one site is located in a locally designated scenic corridor that is not part of the coastal zone. Final design will be consistent with visual resource policies and regulations provided in applicable Local Coastal Programs (LCP) and development codes. Where appropriate, and in coordination with local jurisdictions, mitigation measures will be implemented to disguise the proposed monopole towers as palm trees, pine trees, flagpoles, hose towers, or incorporated into existing architectural elements. Specifically, Site LHS will be adequately set back from the scenic corridor surrounding U.S. Highway 101 and the proposed tower structure will be disguised.

Temporary impacts to visual and aesthetic resources will occur during the construction phase of the Project due to the presence of the construction equipment, materials, and work crews. Because construction vehicle traffic and Project activity will occur for approximately 30 days or less, the viewshed from the Project site will not be permanently affected. Based on these assessments and implementation of the mitigation measures, this Project will not significantly affect aesthetic or visual qualities in the region.

Land Use

Monopole construction is proposed at 31 existing telecommunications sites, and wireless equipment will be installed on eight existing towers and buildings; land use at these sites will not change. Minimal ground disturbance is anticipated from tower installation and construction will be temporary in nature. Disturbance at each proposed non-collocation LTE site will be limited to less than 3,600 square feet. Disturbance will be associated with the installation of LTE system equipment, monopole towers, ancillary components, and trenching for placement of conduits for utility connection at sites where a new monopole tower is required.

The land uses for 82 LTE sites under ownership by municipalities, Los Angeles County, and other county/city public services agencies are designated by individual LCPs, Airport Land Use Plans, and the Los Angeles County General Plan. One of the County-owned sites (Bald Mountain [BMT]) is located within a County-designated Significant Ecological Area (SEA). This site will be developed in a manner consistent with SEA policy requirements.

Two LTE sites are located within boundaries of County airport land-use plan areas, which include the plans for the Hawthorne Municipal Airport/Jack Northrop Field and Fox Airfield airports. Because these sites are within an airport influence area, development activities will be required to comply with the land use policies of these airport plans. FAA review of these two airport sites is required to ensure that the final design does not interfere with visual or electronic communications and is consistent with height restriction standards and procedures set forth in FAA Federal Aviation Regulations (FAR) Part 77. These airport sites include Lennox Sheriff's Station (LASDLNX) and Mira Loma Detention Facility (MLM).

In addition, one site, LHS, is located within the Santa Monica Mountains National Recreation Area, which is overseen by the NPS. LA-RICS has contacted the NPS to determine the appropriate permits and approvals required to construct and operate the proposed Project within their jurisdictions. In consultation with the NPS, it was determined that that Site LHS is located on land administered by the NPS. Therefore, NPS only holds an advisory and review role for the EA, and project activities do not require an NPS-issued right-of-way permit. NTIA provided the NPS with a courtesy copy of the EA for review and comment on May 21, 2014. In a letter dated July 15, 2014, the NPS concurred with the EA's impact level findings for Site LHS within the SMMNRA.

Through the respective agency permitting processes, county/city public services agencies will analyze potential land use impacts and determine whether the Project is consistent with their

respective land and resource management plans. LA-RICS has agreed to comply with all permit conditions issued by local agencies. Based on these consultations and permitting requirements, the Project is not anticipated to result in significant impact on land use.

Infrastructure

Site constraints associated with underground pipelines, communication cables, and similar urban infrastructure may occur when crossing a particular LTE site. Final engineering design consideration will be given to existing utility system constraints, and plans would be made to avoid them as necessary. LTE equipment will remain connected to existing power grids using existing utility infrastructure, although electrical upgrades may be required at some LTE sites. For the new LTE tower and COW sites, electric utilities will be extended from existing locations to provide power to the structures. The total demand for water during construction will be minor compared to the regional water supply estimated by the Integrated Regional Water Management Plan. There will be minor, short-term construction impacts on roadways and traffic flow during construction activities. LA-RICS will implement traffic control measures, where necessary, to ensure adequate vehicle movement at all times. Overall, this Project will have a beneficial impact on the public safety communication system within Los Angeles County, and is not anticipated to result in significant adverse impacts on infrastructure.

Socioeconomic Resources

The Project will help to increase public safety for the local communities by providing a single interoperable communication system that can be operated by all agencies and result in a positive effect that extends beyond Los Angeles County. No residents, minority, or low-income populations or businesses will be disproportionately impacted as a result of Project implementation. Overall, this Project is expected to have a positive impact on socioeconomics in the planned service area, and will not result in significant impacts on socioeconomic resources.

Human Health and Safety

The Project is not expected to have any adverse impacts on human health and safety during normal operation, but may have minimal, short-term impacts during construction. Several hazardous waste sites have been identified within or near the Project area. Thirteen LTE sites have been identified with an active leaking underground storage tank (LUST) on file in one or more of the regulatory databases. Three LTE sites, Industry Sheriff's Station (LASDIDT), San Dimas (SDW), and SCE Mesa Substation (SCEMESA), are located within one mile of a facility found on the Superfund Program's National Priorities List (NPL). To address this potential health hazard the construction contractor is required to prepare a Phase I Environmental Site Assessment to investigate and characterize these 15 LTE sites before construction proceeds. If additional study is warranted, then a Phase II investigation will be conducted to determine levels of contamination. If the Phase II determines that human contact with contaminated soils would occur, then LA-RICS must mitigate safety risks prior to undertaking construction activity. In addition, if dewatering is required during soil excavation, the construction contractor would need to obtain a National Pollutant Discharge Elimination System (NPDES) permit from jurisdictional Regional Water Quality Control Board for surface discharge of groundwater.

All trenching or excavation of foundations and utility connections will be conducted consistent with State and Federal safety rules and regulations, including Occupational Health and Safety Administration (OSHA) regulations. The FAA has purview over promotion of air safety and efficient use of navigable airspace in the United States, which includes evaluating potential obstructions such as communication towers. A total of 35 sites met FAA's obstruction evaluation criteria requiring notification under 14 CFR Part 77 and filing of FAA Form 7460-1, Notice of Proposed Construction or Alteration. FAA has recommended that voluntary notification be made for all proposed LTE antenna structures as best practice and therefore all 83 proposed LTE sites have been submitted to FAA for further review. In addition, the FAA requested that 1A Level surveys be conducted at the two on-airport LTE sites, AZPD001 (Azusa Police Department) and LASDLNX (Lennox Sheriff's Station), and these surveys have been completed by LA-RICS. Only those proposed antenna structures that receive "no hazard" to air navigation determinations from the FAA will be constructed.

The Project is not expected to have direct impacts on human health and safety during normal operation. BMPs for workplace safety will be implemented to protect workers and the public within the Project area. LA-RICS will adhere to all Federal, State, and county laws, ordinances, rules, and regulations that pertain to prevention, pre-suppression, and suppression of fires, and will develop and implement a fire management plan for use during construction activity on those LTE project sites proposed in areas designated as high fire hazard severity zones.

Five LTE sites (LACUSC, LAPDHLB, LAPDWIL, LAPDWLA, and SLA) are in the Los Angeles City or County methane hazard zones or near an oil well. Methane assessments were conducted for these five sites. Due to the size of new non-permeable surfaces created (i.e., <5,000 square feet), no additional action is required to permit the building permit process within the City of LA. Additional conduit fittings were identified for inclusion at site SLA (within 150 feet of an oil well) as part of the design/permitting process. For SEA-1, no sites were identified with any methane risk. For SEA-2, no sites were identified in City of Los Angeles or County Methane Hazard Zones. Five SEA-2 sites (LASDMVS, SCELNIDO, SCELONG, SCEMADR, and SCEMESA) were noted as being within 200 feet of an oil well, but because no new structures are proposed for these sites, there is no potential for methane buildup, and no further action is required.

Cumulative Impacts

LA-RICS did not identify any significant cumulative impacts that will result from Project implementation. LA-RICS has identified other telecommunication projects that will occur or are proposed at the same Project sites or adjacent to some of the LTE sites. If simultaneous projects do occur, LA-RICS assumes that each of the cumulative projects will be designed and operated in a manner consistent with pertinent land use management plans, as necessary, and comply with Federal, State and county requirements, codes and permit conditions to avoid construction conflicts. Although construction at the 83 LTE sites presents some potential for overlap and

impact with current built infrastructure and future development, the cumulative impacts from the Project were found negligible and are not expected to exceed the threshold of significance.

Decision

Based on the above analysis, NTIA concludes that constructing and operating the Project as defined by the preferred alternative, identified BMPs, CMRs, and mitigation measures, will not require additional mitigation. A separate mitigation plan is not required for the Project. The analyses indicate that the proposed action is not a major Federal action that will significantly affect the quality of the human environment. NTIA has determined that preparation of an EIS is not required.

Issued:

Douglas Kinkoph
Associate Administrator
Office of Telecommunications and Information Applications (Acting)
National Telecommunications and Information Administration

9-2-15
Date

Special Award Condition

Compliance with Environmental Protocols and Measures

Broadband Technology Opportunities Program Grant
Los Angeles Regional Interoperable Communication System Joint Powers Authority
LA-RICS Long Term Evolution Project

REVISED – SEPTEMBER 2015

This BTOP Grant Special Award Condition establishes requirements applicable to implementation of the Los Angeles Regional Interoperable Communication System Joint Powers Authority (LA-RICS), LA-RICS Long Term Evolution Project. The funding of the Grant is dependent on compliance with the provisions of this Special Award Condition. This SAC is based on the Final Environmental Assessment (EA), Supplemental EA #1 (SEA1), and Supplemental EA #2 (SEA2) documentation and supersedes the previous SAC issued August 11, 2015.

Post-award environmental reviews of the Project included consultation with regulatory agencies related to the protection of biological and historic and cultural resources. These consultations identified specific protocols or environmental protection measures. These protocols or protective measures may be either required or recommended to be included in the implementation of the Project to minimize potential impacts to biological resources and effects on historic and cultural resources. The protocols and measures are listed below.

Note that this Special Award Condition does not distinguish requirements identified during the consultations from recommendations that were also provided. The LA-RICS shall implement the identified protocols and measures without regard to this distinction and advise the Federal Project Officer (FPO) immediately if any issues arise related to the ability to comply fully with any requirement or recommendation listed below.

For each protocol or measure listed, LA-RICS shall include the following information in its periodic report to the FPO administering the grant:

a. Specifically where and when the protocol has been used or a measure has been implemented during the reporting period, and
b. Whether full compliance with the protocol or measure was achieved.

The FPO may, if they determine necessary, require additional information to ensure compliance with the protocol or measure. If, at any time, LA-RICS has questions or requires clarification regarding any of these protocols or measures, they shall notify the FPO, who will coordinate with the appropriate regulatory authority to provide the necessary information.

Biological Resource Protection Protocols and Measures

LA-RICS consulted with the U.S. Fish and Wildlife Service (USFWS) regarding potential Project impacts on biological resources. Informal consultation with the USFWS resulted in the agency's concurrence in a letter dated July 18, 2014 stating that the Project would not likely adversely affect the Palos Verdes blue butterfly (*Glaucopsyche lygdamus palosverdesensis*), Arroyo toad (*Anaxyrus californicus*), Desert tortoise (*Gopherus agassizii*), California condor (*Gymnogyps californianus*), coastal California gnatcatcher (*Polioptila californica*), least Bell's vireo (*Vireo bellii pusillus*), southwestern willow flycatcher (*Empidonax traillii extimus*), and western snowy plover (*Charadrius nivosus nivosus*), or their designated critical habitat, assuming that the construction management requirements (CMRs) found in Appendix A of the EA are implemented.

As part of the Supplemental EA analysis, four new sites (LBECOC, LBFD012(N), PASDNPD, and VPC) were reviewed by USFWS in late May and early June 2015. In an email dated June 4, 2015, USFWS concurred with the no effect determination for these four sites, assuming that the CMRs found in Appendix A of the Supplemental EA are implemented.

For SEA2, six new sites (BLR2DPW, CHPNWHLL, LADPW38, LDWP243, ONK, and SDW) were evaluated in a Supplemental Biological Assessment, which was submitted to USFWS in July 2015. In a letter dated August 4, 2015, USFWS concurred with the no effect determination for these six sites.

A series of biological CMRs have been developed to minimize or avoid potential effects to biological resources, including federally protected species, during construction and operation of the LTE system and are included in the project design for each site. (Minor changes have been made to the BIO CMRs included in the Supplemental EA from the original version in the Final EA. A copy of the revised CMRs are attached.) The construction contractor will be required to provide biologists with appropriate expertise to perform pre-construction surveys and monitor construction activities, and supervise implementation of the biological CMRs. The biologists provided by the construction contractor will be approved by LA-RICS.

Historic and Cultural Resource Protection Protocols and Measures

LA-RICS consulted with the California State Historic Preservation Office (SHPO) which resulted in a programmatic agreement (PA) being implemented to govern Section 106 consultation for the project. Through the Tower Construction Notification System (TCNS), NTIA also provided information on the Revised Project to 12 tribes. Furthermore, LA-RICS notified tribes identified through the California Native American Heritage Commission (NAHC) of the undertaking, provided Project descriptions and maps, and invited the tribes to comment on the Project. Formal consultation was initiated with one Federal tribe, the Soboba Band of Luiseño Indians. In letters dated September 3, 5 and 8, 2014, the Tribe concluded that they have no concerns about the LTE sites. However, the Tribe requested that a qualified archaeologist be present at Blue Rock and LA County Fire Station 78 and 114 during initial ground disturbing

activities, and that they be notified in the event that inadvertent discoveries are encountered during construction activities.

As part of the Supplemental EA analysis, NTIA issued a subsequent TCNS notification to four tribes updating the Revised Project area to include Site PASDNPD. Formal consultation was initiated with two Federal tribes, the Soboba Band of Luiseño Indians and the Eastern Shoshone Tribe in June and July 2015, respectively. LA-RICS must conclude consultation with each tribe and provide documentation to NTIA prior to the start of construction at Site PASDNPD.

For SEA2, NTIA issued an additional TCNS notification updating the Project area to include the 15 COW LTE sites. Formal consultation was initiated with two Federal tribes, the Eastern Shoshone Tribe and the Soboba Band of Luiseño Indians, in July 2015. Consultation with the Eastern Shoshone Tribe was concluded on August 6, 2015. LA-RICS must conclude consultation with the Soboba Band of Luiseño Indians and provide documentation to NTIA prior to the start of construction for the 15 COW LTE sites.

Project stipulations resulting from the consultation with the SHPO include:

1. LA-RICS shall complete all stipulations and conditions as described in the Programmatic Agreement. See attached PROGRAMMATIC AGREEMENT AMONG THE NATIONAL TELECOMMUNICATIONS AND INFORMATION ADMINISTRATION AND THE CALIFORNIA STATE HISTORIC PRESERVATION OFFICER, REGARDING THE LOS ANGELES REGIONAL INTEROPERABLE COMMUNICATION SYSTEM AUTHORITY UNDER THE BROADBAND TECHNOLOGY OPPORTUNITIES PROGRAM (October 3, 2014)

Additional Protection Protocols and Measures

1. LA-RICS will follow permitting and regulatory requirements outlined and required by the Federal Aviation Administration (FAA), Federal Communications Commission (FCC), and other applicable state and local agencies for all Revised Project activities.

2. LA-RICS will adhere to all mitigation measures related to noise in the Final EA, SEA1, and SEA2.

3. LA-RICS will adhere to all mitigation measures related to air quality (AIR MM 1) in the Final EA, SEA1, and SEA2.

4. LA-RICS will adhere to all mitigation measures related to geology and soils (GEO MM 1, GEO MM 2) in the Final EA, SEA1, and SEA2.

5. LA-RICS will adhere to all mitigation measures and CMRs (BIO CMR 1-18) related to biological resources in the Final EA, SEA1, and SEA2.

6. LA-RICS will adhere to all mitigation measures and CMRs (CRM CMR 1-6) related to cultural resources in the Final EA, SEA1, and SEA2.

7. LA-RICS will adhere to all mitigation measures related to aesthetic and visual resources (AES MM 1-3) in the Final EA, SEA1, and SEA2.

8. LA-RICS will adhere to all mitigation measures related to infrastructure (TRANS MM 1) in the Final EA, SEA1, and SEA2.

9. LA-RICS will adhere to all mitigation measures related to human health and safety (HS MM 1-3) in the Final EA, SEA1, and SEA2.

Additional mitigation measures identified in the Environmental Assessment as being required to avoid potential significant environmental impacts:

None.