

APPENDIX F

CNPS LIST 4* SPECIES POTENTIALLY OCCURRING AT THE PROJECT SITE

Prepared by:

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Table F-1
CNPS List 4* Species Potentially Occuring at the Project Site

Species	Habitat	Flowering Period
Heart-leaved thorn-mint <i>Acanthomintha obovata</i> ssp. <i>cordata</i>	Chaparral (openings), cismontane woodland, pinyon and juniper woodland, valley and foothill grassland; clay. 785-1,540 m.	Apr-Jul
Clark Mountain agave <i>Agave utahensis</i> var. <i>nevadensis</i>	Joshua tree "woodland", Mohavean desert scrub, pinyon and juniper woodland; carbonate or volcanic. 900-1,585 m.	May-Jul
Parish's onion <i>Allium parishii</i>	Joshua tree "woodland", Mohavean desert scrub, pinyon and juniper woodland; rocky. 900-1,465 m.	Apr-May
oreganillo <i>Aloysia wrightii</i>	Joshua tree "woodland", pinyon and juniper woodland; rocky, often carbonate. 900-1,600 m.	Apr-Oct
Watson's amaranth <i>Amaranthus watsonii</i>	Mohavean desert scrub, Sonoran desert scrub. 20-1,700 m.	Apr-Sep
California androsace <i>Androsace elongata</i> ssp. <i>acuta</i>	Chaparral, cismontane woodland, coastal scrub, valley and foothill grassland. 305-1,200 m.	Mar-Jun
antelope-horns <i>Asclepias asperula</i> ssp. <i>asperula</i>	Mohavean desert scrub, pinyon and juniper woodland; rocky. 915-2,195 m.	May-Sep
western spleenwort <i>Asplenium vespertinum</i>	Chaparral, cismontane woodland, coastal scrub; rocky. 180-1,000 m.	Feb-Jun
Salton milk-vetch <i>Astragalus crotalariae</i>	Sonoran desert scrub; sandy or gravelly. -60-250 m.	Jan-Apr
Borrego milk-vetch <i>Astragalus lentiginosus</i> var. <i>boreganus</i>	Mohavean desert scrub, Sonoran desert scrub; sandy. 30-270 m.	Feb-May
Providence Mountains milk-vetch <i>Astragalus nutans</i>	Joshua tree "woodland", Mohavean desert scrub, pinyon and juniper woodland, Sonoran desert scrub; sandy or gravelly. 450-1,950 m.	Mar-Oct
Plummer's baccharis <i>Baccharis plummerae</i> ssp. <i>plummerae</i>	Broadleafed upland forest, chaparral, cismontane woodland, coastal scrub; rocky. 5-425 m.	May-Oct
black grama <i>Bouteloua eriopoda</i>	Joshua tree "woodland", pinyon and juniper woodland. 900-1,900 m.	May-Aug
Brewer's calandrinia <i>Calandrinia breweri</i>	Chaparral, coastal scrub; sandy or loamy, disturbed sites and burns. 10-1,220 m.	Mar-Jun
Catalina mariposa lily <i>Calochortus catalinae</i>	Chaparral, cismontane woodland, coastal scrub, valley and foothill grassland. 15-700 m.	Feb-May
club-haired mariposa lily <i>Calochortus clavatus</i> var. <i>clavatus</i>	Chaparral, cismontane woodland, coastal scrub, valley and foothill grassland; usually serpentinite, clay, rocky. 75-1,300 m.	May-Jun
Peirson's morning-glory <i>Calystegia peirsonii</i>	Chaparral, chenopod scrub, cismontane woodland, coastal scrub, lower montane coniferous forest, valley and foothill grassland. 30-1,500 m.	May-Jun
sand evening-primrose <i>Camissonia arenaria</i>	Sonoran desert scrub; sandy or rocky. -70-915 m.	Mar-May
pygmy poppy <i>Canbya candida</i>	Joshua tree "woodland", Mohavean desert scrub, pinyon and juniper woodland; sandy, granitic. 600-1,200 m.	Mar-Jun

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Mojave Indian paintbrush <i>Castilleja plagiotoma</i>	Great Basin scrub (alluvial), Joshua tree "woodland", lower montane coniferous forest, pinyon and juniper woodland. 300-2,500 m.	Apr-Jun
little-leaved palo verde <i>Cercidium microphyllum</i>	Mohavean desert scrub; rocky or gravelly. 45-1,070 m.	Apr-May
southern mountain misery <i>Chamaebatia australis</i>	Chaparral; gabbroic or metavolcanic. 300-700 m.	Nov-May
Death Valley sandmat <i>Chamaesyce vallis-mortae</i>	Mohavean desert scrub; sandy or gravelly. 230-1,300 m.	May-Oct
Mojave spineflower <i>Chorizanthe spinosa</i>	Chenopod scrub, Joshua tree "woodland", Mohavean desert scrub. 6-1,300 m.	Apr-Jul
short-pedicelled cleomella <i>Cleomella brevipes</i>	Meadows, Marshes and Swamps, Playas; alkaline. 395-2,195 m.	May-Oct
spiny abrojo <i>Condalia globosa</i> var. <i>pubescens</i>	Sonoran desert scrub. 140-1,000 m.	Mar-May
small-flowered morning-glory <i>Convolvulus simulans</i>	Chaparral (openings), coastal scrub, valley and foothill grassland; clay, serpentinite seeps. 30-700 m.	Mar-Jul
desert bird's-beak <i>Cordylanthus eremicus</i> ssp. <i>eremicus</i>	Joshua tree "woodland", Mohavean desert scrub, pinyon and juniper woodland. 1,000-2,800 m.	Jul-Oct
foxtail cactus <i>Coryphantha alversonii</i> (= <i>Escobaria vivipara</i> var. <i>alversonii</i>)	Mohavean desert scrub, Sonoran desert scrub; sandy or rocky, usually granitic. 75-1,525 m.	Apr-Jun
ribbed cryptantha <i>Cryptantha costata</i>	Desert dunes, Mohavean desert scrub, Sonoran desert scrub; sandy. -60-500 m.	Feb-May
winged cryptantha <i>Cryptantha holoptera</i>	Mohavean desert scrub, Sonoran desert scrub. 100-1,200 m.	Mar-Apr
Utah vine milkweed <i>Cynanchum utahense</i>	Mohavean desert scrub, Sonoran desert scrub; sandy or gravelly. 150-1,420 m.	Apr-Jun
paniculate tarplant <i>Deinandra paniculata</i>	Coastal scrub, valley and foothill grassland; usually vernally mesic. 25-940 m.	Apr-Nov
Colorado Desert larkspur <i>Delphinium parishii</i> ssp. <i>subglobosum</i>	Chaparral, cismontane woodland, pinyon and juniper woodland, Sonoran desert scrub. 600-1,800 m.	Mar-Jun
western dichondra <i>Dichondra occidentalis</i>	Chaparral, cismontane woodland, coastal scrub, valley and foothill grassland. 50-500 m.	Jan-Jul
naked-stemmed daisy <i>Enceliopsis nudicaulis</i> var. <i>nudicaulis</i>	Great Basin scrub, Mohavean desert scrub; volcanic or carbonate. 950-2,000 m.	Apr-May
Clark Mountain buckwheat <i>Eriogonum heermannii</i> var. <i>floccosum</i>	Pinyon and juniper woodland; carbonate. 900-2,400 m.	Aug-Oct
slender bedstraw <i>Galium angustifolium</i> ssp. <i>gracillimum</i>	Joshua tree "woodland", Sonoran desert scrub; granitic, rocky. 130-1,550 m.	Apr-Jun
Cuyama gilia <i>Gilia latiflora</i> ssp. <i>cuyamensis</i>	Pinyon and juniper woodland; sandy. 600-2,000 m.	Apr-Jun
golden goodmania <i>Goodmania luteola</i>	Mohavean desert scrub, meadows, playas, valley and foothill grassland; alkaline or clay. 20-2,200 m.	Apr-Aug

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Palmer's grapplinghook <i>Harpagonella palmeri</i>	Chaparral, coastal scrub, valley and foothill grassland; clay. 20-830 m.	Mar-May
California mock-pennyroyal <i>Hedeoma nanum</i> var. <i>californicum</i>	Joshua tree "woodland", pinyon and juniper woodland; rocky, often carbonate. 855-2,100 m.	Apr-Jun
pink velvet-mallow <i>Horsfordia alata</i>	Sonoran desert scrub; rocky. 100-500 m.	Feb-Dec
Newberry's velvet-mallow <i>Horsfordia newberryi</i>	Sonoran desert scrub; rocky. 3-800 m.	Feb-Dec
Southern California black walnut <i>Juglans californica</i>	Chaparral, cismontane woodland, coastal scrub; alluvial. 50-900 m.	Mar-May
ocellated Humboldt lily <i>Lilium humboldtii</i> ssp. <i>ocellatum</i>	Chaparral, cismontane woodland, coastal scrub, Lower montane coniferous forest, riparian woodland; openings. 30-1,800 m.	Mar-Jul
California box-thorn <i>Lycium californicum</i>	coastal bluff scrub, coastal scrub. 5-150 m.	Dec-Aug
solitary blazing star <i>Mentzelia eremophila</i>	Mohavean desert scrub. 700-1,220 m.	Mar-May
small-flowered microseris <i>Microseris douglasii</i> var. <i>platycarpa</i>	cismontane woodland, coastal scrub, valley and foothill grassland, vernal pools; clay. 15-1,070 m.	Mar-May
sylvan microseris <i>Microseris sylvatica</i>	Chaparral, cismontane woodland, Great Basin scrub, pinyon and juniper woodland, valley and foothill grassland; serpentinite. 45-1,500 m.	Mar-Jun
Cleveland's bush monkeyflower <i>Mimulus clevelandii</i>	Chaparral, lower montane coniferous forest; often in disturbed areas, openings. 915-2,000 m.	May-Jul
slender-lobed four o'clock <i>Mirabilis tenuiloba</i>	Sonoran desert scrub. 300-1,095 m.	Mar-May
Utah mortonia <i>Mortonia utahensis</i>	Joshua tree "woodland", Mohavean desert scrub, pinyon and juniper woodland; carbonate. 760-2,100 m.	Mar-May
California spineflower <i>Mucronea californica</i>	Chaparral, cismontane woodland, coastal dunes, coastal scrub, valley and foothill grassland; sandy. 0-1,400 m.	Mar-Aug
California muhly <i>Muhlenbergia californica</i>	Chaparral, coastal scrub, lower montane coniferous forest, meadows; mesic, seeps and streambanks. 100-2,000 m.	Jul-Sep
slender nemacladus <i>Nemacladus gracilis</i>	Cismontane woodland, valley and foothill grassland; sandy or gravelly. 120-1,900 m.	Mar-May
Beaver Dam breadroot <i>Pediomelum castoreum</i>	Joshua tree "woodland", Mohavean desert scrub; sandy, washes and roadcuts. 610-825 m.	Apr-May
San Jacinto beardtongue <i>Penstemon clevelandii</i> var. <i>connatus</i>	Chaparral, pinyon and juniper woodland, Sonoran desert scrub; rocky. 400-1,500 m.	Mar-May
Thurber's beardtongue <i>Penstemon thurberi</i>	Chaparral, Joshua tree "woodland", pinyon and juniper woodland, Sonoran desert scrub. 500-1,200 m.	May-Jul
golden-rayed pentachaeta <i>Pentachaeta aurea</i>	Cismontane woodland, coastal scrub, lower montane coniferous forest, valley and foothill grassland. 80-1,850 m.	Mar-Jul

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adobe yampah <i>Perideridia pringlei</i>	Chaparral, cismontane woodland, coastal scrub, pinyon and juniper woodland; serpentinite, often clay. 300-1,800 m.	Apr-Jul
Thurber's pilostyles <i>Pilostyles thurberi</i>	Sonoran desert scrub. 0-365 m.	Jan
Michael's rein orchid <i>Piperia michaelii</i>	Coastal bluff scrub, closed-cone coniferous forest, chaparral, cismontane woodland, coastal scrub, lower montane coniferous forest. 3-915 m.	Apr-Aug
Fish's milkwort <i>Polygala cornuta</i> var. <i>fishiae</i>	Chaparral, cismontane woodland, riparian woodland. 100-1,100 m.	May-Aug
desert portulaca <i>Portulaca halimoides</i>	Joshua tree "woodland"; sandy. 1,000-1,200 m.	Sep
desert unicorn-plant <i>Proboscidea althaeifolia</i>	Sonoran desert scrub; sandy. 150-1,000 m.	May-Aug
Mojave indigo-bush <i>Psorothamnus arborescens</i> var. <i>arborescens</i>	Mohavean desert scrub, riparian scrub. 400-1,185 m.	Apr-May
San Gabriel oak <i>Quercus durata</i> var. <i>gabrieliensis</i>	Chaparral, cismontane woodland. 450-1,000 m.	Apr-May
Engelmann oak <i>Quercus engelmannii</i>	Chaparral, cismontane woodland, riparian woodland, valley and foothill grassland. 120-1,300 m.	Mar-May
Coulter's matilija poppy <i>Romneya coulteri</i>	Chaparral, coastal scrub; often in burns. 20-1,200 m.	Mar-Jul
Mojave fish-hook cactus <i>Sclerocactus polyancistrus</i>	Great Basin scrub, Joshua tree "woodland", Mohavean desert scrub; usually carbonate. 640-2,320 m.	Apr-Jul
Mojave spike-moss <i>Selaginella leucobryoides</i>	Great Basin scrub, lower montane coniferous forest, Mohavean desert scrub, pinyon and juniper woodland; rocky, usually carbonate. 600-3,150 m.	N/A
Laguna Mountains jewel-flower <i>Streptanthus bernardinus</i>	Chaparral, lower montane coniferous forest. 670-2,500 m.	Jun-Jul
Lemmon's syntrichopappus <i>Syntrichopappus lemmonii</i>	Chaparral, Joshua tree "woodland", pinyon and juniper woodland; sandy or gravelly. 520-1,830 m.	Apr-May
Hall's tetracoccus <i>Tetracoccus hallii</i>	Mohavean desert scrub, Sonoran desert scrub. 30-1,200 m.	Jan-May
desert tragia <i>Tragia ramosa</i>	Chenopod scrub, pinyon and juniper woodland; rocky. 900-1,860 m.	Apr-May

* no List 3 species are likely to occur in the project area.

Rankings derived from CNPS (2000).