Appendix E

2022 Botanical Survey and Wildlife Habitat Assessment Report

AECOM
401 West A St.
Suite 1200
San Diego, CA 92101
www.aecom.com

619.610.7600 tel
619.610.7601 fax

May 17, 2022

Heather Brashear
California Department of Fish and Wildlife
Region 6 (Inland Deserts Region)
3602 Inland Empire Blvd.
Ontario, CA 91764
Needles, California 92363

RE: Ash Hill Communication Site – 2022 Botanical Survey and Wildlife Habitat Assessment Report, San Bernardino County, California

Dear Ms. Brashear:

This letter report summarizes the results of vegetation mapping verification, special-status plant surveys, and a wildlife habitat assessment conducted by AECOM on April 15, 2022, at the Ash Hill Communication Site, hereafter referred to as the project site. The surveys were conducted in response to Ash Hill Communication Site Project – Data Request #1 Items #30 and #34 in order to confirm site conditions within areas considered as new disturbance.

The proposed project is generally located in San Bernardino County, California, approximately 7.8 miles east of Ludlow, California, just south of the I-40 right-of-way (ROW). The proposed project location is in the NW 1/4 of Section 11, Township 7N, Range 9E, San Bernardino Meridian (Figure 1). The site is immediately south of Interstate 40, just south of the California Department of Transportation ROW fence. Access to the site would utilize two existing Bureau of Land Management (BLM)-designated open access roads off of Route 66. The access road would utilize Route 66 to road NS0017 to road NS0003 to the project site for a total of approximately 5.77 miles. The section of access road off of NS0003 leading to the communication facility utilizes previously disturbed land but is considered unauthorized disturbance by BLM because that section of road has not been previously authorized with a ROW or designated as an open road. The proposed project would be located entirely on public lands managed by BLM.

Survey Methodology

The surveys were conducted within the 0.41 acre of the project footprint that is considered Mojave creosote bush scrub. This includes the communication site (0.23 acre) and a portion of the proposed access road that is considered new disturbance (0.18 acre) (Figure 2). The section of the access road that begins at the turn to the east from BLM-designated open access road NS0003 is considered new disturbance. Although the proposed access road is considered new disturbance, the road already exists to the site; however, BLM considers this unauthorized disturbance because it is not within a previously authorized with a ROW or designated as an open road. In addition, the communication site is also disturbed, but disturbance is considered unauthorized. Therefore, for purposes of assessing impacts from these project components, these areas are assumed to be Mojave creosote bush scrub.

The purpose of the survey was to confirm site conditions and habitat suitability for special-status species in this portion of the project footprint. The disturbed access road (i.e., unauthorized existing access road considered as Mojave creosote bush scrub) and communication site were surveyed. In addition, a 200-foot buffer around the communication site was surveyed to identify biological resources in the vicinity of the site. AECOM biologist Joseph Betzler conducted the survey on April 15, 2022. The weather conditions during the survey were clear with a few high thin clouds. The temperature was approximately 72 degrees Fahrenheit and winds were from the west at approximately 10 miles per hour.

Vegetation Verification

Previous vegetation mapping was verified throughout the survey area extending out to the buffer area. Vegetation mapping was accomplished by walking transects throughout the site to ensure full visual coverage of the survey area. Determinations of vegetation classification were designated in the field and classified according to Holland (1986). Photos were recorded within the project footprint to illustrate the general terrain.

Special-Status Plant Surveys

Surveys were conducted by a qualified botanist familiar with the flora of the Mojave Desert region. Focused special-status plant surveys were conducted by walking east-west transects spaced approximately 9 feet (3 meters) apart. Observable and readily identifiable vascular plant species encountered during the field surveys were identified and recorded to a taxonomic level to determine rarity. A list of species detected during surveys is provided in Appendix A. Sensitive plant species encountered during the field surveys were identified, recorded, and mapped with a global positioning system unit. Plant species were identified using the Jepson eFlora (Jepson Flora Project 2022).

Survey target species included those covered under the federal Endangered Species Act or California Endangered Species Act (CESA) (CDFG 2009); BLM sensitive species covered under the jurisdiction of the Needles Field Office (BLM Sensitive) (BLM 2009); and/or species included on the California Native Plant Society's (CNPS) Rare Plant Ranking system as California Rare Plant Rank (CRPR) 1A (presumed extinct in California), 1B (rare, threatened, or endangered in California and elsewhere), or 2 (rare, threatened, or endangered in California, but more common elsewhere) (CNPS 2022). CNPS CRPR 1A, 1B, and 2 species are considered special-status plant species if they meet the definitions of Section 1901, Chapter 10 (Native Plant Protection Act) or Sections 2050 through 2098 (CESA) (CNPS 2001).

AECOM botanists conducted searches of the California Department of Fish and Wildlife's (CDFW) California Natural Diversity Database (CNDDB) for plant species meeting the above criteria and occurring within a 5-mile radius of the survey area (CDFW 2022). In addition, rare plant observations were searched in the Ash Hill and Siberia U.S. Geological Survey 7.5' Quadrangle(s) using the CNPS Rare Plant Inventory (CNPS 2022).

Special-Status Wildlife Habitat Assessment

During the site visit any sign of special-status wildlife was recorded. In addition, the habitat was assessed for potential to support special-status wildlife, such as desert tortoise (*Gopherus agassizii*), American badger (*Taxidea taxus*), and kit fox (*Vulpes macrotis*).

Results and Discussion

Vegetation Communities

Habitat within the access road consists of disturbed land. The access road, although unauthorized, is a drivable access road. The communication site has been previously disturbed and consists of disturbed habitat with some desert pavement interspersed between disturbed areas. The communication site is generally devoid of vegetation. The communication site has signs of disturbance from highway construction (likely from construction of I-40) with concrete waste deposited on part of the site, soil and native rock debris stacked on site, and various steel straps and metal welding waste materials spread around the site and in the buffer (Appendix B, Photos 1 and 2).

Habitat outside the communication site is also disturbed; however, farther away from the disturbed areas it is also composed of Mojave creosote bush scrub (Holland 1986) on desert pavement soils (Appendix B, Photos 3 and 4). This portion of the Mojave Desert is dry and in a state of drought stress. Shrub cover was sparse with common shrubs within the survey area consisting of creosote bush (*Larrea tridentata*), white bursage (*Ambrosia dumosa*), and rhatany (*Krameria* sp.) (Appendix B, Photo 5). All of the cactus observed within the project footprint and buffer were dead, with only the dead remains of cholla (*Cylindropuntia* sp.) observed.

Other annual species identified included pincushion flower (*Chaenactis* cf. *fremontii*), desert plantain (*Plantago ovata*), and popcorn flowers (*Plagiobothrys* sp.).

Special-Status Plants

No special-status plant species were detected during surveys. As previously noted, conditions were dry within the survey area. No special status plant species have potential to occur within the project footprint due to the previous disturbance (Table 1). Suitable habitat is present for these species outside the project footprint within undisturbed areas of habitat (Table 1). Despite dry conditions, one survey is considered adequate based on the special-status plant species that have potential to occur on site. If these species were present, it is expected that they would have been detected during the surveys. Further detail on each species is provided below:

- Foxtail cactus (*Coryphantha alversonii*) – a small baseball-sized cactus that leaves a persistent recognizable shape in the landscape if it was present and died; no plants were observed.

Table 1
Probability of Occurrence of Special-Status Plant Species Known from the Vicinity of the Ash Hill Communication Site Survey Area

Scientific Name	Common Name	Status[1]	Habitat	Probability of Occurrence
Coryphantha alversonii	foxtail cactus	CRPR: 4.3	Mojave and Sonoran desert scrub; 75 to 1,525 meters. Blooms April–June.	**Footprint:** No suitable habitat present. Not expected. **Buffer:** Not detected. Moderate potential. Suitable habitat present in the form of creosote bush scrub.
Eriastrum harwoodii	Harwood's eriastrum	BLM Sensitive; CRPR: 1B.2	Desert dunes and loose sandy patches between more stable vegetated areas of desert scrub; 125 to 915 meters. Blooms March–June.	**Footprint:** No suitable habitat present. Not expected. **Buffer:** Not detected. Low potential. No sand dunes are present in the project footprint and minimal sandy patches in the buffer.
Funastrum utahense	Utah vine milkweed	CRPR: 4.2	Mojave and Sonoran desert scrub; 100 to 1,435 meters. Blooms primarily April–June. March, September, and October bloom are uncommon.	**Footprint:** No suitable habitat present. Not expected. **Buffer:** Not detected. Moderate potential. Suitable habitat present in the form of creosote bush scrub
Mentzelia tricuspis	spiny-hair blazing star		Creosote Brush Scrub, sandy or gravely slopes or washes; 150 to 1280 meters. Blooms primarily March–May.	**Footprint:** No suitable habitat present. Not expected. **Buffer:** Not detected. Low potential. Suitable habitat present in the form of wash habitat in the buffer.
Saltugilia latimeri	Latimer's woodland-gilia	BLM Sensitive; CRPR: 1B.2	Chaparral, Mojave desert scrub; pinyon and juniper woodland; 400 to 1,900 meters. Blooms March–June.	**Footprint:** No suitable habitat present. Not expected. **Buffer:** Not detected. Moderate potential. Suitable habitat present in the form of creosote bush scrub.

[1]**Status Key**
Bureau of Land Management (BLM) Sensitive – BLM sensitive species
CRPR 1A – presumed extirpated in California and either rare or extinct elsewhere
CRPR 1B – rare, threatened, or endangered in California and elsewhere
CRPR 2A – presumed extirpated in California but common elsewhere
CRPR 2B – rare, threatened, or endangered in California but more common elsewhere
CRPR 3 – plants for which more information is needed (a review list)
CRPR 4 – plants of limited distribution (watch list)
-.1 Seriously endangered in California
-.2 Fairly endangered in California
-.3 Not very endangered in California

- Harwood's eriastrum (*Eriastrum harwoodii*) – a thin, sharp-leaved annual plant, no signs of live or dead plants were observed..

- Utah vine milkweed (*Funastrum utahense*) – a perennial herbaceous vining milkweed that typically has signs of twining stems, even when not in a growth; no plants or signs of plants were observed.
- Spiny-hair blazing star (*Mentzelia tricuspis*) – an annual plant with dense hairs; no specimens were found and no obvious plant parts from dead plants were observed.
- Latimer's woodland-gilia (*Saltugilia latimeri*) – an annual plant; ad no specimens were found and no obvious plant parts from dead plants were observed.

Special-Status Wildlife Habitat Assessment

No burrows, scat, or other signs of special-status wildlife such as desert tortoise, badger, and kit fox were observed during surveys. Signs of rodent or other small mammal burrows were observed in and around the disturbed soil as well as around creosote bushes throughout the project footprint and buffer (Appendix B, Photo 6). Given the disturbance in the project footprint, there is low potential that special-status wildlife species would occur within the impact footprint. The buffer is also disturbed but the habitat improves at farther distances from the access road and communication site. Though special-status wildlife species and their sign was not observed within the buffer, there is potential for desert tortoise, badger, and kit fox to occur within these areas

Should you have any questions, please contact me at (619) 315-8866.

Sincerely,

Michael Anguiano
Project Manager
michael.angiuano@aecom.com

cc: Tom Gammon

Attachments: Figure 1 – Regional Map
Figure 2 – New Access Road
Appendix A – Plant Species Observed within the Ash Hill Communication Site Survey Area
Appendix B – Site Photos

Literature Cited

Bureau of Land Management (BLM). 2009. *Survey Protocols for NEPA/ESA Compliance for BLM Special-Status Plant Species*.

California Department of Fish and Game (CDFG). 2009. *Guidelines for Assessing the Effects of Proposed Projects on Rare, Threatened, and Endangered Plants and Natural Communities*. Sacramento, CA, 7 pp.

California Department of Fish and Wildlife (CDFW). 2022. California Natural Diversity Database (CNDDB) Search. State of California Resources Agency. Sacramento, CA.

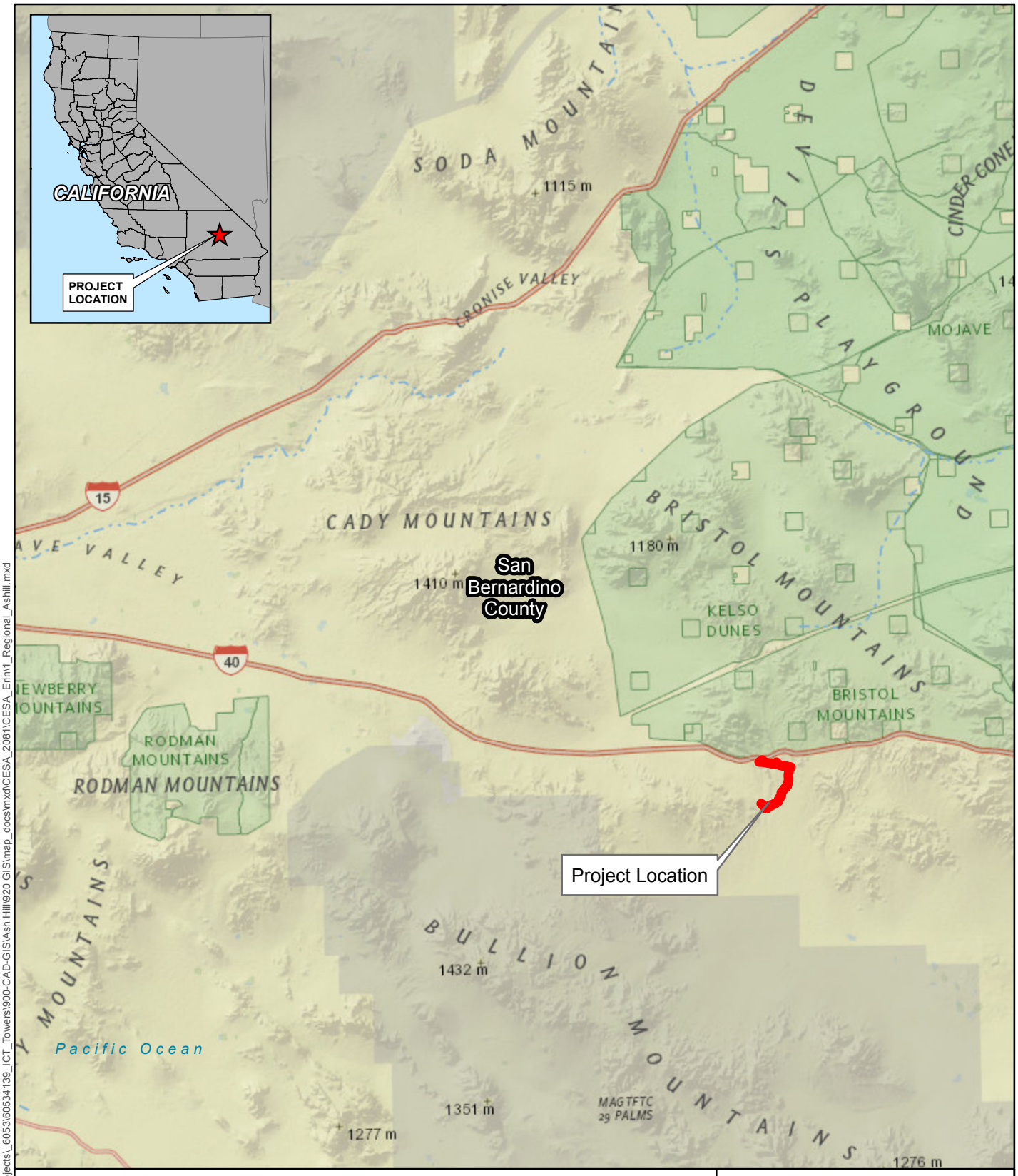
California Native Plant Society (CNPS). 2001. Botanical Survey Guidelines. Pages 38–40 *in* California Native Plant Society's *Inventory of Rare and Endangered Vascular Plants of California* (D. P. Tibor, editor). Sixth edition. Special Publication No. 1, California Native Plant Society, Sacramento, CA. 387 pp.

California Native Plant Society (CNPS), Rare Plant Program. 2022. Rare Plant Inventory (online edition, v9-01 1.5). Website https://www.rareplants.cnps.org [accessed 16 May 2022].

Holland, R. 1986. *Preliminary Descriptions of the Terrestrial Natural Communities of California*. Nongame Heritage Program, State of California, Department of Fish and Game.

Jepson Flora Project (eds.) 2022. Jepson eFlora. Available at https://ucjeps.berkeley.edu/eflora/. Accessed April 15, 2022.

FIGURES



Legend

Project Location

0 5 10 Miles

Base Map Source:
ESRI, ArcGIS Online
National Geographic World Map

FIGURE 1
REGIONAL MAP

InterConnect Towers
Ash Hill Communication Site

AECOM

\\ussdg1fp001.na.aecomnet.com\DATA\projects_60530\60534139_ICT_Towers\900-CAD-GIS\Ash Hill\920 GIS\map_docs\mxd\CESA_20811\CESA_Erin\1_Regional_Ashill.mxd

Legend

- New Access Road
- BLM-Designated Open Access Road NS0003
- Tower Location

0 200 400 Feet

Base Map Source:
ESRI, ArcGIS Online
Bing Maps Hybrid

FIGURE 2
NEW ACCESS ROAD

InterConnect Towers
Ash Hill Communication Site

AECOM

Date: 5/3/2022
Job No.60545193
Created By: Paul Moreno
L:\DCS\Projects\ 60536\60534139 ICT Towers\900-CAD-GIS\Ash Hill\920 GIS\map docs\mxd\2022\Ash Hill New Access Road review.mxd

APPENDIX A

PLANT SPECIES OBSERVED WITHIN THE NIPTON COMMUNICATION SITE

Appendix A
Plant Species Observed within the Ash Hill Communication Site

Family	Scientific Name	Common Name
Asteraceae	*Ambrosia dumosa*	white bursage
	Bebbia juncea var. *aspera*	sweetbush
	Chaenactis cf. *fremontii*	pincushion flower
Boraginaceae	*Plagiobothrys* sp.	Arizona popcornflower
Krameriaceae	*Krameria* sp.	rhatany
Plantaginaceae	*Plantago ovata*	desert plantain
Poaceae	*Schismus barbatus**	Mediterranean grass
Zygophyllaceae	*Larrea tridentata*	creosote bush

* Nonnative species

APPENDIX B

SITE PHOTOS

Photo 1. Steel waste and piled soil was found at the west edge of the project footprint and in the buffer. Habitat in the photo is representative of conditions at the communication site.

Photo 2. Stacked concrete was also found along the portion of the existing proposed access route that is considered new disturbance for purposes of impacts.

Photo 3. View looking south from the project footprint toward the southern edge of the buffer area.

Photo 4. View looking north toward I-40 from the buffer area. Note sparse plant cover.

Photo 5. View of desert pavement soils with creosote and white bursage in the buffer area.

Photo 6. Rodent burrows were the only mammal sign found. Small mammal burrows were found within the project footprint as well as the buffer area.