

City of San Diego 2019 MSCP Rare Plant Monitoring Report

City of San Diego
Park and Recreation Department
Open Space Division

December 2019



Cover Photo Credits (from top to bottom):
Ambrosia pumila: © City of San Diego, 2015
Brodiaea orcuttii: © City of San Diego, 2015
Dudleya brevifolia: © City of San Diego, 2005
Acanthomintha ilicifolia: © City of San Diego, 2015
Monardella viminea: © City of San Diego, 2003
Dudleya variegata: © City of San Diego, 2004
Dicranostegia orcuttiana: © City of San Diego, 2005

Table of Contents

Introduction.....	3
Summary Results Table	4
<i>Acanthomintha ilicifolia</i> (San Diego Thorn-mint).....	11
<i>Acmispon prostratus</i> (Nuttall’s Acmispon)	62
<i>Ambrosia pumila</i> (San Diego Ambrosia).....	88
<i>Bloomeria clevelandii</i> (San Diego Goldenstar)	94
<i>Brodiaea filifolia</i> (Thread-leaved Brodiaea)	155
<i>Brodiaea orcuttii</i> (Orcutt’s Brodiaea).....	176
<i>Chloropyron maritimum</i> ssp. <i>maritimum</i> (Salt-marsh Bird’s Beak)	183
<i>Cylindropuntia californica</i> var. <i>californica</i> (Snake Cholla).....	193
<i>Deinandra conjugens</i> (Otay Tarplant)	200
<i>Dicranostegia orcuttiana</i> (Orcutt’s Bird’s Beak).....	216
<i>Dudleya brevifolia</i> (Short-Leaved Dudleya)	227
<i>Dudleya variegata</i> (Variegated Dudleya).....	308
<i>Erysimum ammophilum</i> (Coast wallflower)	315
<i>Monardella stoneana</i> (Jennifer’s Monardella)	331
<i>Monardella viminea</i> (Willowey Monardella).....	343
<i>Rosa minutifolia</i> (Baja Rose).....	370
Acknowledgments.....	376

Appendix A - City of San Diego MSCP Rare Plant Monitoring: 2019 Field Monitoring Dates and Staff

I. Introduction

The Biological Monitoring Plan for the Multiple Species Conservation Program (Ogden Environmental, Inc. 1996), Status Summary of MSCP Biological Monitoring Protocols (Conservation Biology Institute 2001), San Diego MSCP Rare Plant Monitoring Review and Revision (USGS, 2007) and the Assessment of Eleven Years of Rare Plant Monitoring Data from the San Diego Multiple Species Conservation Program (2010) are important components of the City of San Diego's MSCP under its 1997 Implementing Agreement (R28455) with the U.S. Fish and Wildlife Service and the California Department of Fish and Wildlife. The monitoring program includes plant, animal, and habitat monitoring requirements for each MSCP-participating jurisdiction; the City of San Diego began rare plant monitoring in 1999. In 2019, the City performed rare plant monitoring using the Management Strategic Plan (MSP) 2019 Monitoring Protocol (SDMMP 2019) for the following species:

Acanthomintha ilicifolia – Black Mountain, Dennery Ranch East, Los Peñasquitos Canyon, Mission Trails Regional Park, Otay Lakes, Sabre Springs

Acmispon prostratus – Mission Bay

Ambrosia pumila – Mission Trails Regional Park (Kumeyaay Lake)

Bloomeria clevelandii – East Elliott, Lopez Ridge, Marron Valley, Mission Trails Regional Park, Otay Lakes

Brodiaea filifolia – Black Mountain

Brodiaea orcuttii – Carroll Canyon, Lopez Ridge, Mission Trails Regional Park (Oak Creek), Nobel Drive

Chloropyron maritimum ssp. *maritimum* – Dog Beach

Cylindropuntia californica var. *californica* – Balboa Golf, Spring Canyon

Deinandra conjugens – Dennery Ranch, Dennery Ranch East, Proctor Valley

Dicranostegia orcuttiana – Otay River Valley, Dennery Ranch East

Dudleya brevifolia – Carmel Mountain, Crest Canyon

Dudleya variegata – Black Mountain East, East Elliott, Goat Mesa/Spring Canyon, Marron Valley, Mercy Road, Mission Trails Regional Park, Rancho Mission Canyon, Otay Lakes, Santa Luz

Erysimum ammophilum – Crest Canyon, North City West Open Space, Gonzales Canyon

Monardella stoneana – Marron Valley, Otay Lakes

Monardella viminea – Flanders Canyon, Lopez Canyon, Sycamore Canyon

Rosa minutifolia – Dennery Ranch

References:

San Diego Management and Monitoring Program (SDMMP). 2017. Management Strategic Plan (MSP) 2015 Monitoring Protocol for Rare Plant Occurrences on Conserved Lands in Western San Diego County. Prepared March 11, 2014; revised March 8, 2017.

City of San Diego MSCP Rare Plant Monitoring: 2019 Summary Results

Species	Site Name	MSP Occurrence ID	Population			Native		Non-Native		Management Recommendations	Field Data Sht (pg.#)	Photo (pg. #)
			Area (m ²) ¹	# Individuals in current maximum extent	Percent cover in sampling area	Number of Species ²	Percent Cover ²	Number of Species	Percent Cover ³			
<i>Acanthomintha ilicifolia</i> (San Diego Thorn-mint)	Black Mountain	ACIL_6BLMO032-1	0.0	0	0.0%	19	47.2%	12	20.4%	Continue weed treatments	12	15
	Dennery Ranch East	ACIL_3DREA005 - 1	88.0	178	0.2%	11	15.2%	13	59.5%	Continue weed control efforts using herbicide and dethatching as needed. Consider more intensive restoration program including seed bulking.	17	20
	Los Penasquitos Canyon Obs. 1	ACIL_6LPCA039 - 1	37.8	1072	0.2%	20	40.7%	9	5.4%	Fence repair needed	22	25
	Los Penasquitos Canyon Obs. 2	ACIL_6LPCA039 - 2			0.2%	18	32.8%	12	5.0%	Repair fence and continue weed control	27	30
	Los Penasquitos Canyon Obs. 3	ACIL_6LPCA039 - 3			0.0%	19	54.0%	8	3.6%	Continue weed control and repair fence.	32	35
	Mission Trails Regional Park	ACIL_MTRP021 - 1	28.8	300	0.0%	13	45.4%	8	3.2%	Repair fencing around thornmint , continue restoration	37	40
	Otay Lakes	ACIL_3OTLA012 - 1	0.0	0	0.0%	25	45.8%	13	16.0%	Continue preserve stewardship	42	45
	Sabre Springs East #1 Subpopulation	ACIL_4SASP025 - 1	0.0	0	0.0%	17	30.8%	17	35.0%	Continue weed control efforts. Consider restoration and seed bulking of thornmint	47	50
	Sabre Springs West #2 Subpopulation	ACIL_4SASP025 - 2			0.0%	9	19.8%	17	40.2%	Herbicide, potential restoration and seed bulking	52	55
	Sabre Springs South #3 Subpopulation	ACIL_4SASP025 - 3			0.0%	12	22.4%	8	68.0%	Herbicide nonnatives, consider restoration and seed bulking	57	60

City of San Diego MSCP Rare Plant Monitoring: 2019 Summary Results

Species	Site Name	MSP Occurrence ID	Population			Native		Non-Native		Management Recommendations	Field Data Sht (pg.#)	Photo (pg. #)
			Area (m ²) ¹	# Individuals in current maximum extent	Percent cover in sampling area	Number of Species ²	Percent Cover ²	Number of Species	Percent Cover ³			
<i>Acmispon prostratus</i> (Nuttall's Lotus)	Dune Triangle (Mission Bay Site #5)	ACPR_1DUTR005 - 5	0.0	0	0.0%	6	50.8%	2	11.2%	Continue preserve stewardship	63	66
	Hospitality Point (Mission Bay Site #2)	ACPR_1HOPO002 - 2	2322.9	1990	1.0%	3	9.0%	5	41.4%	Continue preserve stewardship and consider weed control program to reduce exotic grasses	68	71
	No Man's Land (Mission Bay Site #1)	ACPR_1NMLA001 - 1	2008.1	359	3.0%	8	28.8%	8	14.2%	Continue preserve stewardship and weed control	73	76
	Rip Rap (Mission Bay Site #3)	ACPR_1RRSO003 - 3	1216.1	312	0.0%	8	10.0%	10	29.3%	Consider invasive plant control	78	81
	South Shores (Mission Bay Site #6)	ACPR_1SOSH006 - 6	1226.8	333	0.0%	4	30.2%	6	46.6%	Continue preserve stewardship	83	86
<i>Ambrosia pumila</i> (San Diego Ambrosia)	Mission Trails Regional Park Kumeyaay Lake	AMPU_4KULA005-1	7206.0	82079	0.0%	14	30.8%	10	21.8%	Continue weed management actions and consider native grassland habitat restoration project as funding permits	89	92
<i>Bloomeria clevelandii</i> (San Diego Goldenstar)	East Elliott Obs. 1	BLCL_4EAEL014 - 1	0.0	0	2.0%	25	39.0%	14	33.4%	Continue Preserve stewardship	95	98
	East Elliott Obs. 2	BLCL_4EAEL014 - 2			0.2%	18	27.4%	9	21.3%	Continue preserve stewardship	100	103
	East Elliott Obs. 3	BLCL_4EAEL014 - 3			0.2%	20	38.6%	7	7.0%	Continue preserve stewardship	105	108
	East Elliott Obs. 5	BLCL_4EAEL014 - 5			0.2%	22	33.6%	9	12.2%	Continue preserve stewardship	110	113
	Lopez Ridge	BLCL_6LORI021 - 1	5721.5	6474	0.2%	29	65.2%	11	9.0%	Continue preserve stewardship	115	118

City of San Diego MSCP Rare Plant Monitoring: 2019 Summary Results

Species	Site Name	MSP Occurrence ID	Population			Native		Non-Native		Management Recommendations	Field Data Sht (pg.#)	Photo (pg. #)
			Area (m ²) ¹	# Individuals in current maximum extent	Percent cover in sampling area	Number of Species ²	Percent Cover ²	Number of Species	Percent Cover ³			
<i>Bloomeria clevelandii</i> (San Diego Goldenstar)	Marron Valley Obs. 1	BLCL_3MAVA005 - 1	93340.2	1193232	8.0%	18	32.8%	15	23.3%	Continue preserve stewardship	120	123
	Marron Valley Obs. 2	BLCL_3MAVA005 - 2			4.0%	21	27.4%	13	14.8%	Continue preserve stewardship	125	128
	Marron Valley Obs. 3	BLCL_3MAVA005 - 3			6.0%	22	41.2%	15	10.2%	Continue preserve stewardship	130	133
	Marron Valley Obs. 4	BLCL_3MAVA005 - 4			1.0%	16	12.6%	15	46.2%	Continue preserve stewardship	134	138
	Mission Trails Regional Park	BLCL_4MTRP023 - 1	0.0	0	0.0%	11	23.2%	10	61.0%	Continue preserve stewardship	140	143
	Otay Lakes East Obs. 1	BLCL_3OTLA006 - 1	385132.5	6743661	0.2%	15	32.8%	9	48.4%	Continue preserve stewardship	145	148
	Otay Lakes West Obs. 2	BLCL_3OTLA006 - 2	385132.5	6743661	35.0%	19	88.6%	8	24.0%	Continue preserve stewardship	150	153
<i>Brodiaea filifolia</i> (Thread-leaved Brodiaea)	Black Mountain	BRFL_6BMRA002 - 1	98.7	130	0.2%	10	31.8%	12	17.8%	Multiple weed control visits per year needed to control nonnative annuals	156	159
<i>Brodiaea orcuttii</i> (Orcutt's Brodiaea)	Nobel Drive	BROR_2NODR002 - 1	130	22	0.2%	20	38.6%	13	17.8%	Continue VP HCP maintenance visits	162	165
	Oak Creek (MTRP)	BROR_4OACR012 - 1	34.28	146	0.2%	38	41.0%	29	24.2%	Continue preserve stewardship	167	171
	Carroll Canyon	BROR_6CACA015 - 1	978.48	238	1.0%	32	52.6%	7	7.0%	VPHCP required weed maintenance visits	173	178
	Lopez Ridge	BROR_6LORI018 - 1	1498.5	7641	5.0%	29	65.6%	11	9.2%	Continue preserve stewardship	178	181
<i>Chloropyron maritimum</i> <i>ssp. maritimum</i> (Salt-marsh Bird's Beak)	Dog Beach	COMAM3_1DOBE007 - 1	5001.1	7761	1.0%	10	32.8%	1	1.0%	Continue preserve stewardship and weed control efforts	184	187

City of San Diego MSCP Rare Plant Monitoring: 2019 Summary Results

Species	Site Name	MSP Occurrence ID	Population			Native		Non-Native		Management Recommendations	Field Data Sht (pg.#)	Photo (pg. #)
			Area (m ²) ¹	# Individuals in current maximum extent	Percent cover in sampling area	Number of Species ²	Percent Cover ²	Number of Species	Percent Cover ³			
<i>Cylindropuntia californica</i> (Snake Cholla)	Balboa Park Golf	CYCA_2BPGC001 - 1	701.5	8	0.0%	25	82.6%	2	2.2%	Continue preserve stewardship and remove fountain grass as funding permits	190	193
	Spring Canyon	CYCA_3GOME003 - 1	1152.1	59	0.0%	16	83.6%	7	2.2%	Continue preserve stewardship	195	198
<i>Deinandra conjugens</i> (Otay Tarplant)	Dennerly Ranch	DECO13_3DERA020 - 1	344.9	62	0.2%	19	60.0%	12	13.8%	Continue preserve stewardship	201	204
	Dennerly Ranch East	DECO13_3DREA021 - 1	57841.1	3829081	40.0%	10	43.4%	17	32.4%	Continue preserve stewardship, regular patrols to prevent encampments and	205	209
	Proctor Valley	DECO13_3PRVA013 - 1	3794.0	556	0.2%	10	8.2%	17	77.8%	Continue preserve stewardship; consider developing a site specific restoration plan	211	214
<i>Dicranostegia orcuttiana</i> (Orcutt's Bird's Beak)	Dennerly Ranch East	COOR7_3DREA007 - 1	3578.7	7998	2.0%	16	35.8%	12	49.8%	Continue preserve stewardship; consider more intensive weed control and creating a site specific restoration plan	217	220
	Otay River Valley	COOR7_3ORVA001 - 1	1840.9	2651	5.0%	18	88.2%	6	3.6%	Continue preserve stewardship and weed control efforts as needed	222	225

City of San Diego MSCP Rare Plant Monitoring: 2019 Summary Results

Species	Site Name	MSP Occurrence ID	Population			Native		Non-Native		Management Recommendations	Field Data Sht (pg.#)	Photo (pg. #)
			Area (m ²) ¹	# Individuals in current maximum extent	Percent cover in sampling area	Number of Species ²	Percent Cover ²	Number of Species	Percent Cover ³			
<i>Dudleya brevifolia</i> (Short-Leaved Dudleya)	Carmel Mountain Obs. 1	DUBLB2_6CMR001 - 1	2766.6	86346	0.0%	14	35.8%	5	2.8%	Continue preserve stewardship and routine patrols to reduce off trail use	228	231
	Carmel Mountain Obs. 2	DUBLB2_6CMR001 - 2			1.0%	20	35.4%	4	0.8%	Continue preserve stewardship and routine patrols to discourage off trail use	233	236
	Carmel Mountain Obs. 3	DUBLB2_6CMR001 - 3			2.0%	22	17.0%	8	5.2%	Continue preserve stewardship and routine patrols to ensure people stay on trails	238	241
	Crest Canyon North	DUBLB2_7CRCA003 - 1	120.7	18183	1.0%	19	50.8%	4	0.8%	Continue preserve stewardship, consider fencing site	243	246
	Crest Canyon South	DUBLB2_7CRCA003 - 2	24.2	149	0.2%	22	30.0%	3	0.6%	Continue preserve stewardship and patrols to enforce legal trail use	248	251
<i>Dudleya variegata</i> (Variegated Dudleya)	Black Mountain East	DUVA_6BMRA020 - 1	0.0	0	0.0%	15	30.8%	12	60.8%	Continue preserve stewardship; consider preparation of a site specific restoration plan	256	259
	East Elliott - Hilltop	DUVA_4EAEL012 - 1	130.21	179	0.0%	33	66.0%	8	1.6%	Continue preserve stewardship	259	262
	East Elliott - Creek	DUVA_4EAEL012 - 2			0.0%	31	55.2%	15	18.4%	Continue preserve stewardship	264	268
	Goat Mesa (Spring Canyon)	DUVA_3GOME003 - 1	87.1	159	0.2%	17	47.4%	7	9.0%	Continue preserve stewardship	270	273

City of San Diego MSCP Rare Plant Monitoring: 2019 Summary Results

Species	Site Name	MSP Occurrence ID	Population			Native		Non-Native		Management Recommendations	Field Data Sht (pg.#)	Photo (pg. #)
			Area (m ²) ¹	# Individuals in current maximum extent	Percent cover in sampling area	Number of Species ²	Percent Cover ²	Number of Species	Percent Cover ³			
<i>Dudleya variegata</i> (Variegated Dudleya)	Marron Valley	DUVA_3MAVA004 - 1	632.8	1964	1.0%	14	30.4%	11	46.6%	Continue preserve stewardship	275	278
	Mercy Road	DUVA_4MERO014 - 1	124.8	455	1.0%	15	50.4%	10	14.0%	Continue preserve stewardship	280	283
	Mission Trails #1	DUVA_4MTRP015 - 1	547.4	4022	0.2%	23	43.6	12	16.4%	Continue preserve stewardship	285	288
	Mission Trails #2	DUVA_4MTRP015 - 2			0.2%	22	32.4%	14	40.0%	Continue preserve stewardship	290	293
	Mission Trails #3	DUVA_4MTRP015 - 3			0.2%	18	37.4%	13	33.2%	Continue preserve stewardship, consider fencing to keep hikers on trail	295	298
	Navajo/Mission Gorge	DUVA_4NAVA016 - 1	80.6	128	0.2%	16	50.4%	12	22.0%	Continue preserve stewardship; consider more aggressive weed management - create a site specific plan	300	302
	Olay Lakes	DUVA_3OTLA005 - 1	903.0	2854	0.0%	14	36.6%	3	50.4%	Continue preserve stewardship	304	308
	Santa Luz	DUVA_6SALU024 - 1	0.0	0	0.0%	14	38.0%	13	43.2%	Continue preserve stewardship	310	313
<i>Erysimum ammophilum</i> (Coast Wallflower)	North City West Open Space (Overlook Park)	ERAM4_6DEMA001 - 1	1532.0	691	3.0%	20	95.8%	2	7.0%	Continue preserve stewardship; treat/remove nonnative tree tobacco from site.	316	319
	Gonzales Canyon	ERAM4_6GOCA003 - 1	519.2	169	1.0%	27	69.8%	4	10.2%	Continue preserve stewardship	320	324
	Crest Canyon	ERAM4_7CRCA002 - 1	758.06	163	0.0%	20	42.8%	3	35.4%	Continue controlling velt grass.	326	329

City of San Diego MSCP Rare Plant Monitoring: 2019 Summary Results

Species	Site Name	MSP Occurrence ID	Population			Native		Non-Native		Management Recommendations	Field Data Sht (pg.#)	Photo (pg. #)
			Area (m ²) ¹	# Individuals in current maximum extent	Percent cover in sampling area	Number of Species ²	Percent Cover ²	Number of Species	Percent Cover ³			
<i>Monardella stoneana</i> ³ (Jennifer's Monardella)	Marron Valley	MOST_3MAVA002 - 1	924.7	46	1.0%	37	47.0%	19	11.0%	Continue preserve stewardship	332	336
	Otay Lakes	MOST_3OTLA005 - 1	0.0	0	0.0%	20	28.6%	20	22.0%	Continue preserve stewardship	338	341
<i>Monardella viminea</i> (Willowly Mondardella)	Flanders Canyon	MOLIV_6FLCA007 - 1	347.7	66	2.0%	11	52.4%	8	2.4%	Continue preserve stewardship	344	347
	Lopez Canyon West Terrace #1	MOLIV_6LOCA004 - 1	101.0	5	0.0%	15	37.2%	24	54.4%	Continue preserve stewardship	349	352
	Lopez Canyon East of Bridge #2	MOLIV_6LOCA004 - 2			1.0%	13	32.2%	12	45.6%	Continue preserve stewardship	354	357
	Lopez Canyon East of Bridge #3	MOLIV_6LOCA004 - 3			0.2%	12	51.2%	18	5.2%	Continue preserve stewardship	359	362
	Sycamore Canyon	MOLIV_4SYCA001 - 1			244.6	34	0.0%	26	30.0%	17	26.2%	Continue preserve stewardship. Consider plan to restore flow regime.
<i>Rosa minutifolia</i> (Small-leaved Rose)	Denney Ranch	ROMI80_3DENC001 - 1	1087.3	74	1.0%	19	60.0%	12	13.8%	Continue preserve stewardship	371	374

1) Current Mapped Extent

2) Number and percent cover of native species includes species of interest.

3) Elvin.M.A and Sanders, S.C. (2003) A New Species of Monardella (Lamiaceae) from Baja California, Mexico, and Southern California, United States. Novon. 13:4. 425432

* Photopoint locations within the same large continuous polygon mapped as current mapped extent.

† No data collected

Acanthomintha ilicifolia
San Diego Thorn-Mint



© City of San Diego 2015

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_6BLMO032_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_6BLMO032_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	10
<i>Acmispon wrangelianus</i> - Chilean trefoil	Native	Annual	Herb	0.2
<i>Apiastrum angustifolium</i> - mock parsley	Native	Annual	Herb	1
<i>Artemisia californica</i> - coastal sagebrush	Native	Perennial	Shrub	0.2
<i>Avena fatua</i> - wild oat	Nonnative	Annual	Grass	0.2
<i>Brachypodium distachyon</i> - purple false brome	Nonnative	Annual	Grass	15
<i>Brassica nigra</i> - black mustard	Nonnative	Annual	Herb	2
<i>Calochortus splendens</i> - splendid mariposa lily	Native	Perennial	Herb	0.2
<i>Centaurea melitensis</i> - Maltese star-thistle	Nonnative	Annual	Herb	0.2
<i>Chlorogalum pomeridianum</i> - soap plant	Native	Perennial	Herb	0.2
<i>Chorizanthe fimbriata</i> - fringed spineflower	Native	Annual	Herb	0.2
<i>Convolvulus simulans</i> - field bindweed	Native	Annual	Herb	0.2
<i>Deinandra fasciculata</i> - clustered tarweed	Native	Annual	Herb	13
<i>Dichelostemma capitatum</i> - bluedicks	Native	Perennial	Herb	0.2
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	0.2
<i>Erodium cicutarium</i> - redstem stork's bill	Nonnative	Annual	Herb	0.2
<i>Harpagonella palmeri</i> - Palmer's grappling-hook	Native	Annual	Herb	17
<i>Hedynois cretica</i> - Cretanweed	Nonnative	Annual	Herb	0.2
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	1
<i>Lupinus succulentus</i> - Hollowleaf annual lupine	Native	Annual	Herb	1
<i>Lysimachia arvensis</i> - Scarlet pimpernel	Nonnative	Annual	Herb	0.2
<i>Microseris douglasii</i> ssp. <i>platycarpha</i> - Douglas' silverpuffs	Native	Annual	Herb	0.2
<i>Opuntia littoralis</i> - coastal pricklypear	Native	Perennial	Shrub	1
<i>Peritoma arborea</i> - bladderpod spiderflower	Native	Perennial	Shrub	0.2
<i>Phalaris minor</i> - littleseed canarygrass	Nonnative	Annual	Grass	0.2
<i>Plantago rhodosperma</i> - redseed plantain	Native	Annual	Herb	0.2
<i>Salsola tragus</i> - prickly Russian thistle	Nonnative	Annual	Herb	0.2
<i>Salvia mellifera</i> - black sage	Native	Perennial	Shrub	1
<i>Sonchus asper</i> - spiny sowthistle	Nonnative	Annual	Herb	1
<i>Stipa pulchra</i> - purple needle grass	Native	Perennial	Grass	1
<i>Uropappus lindleyi</i> - silver puffs	Native	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_6BLMO032_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs:

Feral Pig Activity:

Altered Hydrology:

Nonnative Grass:

Trampling:

Erosion:

Nonnative Woody Plants:

Vandalism:

Urban Runoff:

Competitive Native Plants:

Current Grazing:

Slope Movement:

Dumping/Trash:

Historic Grazing:

Soil Compaction:

Encampments:

Historic Agriculture:

Fuel Modification Zone/ Fire Break:

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue weed treatments

VII. MANAGEMENT ACTIONS IN LAST YEAR

Dethatching

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

None

NOTES:

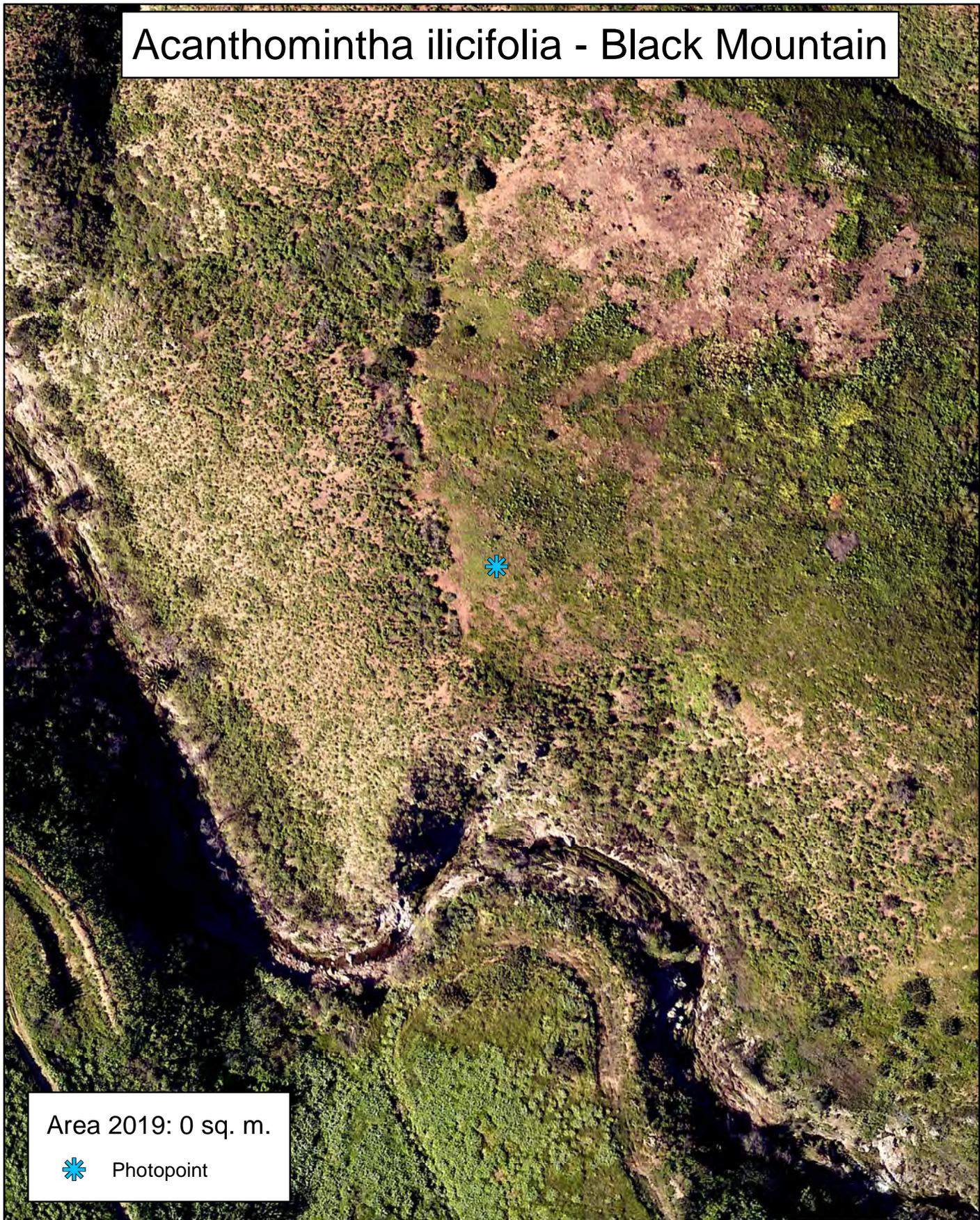
***Acanthomintha ilicifolia* (San Diego Thornmint) Black Mountain**

MSP Occurrence ID: ACIL_6BLMO032-1



Panorama from Southwestern edge of population, facing North, Northeast, East, Southeast.
Panorama location is 6284663.39 1946643.29 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Acanthomintha ilicifolia - Black Mountain

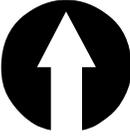


Area 2019: 0 sq. m.
* Photopoint

Pop. Area 2003 - 2019
Max Area: 56.50 sq. m.
Min Area: 0 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_3DREA005_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_3DREA005_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Acanthomintha ilicifolia - San Diego thornmint	Native	Annual	Herb	0.2
Acmispon strigosus	Native	Annual	Herb	0.2
Ambrosia chenopodiifolia - San Diego bur ragweed	Native	Perennial	Shrub	0.2
Apiastrum angustifolium - mock parsley	Native	Annual	Herb	0.2
Artemisia californica - coastal sagebrush	Native	Perennial	Shrub	1
Brachypodium distachyon - purple false brome	Nonnative	Annual	Grass	0.2
Brassica nigra - black mustard	Nonnative	Annual	Herb	1
Bromus madritensis - compact brome	Nonnative	Annual	Grass	0.2
Centaurea melitensis - Maltese star-thistle	Nonnative	Annual	Herb	50
Deinandra sp. - tarplant	Native	Annual	Herb	2
Dicranostegia orcuttiana - Orcutt's birds-beak	Native	Annual	Herb	2
Erodium cicutarium - redstem stork's bill	Nonnative	Annual	Herb	1
Euphorbia peplus - petty spurge	Nonnative	Annual	Herb	0.2
Festuca myuros - rattail fescue	Nonnative	Annual	Grass	0.2
Helminthotheca echioides - bristly oxtongue	Nonnative	Annual	Herb	0.2
Lysimachia arvensis - Scarlet pimpernel	Nonnative	Annual	Herb	1
Melilotus indica - annual yellow sweetclover	Nonnative	Annual	Herb	5
Mirabilis laevis - desert wishbone bush	Native	Perennial	Herb	0.2
Peritoma arborea - bladderpod spiderflower	Native	Perennial	Shrub	1
Phalaris minor - littleseed canarygrass	Nonnative	Annual	Grass	0.2
Plantago lanceolata - English plantain	Nonnative	Annual	Herb	0.2
Simmondsia chinensis - jojoba	Native	Perennial	Shrub	8
Sonchus asper - spiny sowthistle	Nonnative	Annual	Herb	0.2
Stipa lepida - foothill needle grass	Native	Perennial	Grass	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_3DREA005_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="6"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="3"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue weed control efforts using herbicide and dethatching as needed. Consider more intensive restoration program including seed bulking.

VII. MANAGEMENT ACTIONS IN LAST YEAR

One-time mowing to reduce weed cover.

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

CAGN

NOTES:

***Acanthomintha ilicifolia* (San Diego Thornmint)**

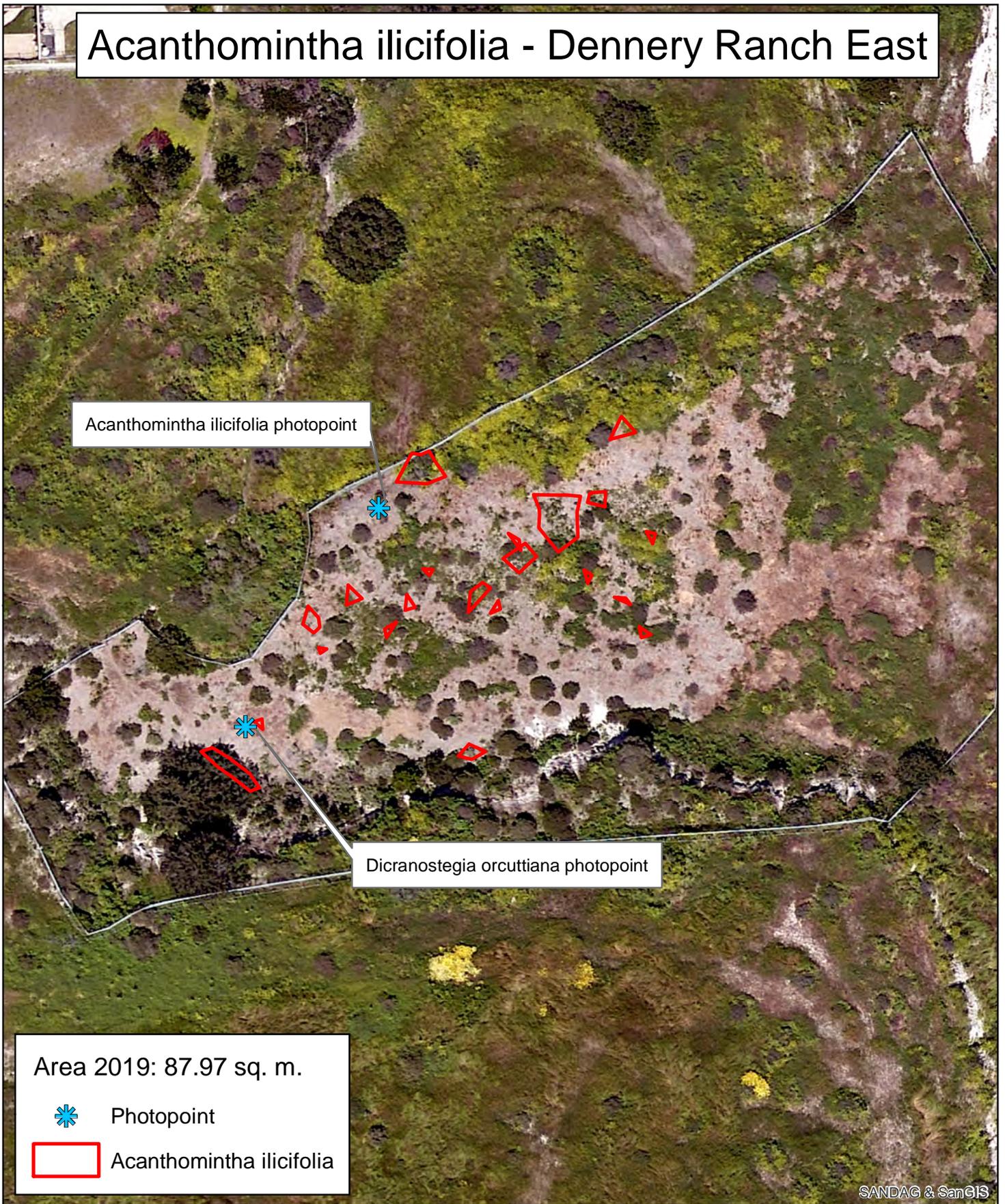
Dennerly Ranch East

MSP Occurrence ID: ACIL_3DREA005 - 1



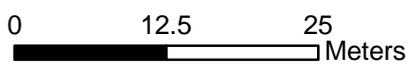
Panorama from Southern edge of population, facing West, Southwest, South.
Panorama location is 6323291.152 1793084.325 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Acanthomintha ilicifolia - Dennergy Ranch East



SANDAG & SanGIS

Pop. Area 2003 - 2019
Max Area: 1,005.80 sq. m.
Min Area: 0 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_6LPCA039_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_6LPCA039_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Acanthomintha ilicifolia - San Diego thornmint	Native	Annual	Herb	0.2
Acmispon glaber - deerweed	Native	Perennial	Shrub	0.2
Acmispon wrangelianus - Chilean trefoil	Native	Annual	Herb	0.2
Adolphia californica - California adolphia	Native	Perennial	Shrub	9
Apiastrum angustifolium - mock parsley	Native	Annual	Herb	0.2
Brachypodium distachyon - purple false brome	Nonnative	Annual	Grass	3
Bromus madritensis - compact brome	Nonnative	Annual	Grass	0.2
Centaurea melitensis - Maltese star-thistle	Nonnative	Annual	Herb	0.2
Chlorogalum pomeridianum - soap plant	Native	Perennial	Herb	0.2
Convolvulus simulans - field bindweed	Native	Annual	Herb	0.2
Deinandra fasciculata - clustered tarweed	Native	Annual	Herb	23
Dichelostemma capitatum - bluedicks	Native	Perennial	Herb	0.2
Encelia californica - California brittlebush	Native	Perennial	Shrub	0.2
Erodium cicutarium - redstem stork's bill	Nonnative	Annual	Herb	0.2
Festuca myuros - rattail fescue	Nonnative	Annual	Grass	1
Harpagonella palmeri - Palmer's grappling-hook	Native	Annual	Herb	0.2
Hypochaeris glabra - smooth cat's ear	Nonnative	Annual	Herb	0.2
Isocoma menziesii - Menzies' goldenbush	Native	Perennial	Shrub	0.2
Logfia gallica - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
Lupinus succulentus - Hollowleaf annual lupine	Native	Annual	Herb	0.2
Microseris douglasii ssp. platycarpha - Douglas' silverpuffs	Native	Annual	Herb	0.2
Plantago erecta - California plantain	Native	Annual	Herb	0.2
Rhamnus crocea - spiny redberry	Native	Perennial	Shrub	1
Rhus integrifolia - lemonade berry	Native	Perennial	Shrub	3
Salvia apiana - white sage	Native	Perennial	Shrub	0.2
Salvia mellifera - black sage	Native	Perennial	Shrub	5
Silene gallica - common catchfly	Nonnative	Annual	Herb	0.2
Sonchus asper - spiny sowthistle	Nonnative	Annual	Herb	0.2
Stipa pulchra - purple needle grass	Native	Perennial	Grass	1

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_6LPCA039_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="3"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="4"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Manangement: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

VII. MANAGEMENT ACTIONS IN LAST YEAR

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

NOTES:

***Acanthomintha ilicifolia* (San Diego Thornmint)**
Penasquitos Canyon Observation # 1
MSP Occurrence ID: ACIL_6LPCA039 - 1



Panorama from North of population, facing East, Southeast, South, Southwest.
Panorama location is 6276496.255 1918576.025 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Acanthomintha ilicifolia - Los Penasquitos Canyon

City of San Diego Parks and Recreation Department, Open Space Division



City of San Diego Rare Plant Monitoring Report 2019

Area 2019: 37.75 sq. m.

 Photopoint

 Acanthomintha ilicifolia

26 Pop. Area 2000 - 2019
 Max Area: 2,062.00 sq. m.
 Min Area: 12.00 sq. m.



Source: San GIS & City of San Diego Parks & Rec
 Map Created By: Jessie Lane 2019

Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_6LPCA039_2

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location:

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent:

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_6LPCA039_2

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Acanthomintha ilicifolia - San Diego thornmint	Native	Annual	Herb	0.2
Adolphia californica - California adolphia	Native	Perennial	Shrub	3
Apiastrum angustifolium - mock parsley	Native	Annual	Herb	0.2
Avena barbata - slender oat	Nonnative	Annual	Grass	0.2
Brachypodium distachyon - purple false brome	Nonnative	Annual	Grass	1
Brassica nigra - black mustard	Nonnative	Annual	Herb	0.2
Bromus madritensis - compact brome	Nonnative	Annual	Grass	0.2
Calochortus sp. - lily	Native	Perennial	Herb	0.2
Chlorogalum pomeridianum - soap plant	Native	Perennial	Herb	0.2
Convolvulus simulans - field bindweed	Native	Annual	Herb	0.2
Deinandra fasciculata - clustered tarweed	Native	Annual	Herb	24
Dichelostemma capitatum - bluedicks	Native	Perennial	Herb	0.2
Erodium cicutarium - redstem stork's bill	Nonnative	Annual	Herb	0.2
Euphorbia peplus - petty spurge	Nonnative	Annual	Herb	0.2
Festuca myuros - rattail fescue	Nonnative	Annual	Grass	2
Harpagonella palmeri - Palmer's grappling-hook	Native	Annual	Herb	0.2
Hypochaeris glabra - smooth cat's ear	Nonnative	Annual	Herb	0.2
Isocoma menziesii - Menzies' goldenbush	Native	Perennial	Shrub	0.2
Lepidium nitidum - shining pepperweed	Native	Annual	Herb	0.2
Logfia gallica - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
Lysimachia arvensis - Scarlet pimpernel	Nonnative	Annual	Herb	0.2
Microseris douglasii ssp. platycarpha - Douglas' silverpuffs	Native	Annual	Herb	2
Plantago erecta - California plantain	Native	Annual	Herb	0.2
Plantago rhodosperma - redseed plantain	Native	Annual	Herb	0.2
Salvia mellifera - black sage	Native	Perennial	Shrub	1
Silene gallica - common catchfly	Nonnative	Annual	Herb	0.2
Sonchus asper - spiny sowthistle	Nonnative	Annual	Herb	0.2
Stipa lepida - foothill needle grass	Native	Perennial	Grass	0.2
Stipa pulchra - purple needle grass	Native	Perennial	Grass	0.2
Uropappus lindleyi - silver puffs	Native	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_6LPCA039_2

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text"/>	Feral Pig Activity: <input type="text"/>	Altered Hydrology: <input type="text"/>
Nonnative Grass: <input type="text"/>	Trampling: <input type="text"/>	Erosion: <input type="text"/>
Nonnative Woody Plants: <input type="text"/>	Vandalism: <input type="text"/>	Urban Runoff: <input type="text"/>
Competitive Native Plants: <input type="text"/>	Current Grazing: <input type="text"/>	Slope Movement: <input type="text"/>
Dumping/Trash: <input type="text"/>	Historic Grazing: <input type="text"/>	Soil Compaction: <input type="text"/>
Encampments: <input type="text"/>	Historic Agriculture: <input type="text"/>	Fuel Modification Zone/ Fire Break: <input type="text"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Repair fence and continue weed control

VII. MANAGEMENT ACTIONS IN LAST YEAR

Weed control using herbicide and dethatching as needed

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

CAGN

NOTES:

***Acanthomintha ilicifolia* (San Diego Thornmint)**
Penasquitos Canyon Observation # 2
MSP Occurrence ID: ACIL_6LPCA039 - 2



Panorama from North of population, facing Southeast, South, Southwest.
Panorama location is 6276540.332 1918463.766 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Acanthomintha ilicifolia - Los Penasquitos Canyon



Pop. Area 2000 - 2019
 Max Area: 2,062.00 sq. m.
 Min Area: 12.00 sq. m.



Source: San GIS & City of San Diego Parks & Rec
 Map Created By: Jessie Lane 2019

Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_6LPCA039_3

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location:

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_6LPCA039_3

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Acmispon glaber - deerweed	Native	Perennial	Shrub	0.2
Acmispon wrangelianus - Chilean trefoil	Native	Annual	Herb	0.2
Adolphia californica - California adolphia	Native	Perennial	Shrub	15
Apiastrum angustifolium - mock parsley	Native	Annual	Herb	1
Avena fatua - wild oat	Nonnative	Annual	Grass	0.2
Brachypodium distachyon - purple false brome	Nonnative	Annual	Grass	2
Calochortus sp. - lily	Native	Perennial	Herb	0.2
Centaurea melitensis - Maltese star-thistle	Nonnative	Annual	Herb	0.2
Chlorogalum parviflorum - smallflower soap plant	Native	Perennial	Herb	0.2
Convolvulus simulans - field bindweed	Native	Annual	Herb	0.2
Deinandra fasciculata - clustered tarweed	Native	Annual	Herb	12
Dichelostemma capitatum - bluedicks	Native	Perennial	Herb	0.2
Eriogonum fasciculatum - Eastern Mojave buckwheat	Native	Perennial	Shrub	1
Erodium cicutarium - redstem stork's bill	Nonnative	Annual	Herb	0.2
Festuca myuros - rattail fescue	Nonnative	Annual	Grass	4
Harpagonella palmeri - Palmer's grappling-hook	Native	Annual	Herb	0.2
Heteromeles arbutifolia - toyon	Native	Perennial	Shrub	0.2
Hypochaeris glabra - smooth cat's ear	Nonnative	Annual	Herb	0.2
Isocoma menziesii - Menzies' goldenbush	Native	Perennial	Shrub	1
Logfia gallica - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
Plantago rhodosperma - redseed plantain	Native	Annual	Herb	0.2
Rhamnus crocea - spiny redberry	Native	Perennial	Shrub	4
Rhus integrifolia - lemonade berry	Native	Perennial	Shrub	12
Salvia mellifera - black sage	Native	Perennial	Shrub	5
Sonchus asper - spiny sowthistle	Nonnative	Annual	Herb	0.2
Stipa lepida - foothill needle grass	Native	Perennial	Grass	0.2
Stipa pulchra - purple needle grass	Native	Perennial	Grass	1

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_6LPCA039_3

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text"/>	Feral Pig Activity: <input type="text"/>	Altered Hydrology: <input type="text"/>
Nonnative Grass: <input type="text"/>	Trampling: <input type="text"/>	Erosion: <input type="text"/>
Nonnative Woody Plants: <input type="text"/>	Vandalism: <input type="text"/>	Urban Runoff: <input type="text"/>
Competitive Native Plants: <input type="text"/>	Current Grazing: <input type="text"/>	Slope Movement: <input type="text"/>
Dumping/Trash: <input type="text"/>	Historic Grazing: <input type="text"/>	Soil Compaction: <input type="text"/>
Encampments: <input type="text"/>	Historic Agriculture: <input type="text"/>	Fuel Modification Zone/ Fire Break: <input type="text"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue weed control and repair fence.

VII. MANAGEMENT ACTIONS IN LAST YEAR

Ongoing weed control using herbicide and dethatching as needed.

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

CAGN

NOTES:

***Acanthomintha ilicifolia* (San Diego Thornmint)**
Penasquitos Canyon Observation # 3
MSP Occurrence ID: ACIL_6LPCA039 - 3



Panorama from Western edge of population, facing East, Southeast, South, Southwest.
Panorama location is 6276371.012 191857.833 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Acanthomintha ilicifolia - Los Penasquitos Canyon



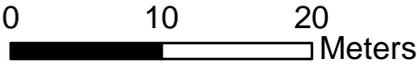
Point 1
Area: 33.54 sq. m.

Point 2
Area: 4.21 sq. m.

Point 3
Area: 0 sq. m.

Area 2019: 37.75 sq. m.
 Photopoint
 Acanthomintha ilicifolia

Pop. Area 2000 - 2019
 Max Area: 2,062.00 sq. m.
 Min Area: 12.00 sq. m.



Source: San GIS & City of San Diego Parks & Rec
 Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of this information requires the prior written consent of the City of San Diego.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_4MTRP021_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_4MTRP021_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Apiastrum angustifolium</i> - mock parsley	Native	Annual	Herb	0.2
<i>Artemisia californica</i> - coastal sagebrush	Native	Perennial	Shrub	0.2
<i>Brachypodium distachyon</i> - purple false brome	Nonnative	Annual	Grass	1
<i>Brassica nigra</i> - black mustard	Nonnative	Annual	Herb	0.2
<i>Centaurea melitensis</i> - Maltese star-thistle	Nonnative	Annual	Herb	0.2
<i>Convolvulus simulans</i> - field bindweed	Native	Annual	Herb	0.2
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	1
<i>Deinandra fasciculata</i> - clustered tarweed	Native	Annual	Herb	37
<i>Dichelostemma capitatum</i> - bluedicks	Native	Perennial	Herb	0.2
<i>Erodium cicutarium</i> - redstem stork's bill	Nonnative	Annual	Herb	0.2
<i>Heteromeles arbutifolia</i> - toyon	Native	Perennial	Shrub	1
<i>Isocoma menziesii</i> - Menzies' goldenbush	Native	Perennial	Shrub	0.2
<i>Lepidium nitidum</i> - shining pepperweed	Native	Annual	Herb	0.2
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
<i>Lonicera subspicata</i> - southern honeysuckle	Nonnative	Perennial	Shrub	1
<i>Lysimachia arvensis</i> - Scarlet pimpernel	Nonnative	Annual	Herb	0.2
<i>Malosma laurina</i> - laurel sumac	Native	Perennial	Shrub	2
<i>Opuntia littoralis</i> - coastal pricklypear	Native	Perennial	Shrub	1
<i>Peritoma arborea</i> - bladderpod spiderflower	Native	Perennial	Shrub	0.2
<i>Rhus integrifolia</i> - lemonade berry	Native	Perennial	Shrub	2
<i>Sonchus asper</i> - spiny sowthistle	Nonnative	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_4MTRP021_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="#Error"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="3"/>	Trampling: <input type="text" value="3"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Repair fencing around thornmint , continue restoration

VII. MANAGEMENT ACTIONS IN LAST YEAR

Recon performing restoration

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

None

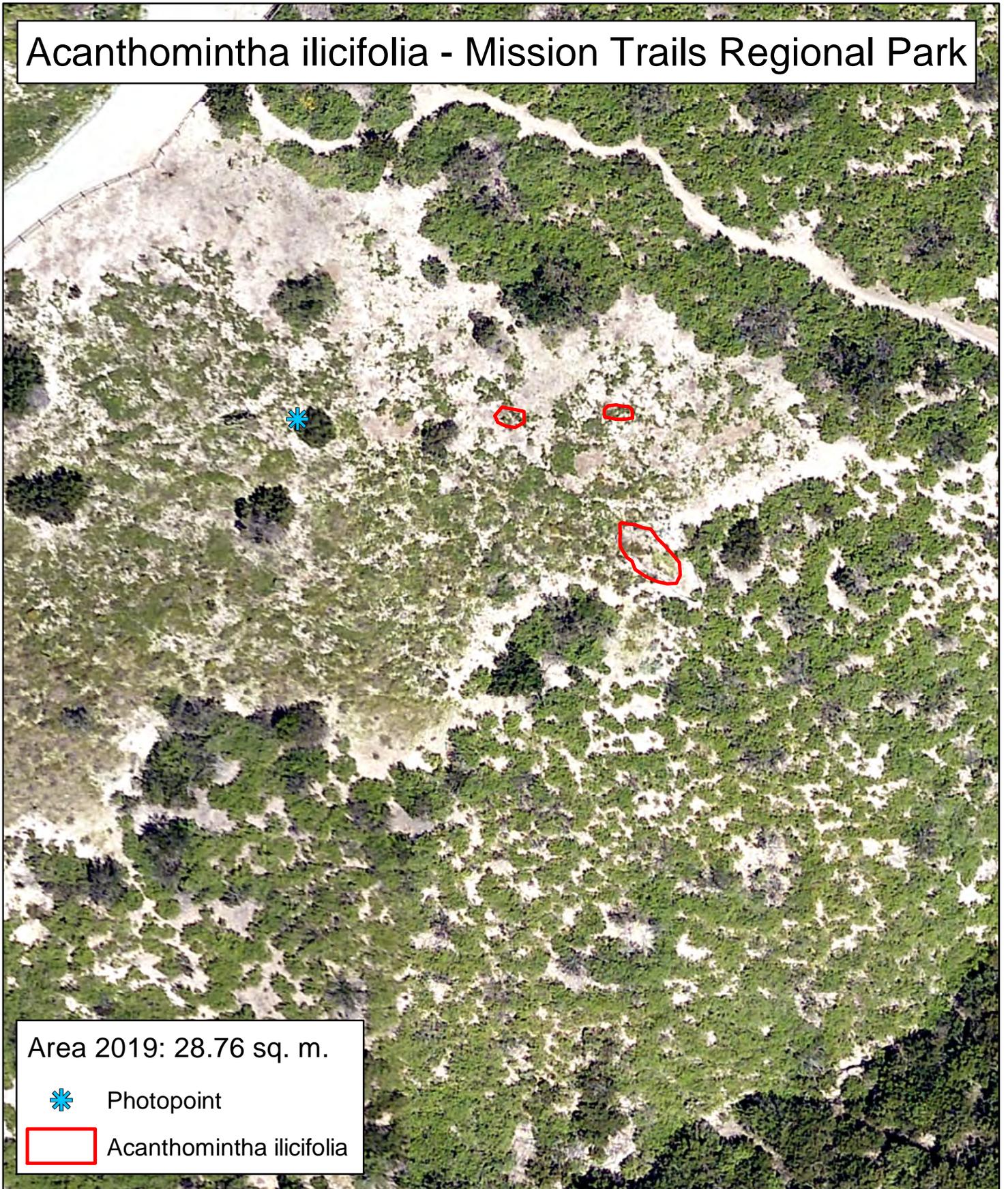
NOTES:

***Acanthomintha ilicifolia* (San Diego Thornmint)**
Mission Trails Regional Park
MSP Occurrence ID: ACIL_MTRP021 - 1



Panorama from Western edge of population, facing North, Northeast, East, Southeast, South.
Panorama location is 6308619.848 1881117.522 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Acanthomintha ilicifolia - Mission Trails Regional Park

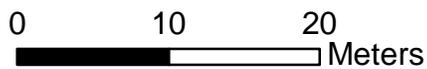


Area 2019: 28.76 sq. m.

 Photopoint

 Acanthomintha ilicifolia

Pop. Area 2001 - 2019
Max Area: 1,206.07 sq. m.
Min Area: 8.17 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_30TLA012_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_30TLA012_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	0.2
<i>Bloomeria clevelandii</i> - San Diego goldenstar	Native	Perennial	Herb	1
<i>Bromus hordeaceus</i> - soft brome	Nonnative	Annual	Grass	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	1
<i>Calochortus splendens</i> - splendid mariposa lily	Native	Perennial	Herb	0.2
<i>Castilleja exserta</i> - exserted Indian paintbrush	Native	Annual	Herb	0.2
<i>Centaurea melitensis</i> - Maltese star-thistle	Nonnative	Annual	Herb	0.2
<i>Chlorogalum parviflorum</i> - smallflower soap plant	Native	Perennial	Herb	0.2
<i>Convolvulus simulans</i> - field bindweed	Native	Annual	Herb	0.2
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	0.2
<i>Cressa truxillensis</i> - spreading alkaliweed	Native	Perennial	Herb	0.2
<i>Cryptantha</i> sp. - cryptantha	Native	Annual	Herb	0.2
<i>Cuscuta californica</i> - California dodder	Native	Annual	Herb	0.2
<i>Deinandra fasciculata</i> - clustered tarweed	Native	Annual	Herb	35
<i>Deschampsia danthonioides</i> - annual hairgrass	Native	Annual	Grass	0.2
<i>Downingia cuspidata</i> - Toothed downingia	Native	Annual	Herb	0.2
<i>Dudleya variegata</i> - Variegated dudleya	Native	Perennial	Herb	0.2
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	0.2
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	42
<i>Eryngium aristulatum</i> var. <i>parishii</i> - San Diego button celery	Native	Annual	Herb	2
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	1
<i>Festuca perennis</i> - Italian rye grass	Nonnative	Annual	Grass	0.2
<i>Hordeum marinum</i> - seaside barley	Nonnative	Annual	Grass	0.2
<i>Hypochaeris glabra</i> - smooth cat's ear	Nonnative	Annual	Herb	0.2
<i>Isocoma menziesii</i> - Menzies' goldenbush	Native	Perennial	Shrub	1
<i>Juncus bufonius</i> - toad rush	Native	Annual	Herb	2
<i>Lepidium nitidum</i> - shining pepperweed	Native	Annual	Herb	0.2
<i>Lysimachia arvensis</i> - Scarlet pimpernel	Nonnative	Annual	Herb	0.2
<i>Lythrum hyssopifolia</i> - Hyssop loosestrife	Nonnative	Annual	Herb	0.2
<i>Medicago polymorpha</i> - burclover	Nonnative	Annual	Herb	0.2
<i>Melilotus indica</i> - annual yellow sweetclover	Nonnative	Annual	Herb	0.2
<i>Microseris douglasii</i> ssp. <i>platycarpha</i> - Douglas' silverpuffs	Native	Annual	Herb	0.2
<i>Phalaris lemmonii</i> - Lemmon's canarygrass	Native	Annual	Grass	1
<i>Plantago rhodosperma</i> - redseed plantain	Native	Annual	Herb	0.2
<i>Psilocarphus brevissimus</i> - woolly marble	Native	Annual	Herb	0.2
<i>Selaginella cinerascens</i> - mesa spikemoss	Native	Perennial	Fern	0.2
<i>Silene gallica</i> - common catchfly	Nonnative	Annual	Herb	0.2
<i>Stipa pulchra</i> - purple needle grass	Native	Perennial	Grass	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_30TLA012_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="3"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="yes"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

None

NOTES:

***Acanthomintha ilicifolia* (San Diego Thornmint)**

Otay Lakes

MSP Occurrence ID: ACIL_3OTLA012 - 1



Panorama from North of population, facing West, Southwest, South.
Panorama location is 6357069.84 1807513.80 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Acanthomintha ilicifolia - Otay Lakes

Acanthomintha ilicifolia photopoint



Bloomeria clevelandii photopoint

Area 2019: 0 sq. m.

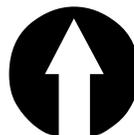


Photopoint

Pop. Area 2003 - 2019
Max Area: 10.70 sq. m.
Min Area: 0 sq. m.

0 30 60
Meters

Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense/ing sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_4SASP025_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_4SASP025_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	1
<i>Acmispon micranthus</i> - San Diego bird's-foot trefoil	Native	Annual	Herb	0.2
<i>Adolphia californica</i> - California adolphia	Native	Perennial	Shrub	3
<i>Apiastrum angustifolium</i> - mock parsley	Native	Annual	Herb	1
<i>Artemisia californica</i> - coastal sagebrush	Native	Perennial	Shrub	1
<i>Avena fatua</i> - wild oat	Nonnative	Annual	Grass	0.2
<i>Baccharis pilularis</i> - coyotebrush	Native	Perennial	Shrub	7
<i>Brachypodium distachyon</i> - purple false brome	Nonnative	Annual	Grass	3
<i>Brassica nigra</i> - black mustard	Nonnative	Annual	Herb	2
<i>Bromus hordeaceus</i> - soft brome	Nonnative	Annual	Grass	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	4
<i>Calandrinia breweri</i> - Brewer's redmaids	Native	Annual	Herb	0.2
<i>Centaurea melitensis</i> - Maltese star-thistle	Nonnative	Annual	Herb	0.2
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	0.2
<i>Cryptantha</i> sp. - cryptantha	Native	Annual	Herb	0.2
<i>Daucus pusillus</i> - American wild carrot	Native	Annual	Herb	0.2
<i>Deinandra fasciculata</i> - clustered tarweed	Native	Annual	Herb	5
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	0.2
<i>Erodium cicutarium</i> - redstem stork's bill	Nonnative	Annual	Herb	0.2
<i>Erodium moschatum</i> - Musky stork's bill	Nonnative	Annual	Herb	0.2
<i>Euphorbia peplus</i> - petty spurge	Nonnative	Annual	Herb	0.2
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	12
<i>Festuca perennis</i> - Italian rye grass	Nonnative	Annual	Grass	0.2
<i>Foeniculum vulgare</i> - sweet fennel	Nonnative	Perennial	Herb	0.2
<i>Galium angustifolium</i> - narrowleaf bedstraw	Native	Perennial	Herb	0.2
<i>Geranium californicum</i> - California geranium	Native	Annual	Herb	0.2
<i>Helminthotheca echioides</i> - bristly oxtongue	Nonnative	Annual	Herb	7
<i>Isocoma menziesii</i> - Menzies' goldenbush	Native	Perennial	Shrub	1
<i>Lysimachia arvensis</i> - Scarlet pimpernel	Nonnative	Annual	Herb	5
<i>Medicago polymorpha</i> - burclover	Nonnative	Annual	Herb	0.2
<i>Prunus ilicifolia</i> - hollyleaf cherry	Native	Perennial	Shrub	0.2
<i>Pseudognaphalium stramineum</i> - cottonbatting plant	Native	Perennial	Herb	0.2
<i>Quercus dumosa</i> - Nuttall's scrub oak	Native	Perennial	Shrub	10
<i>Sonchus asper</i> - spiny sowthistle	Nonnative	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_4SASP025_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="6"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="5"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="3"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="2"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue weed control efforts. Consider restoration and seed bulking of thornmint

VII. MANAGEMENT ACTIONS IN LAST YEAR

Dethatching and herbicide targeting non native species

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

CAGN

NOTES:

***Acanthomintha ilicifolia* (San Diego Thornmint) Sabre Springs East Subpopulation # 1**

MSP Occurrence ID: ACIL_4SASP025 - 1



Panorama from South edge of subpopulation, facing Northwest, North, Northeast, East.
Panorama location is 6303376.7 1 1923491.22 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

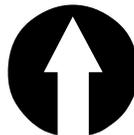
Acanthomintha ilicifolia - Sabre Springs



Pop. Area 2006 - 2019
Max Area: 282.10 sq. m.
Min Area: 0 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense of this information is prohibited.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_4SASP025_2

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location:
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_4SASP025_2

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Adolphia californica - California adolphia	Native	Perennial	Shrub	5
Apiastrum angustifolium - mock parsley	Native	Annual	Herb	1
Artemisia californica - coastal sagebrush	Native	Perennial	Shrub	0.2
Avena sp. - oat	Nonnative	Annual	Grass	0.2
Baccharis pilularis - coyotebrush	Native	Perennial	Shrub	4
Brachypodium distachyon - purple false brome	Nonnative	Annual	Grass	3
Brassica nigra - black mustard	Nonnative	Annual	Herb	2
Bromus hordeaceus - soft brome	Nonnative	Annual	Grass	0.2
Bromus madritensis - compact brome	Nonnative	Annual	Grass	0.2
Convolvulus simulans - field bindweed	Native	Annual	Herb	8
Erodium botrys - longbeak stork's bill	Nonnative	Annual	Herb	13
Erodium cicutarium - redstem stork's bill	Nonnative	Annual	Herb	0.2
Erodium moschatum - Musky stork's bill	Nonnative	Annual	Herb	0.2
Euphorbia peplus - petty spurge	Nonnative	Annual	Herb	0.2
Festuca myuros - rattail fescue	Nonnative	Annual	Grass	2
Festuca perennis - Italian rye grass	Nonnative	Annual	Grass	0.2
Geranium californicum - California geranium	Native	Annual	Herb	0.2
Helminthotheca echioides - bristly oxtongue	Nonnative	Annual	Herb	12
Isocoma menziesii - Menzies' goldenbush	Native	Perennial	Shrub	1
Lactuca serriola - prickly lettuce	Nonnative	Annual	Herb	0.2
Lysimachia arvensis - Scarlet pimpernel	Nonnative	Annual	Herb	6
Medicago polymorpha - burclover	Nonnative	Annual	Herb	0.2
Opuntia littoralis - coastal pricklypear	Native	Perennial	Shrub	0.2
Rumex crispus - curly dock	Nonnative	Perennial	Herb	0.2
Sonchus asper - spiny sowthistle	Nonnative	Annual	Herb	0.2
Stipa lepida - foothill needle grass	Native	Perennial	Grass	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_4SASP025_2

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text"/>	Feral Pig Activity: <input type="text"/>	Altered Hydrology: <input type="text"/>
Nonnative Grass: <input type="text"/>	Trampling: <input type="text"/>	Erosion: <input type="text"/>
Nonnative Woody Plants: <input type="text"/>	Vandalism: <input type="text"/>	Urban Runoff: <input type="text"/>
Competitive Native Plants: <input type="text"/>	Current Grazing: <input type="text"/>	Slope Movement: <input type="text"/>
Dumping/Trash: <input type="text"/>	Historic Grazing: <input type="text"/>	Soil Compaction: <input type="text"/>
Encampments: <input type="text"/>	Historic Agriculture: <input type="text"/>	Fuel Modification Zone/ Fire Break: <input type="text"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Herbicide, potential restoration and seed bulking

VII. MANAGEMENT ACTIONS IN LAST YEAR

Herbicide, mechanical removal

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

CAGN

NOTES:

***Acanthomintha ilicifolia* (San Diego Thornmint)**
Sabre Springs West Flat Subpopulation # 2
MSP Occurrence ID: ACIL_4SASP025 - 2



Panorama from Northwestern edge of subpopulation, facing South, Southwest, West.
Panorama location is 6303277.454 1923560.662 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

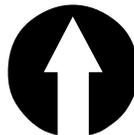
Acanthomintha ilicifolia - Sabre Springs



Pop. Area 2006 - 2019
Max Area: 282.10 sq. m.
Min Area: 0 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense/ing sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_4SASP025_3

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_4SASP025_3

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Adolphia californica</i> - California adolphia	Native	Perennial	Shrub	4
<i>Apiastrum angustifolium</i> - mock parsley	Native	Annual	Herb	3
<i>Avena fatua</i> - wild oat	Nonnative	Annual	Grass	0.2
<i>Baccharis pilularis</i> - coyotebrush	Native	Perennial	Shrub	0.2
<i>Brassica nigra</i> - black mustard	Nonnative	Annual	Herb	0.2
<i>Bromus hordeaceus</i> - soft brome	Nonnative	Annual	Grass	0.2
<i>Chlorogalum pomeridianum</i> - soap plant	Native	Perennial	Herb	0.2
<i>Claytonia perfoliata</i> - Miner's lettuce	Native	Annual	Herb	0.2
<i>Convolvulus simulans</i> - field bindweed	Native	Annual	Herb	7
<i>Euphorbia peplus</i> - petty spurge	Nonnative	Annual	Herb	0.2
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	2
<i>Helminthotheca echioides</i> - bristly oxtongue	Nonnative	Annual	Herb	60
<i>Lysimachia arvensis</i> - Scarlet pimpernel	Nonnative	Annual	Herb	5
<i>Pterostegia drymarioides</i> - woodland threadstem	Native	Annual	Herb	0.2
<i>Quercus dumosa</i> - Nuttall's scrub oak	Native	Perennial	Shrub	4
<i>Rhus integrifolia</i> - lemonade berry	Native	Perennial	Shrub	3
<i>Sonchus asper</i> - spiny sowthistle	Nonnative	Annual	Herb	0.2
<i>Stipa lepida</i> - foothill needle grass	Native	Perennial	Grass	0.2
<i>Toxicoscordion fremontii</i> - Fremont's star lily	Native	Perennial	Herb	0.2
<i>Zeltnera venusta</i> - charming centauray	Native	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACIL_4SASP025_3

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text"/>	Feral Pig Activity: <input type="text"/>	Altered Hydrology: <input type="text"/>
Nonnative Grass: <input type="text"/>	Trampling: <input type="text"/>	Erosion: <input type="text"/>
Nonnative Woody Plants: <input type="text"/>	Vandalism: <input type="text"/>	Urban Runoff: <input type="text"/>
Competitive Native Plants: <input type="text"/>	Current Grazing: <input type="text"/>	Slope Movement: <input type="text"/>
Dumping/Trash: <input type="text"/>	Historic Grazing: <input type="text"/>	Soil Compaction: <input type="text"/>
Encampments: <input type="text"/>	Historic Agriculture: <input type="text"/>	Fuel Modification Zone/ Fire Break: <input type="text"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Herbicide nonnatives, consider restoration and seed bulking

VII. MANAGEMENT ACTIONS IN LAST YEAR

Herbicide 1x and dethatching

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

None

NOTES:

Prime candiate for grant funded restoration

***Acanthomintha ilicifolia* (San Diego Thornmint)**
Sabre Springs Southern Subpopulation # 3
MSP Occurrence ID: ACIL_4SASP025 - 3



Panorama from Southwestern edge of subpopulation, facing Southeast, South, Southwest.
Panorama location is 6303165.85 1923485.4 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

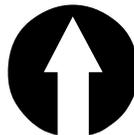
Acanthomintha ilicifolia - Sabre Springs



Pop. Area 2006 - 2019
Max Area: 282.10 sq. m.
Min Area: 0 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense of this information is prohibited.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

Acmispon prostratus
Nuttall's Lotus



© City of San Diego, 2016

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACPR_1DUTR005_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACPR_1DUTR005_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Brassica tournefortii - Asian mustard	Nonnative	Annual	Herb	0.2
Encelia californica - California brittlebush	Native	Perennial	Shrub	48
Erigeron canadensis - Canada horseweed	Native	Annual	Herb	0.2
Heliotropium curassavicum - salt heliotrope	Native	Perennial	Herb	0.2
Isocoma menziesii - Menzies' goldenbush	Native	Perennial	Shrub	2
Lepidium nitidum - shining pepperweed	Native	Annual	Herb	0.2
Melilotus indica - annual yellow sweetclover	Nonnative	Annual	Herb	11
Pseudognaphalium stramineum - cottonbatting plant	Native	Perennial	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACPR_1DUTR005_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="4"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="2"/>	Trampling: <input type="text" value="3"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="4"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="4"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

None

NOTES:

***Acmispon prostratus* (Nuttall's Acmispon)**
Mission Bay – Dune Triangle Site # 1
MSP Occurrence ID: ACPR_1DUTR005 - 1



Panorama from the Southern edge of population, facing Northeast, East, Southeast, South, Southwest.
Panorama location is 6266528.38 1858616.164 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Acmispon Prostratus - Dune Triangle, Mission Bay



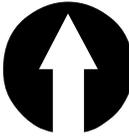
Area 2019: 0 sq. m.
 Photopoint

SANDAG & SanGIS, Esri, HERE, Garmin, © OpenStreetMap contributors, and the GIS user community, Source: Esri, DigitalGlobe, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AeroGRID, IGN, and the GIS User Community

Pop. Area 2006 - 2019
 Max Area: 725.15 sq. m.
 Min Area: 0 sq. m.



Source: San GIS & City of San Diego Parks & Rec
 Map Created By: Jessie Lane 2019
 City of San Diego Park and Recreation Department, Open Space Division



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.
 THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.
 PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense/ing sublicense agreements.
 This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACPR_1HOPO002_2

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACPR_1HOPO002_2

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Abronia umbellata - pink sand verbena	Native	Perennial	Herb	1
Acmispon prostratus - Nuttall's acmispon	Native	Annual	Herb	1
Bromus diandrus - rippgut brome	Nonnative	Annual	Grass	37
Camissoniopsis cheiranthifolia - beach suncup	Native	Perennial	Herb	7
Digitaria sanguinalis - hairy crabgrass	Nonnative	Annual	Grass	3
Erodium cicutarium - redstem stork's bill	Nonnative	Annual	Herb	0.2
Melilotus indica - annual yellow sweetclover	Nonnative	Annual	Herb	1
Salsola tragus - prickly Russian thistle	Nonnative	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACPR_1HOPO002_2

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="5"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="3"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="2"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship and consider weed control program to reduce exotic grasses

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

None

NOTES:

***Acmispon prostratus* (Nuttall's Acmispon)**
Mission Bay – Hospitality Point Site # 2
MSP Occurrence ID: ACPR_1HOPO002 - 2



Panorama from Southern edge of population, facing Southwest, West, Northwest.
Panorama location is 6256864.804 1857560.724 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Acmispon Prostratus - Hospitality Point, Mission Bay

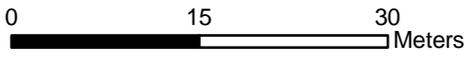


Area 2019: 2,322.92 sq. m.

 Photopoint

 Acmispon Prostratus

Pop. Area 2006 - 2019
Max Area: 5,505.40 sq. m.
Min Area: 1,622.00 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense/ing sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACPR_1NMLA001_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACPR_1NMLA001_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon prostratus</i> - Nuttall's acmispon	Native	Annual	Herb	3
<i>Avena barbata</i> - slender oat	Nonnative	Annual	Grass	0.2
<i>Baccharis sarothroides</i> - desertbroom	Native	Perennial	Shrub	0.2
<i>Brassica tournefortii</i> - Asian mustard	Nonnative	Annual	Herb	10
<i>Bromus diandrus</i> - ripgut brome	Nonnative	Annual	Grass	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	0.2
<i>Camissoniopsis bistorta</i> - southern suncup	Native	Annual	Herb	2
<i>Camissoniopsis cheiranthifolia</i> - beach suncup	Native	Perennial	Herb	18
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	0.2
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	0.2
<i>Erodium cicutarium</i> - redstem stork's bill	Nonnative	Annual	Herb	0.2
<i>Glebionis coronaria</i> - crown daisy	Nonnative	Annual	Herb	3
<i>Heterotheca grandiflora</i> - telegraphweed	Native	Annual	Herb	0.2
<i>Melilotus indica</i> - annual yellow sweetclover	Nonnative	Annual	Herb	0.2
<i>Pseudognaphalium bicolor</i> - Twocolor cudweed	Native	Perennial	Herb	5
<i>Solanum</i> sp. - nightshade	Unknown	Annual	Herb	1
<i>Stephanomeria diegensis</i> - San Diego milk aster	Native	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACPR_1NMLA001_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="5"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="3"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="4"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="3"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship and weed control

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship and hand weeding by volunteers

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

None

NOTES:

***Acmispon prostratus* (Nuttall's Acmispon)**
Mission Bay – No Man's Land Site #1
MSP Occurrence ID: ACPR_1NMLA001 - 1



Panorama from Southwestern edge of population, facing Southeast, South, Southwest, West.
Panorama location is 6267668.04 1859784.45 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Acmispon Prostratus - No Man's Land, Mission Bay

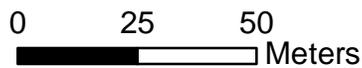


Area 2019: 2,008.07 sq. m.

 Photopoint

 Acmispon prostratus

Pop. Area 2003 - 2019
Max Area: 44,032.65 sq. m.
Min Area: 2.00 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense/sublicensing agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACPR_1RRSO003_3

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACPR_1RRSO003_3

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon strigosus</i>	Native	Annual	Herb	0.2
<i>Avena barbata</i> - slender oat	Nonnative	Annual	Grass	0.2
<i>Brachypodium distachyon</i> - purple false brome	Nonnative	Annual	Grass	0.2
<i>Brassica tournefortii</i> - Asian mustard	Nonnative	Annual	Herb	5
<i>Bromus diandrus</i> - ripgut brome	Nonnative	Annual	Grass	2
<i>Distichlis spicata</i> - saltgrass	Native	Perennial	Grass	2
<i>Frankenia salina</i> - alkali seaheath	Native	Perennial	Herb	5
<i>Glebionis coronaria</i> - crown daisy	Nonnative	Annual	Herb	0.2
<i>Heterotheca grandiflora</i> - telegraphweed	Native	Annual	Herb	0.2
<i>Jaumea carnosa</i> - marsh jaumea	Native	Perennial	Herb	0.2
<i>Lepidium nitidum</i> - shining pepperweed	Native	Annual	Herb	0.2
<i>Medicago polymorpha</i> - burclover	Nonnative	Annual	Herb	0.2
<i>Melilotus indica</i> - annual yellow sweetclover	Nonnative	Annual	Herb	3
<i>Pennisetum setaceum</i> - crimson fountaingrass	Nonnative	Perennial	Grass	18
<i>Salicornia pacifica</i> - glasswort	Native	Perennial	Herb	2
<i>Schismus barbatus</i> - common Mediterranean grass	Nonnative	Annual	Grass	0.2
<i>Suaeda esteroa</i> - estuary seablite	Native	Perennial	Herb	0.2
<i>Tribulus terrestris</i> - puncture vine	Nonnative	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACPR_1RRSO003_3

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="6"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="2"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Consider invasive plant control

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

None

NOTES:

***Acmispon prostratus* (Nuttall's Acmispon)**
Mission Bay – Rip Rap Site #3
MSP Occurrence ID: ACPR_1RRSO003 - 3



Panorama from Southern edge of population, facing Southwest, West, Northwest.
Panorama location is 6258823.558 1857305.759 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Acmispon Prostratus - Rip Rap, Mission Bay

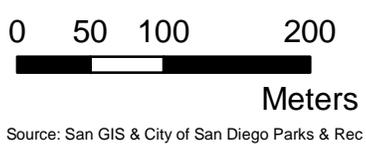


Hospitality Point photopoint

Rip Rap photopoint

Area 2019: 1,216.11 sq. m.
 * Photopoint
 □ Acmispon prostratus

Pop. Area 2008 - 2019
 Max Area: 10,774.29 sq. m.
 Min Area: 70.41 sq. m.



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense/sublicensing agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACPR_1SOSH006_6

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACPR_1SOSH006_6

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Artemisia californica - coastal sagebrush	Native	Perennial	Shrub	20
Baccharis pilularis - coyotebrush	Native	Perennial	Shrub	9
Brassica tournefortii - Asian mustard	Nonnative	Annual	Herb	3
Bromus madritensis - compact brome	Nonnative	Annual	Grass	0.2
Centaurea melitensis - Maltese star-thistle	Nonnative	Annual	Herb	0.2
Festuca myuros - rattail fescue	Nonnative	Annual	Grass	0.2
Glebionis coronaria - crown daisy	Nonnative	Annual	Herb	40
Isocoma menziesii - Menzies' goldenbush	Native	Perennial	Shrub	1
Lepidium nitidum - shining pepperweed	Native	Annual	Herb	0.2
Melilotus indica - annual yellow sweetclover	Nonnative	Annual	Herb	3

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ACPR_1SOSH006_6

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="6"/>	Feral Pig Activity: <input type="text"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="3"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="2"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="3"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship; volunteers removing iceplant

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

Osprey flying overhead

NOTES:

***Acmispon prostratus* (Nuttall's Acmispon)**

Mission Bay – South Shores Site # 6

MSP Occurrence ID: ACPR_1SOSH006 - 6

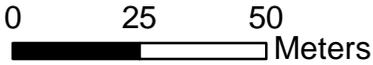


Panorama from Western edge of population, facing South, Southwest, West, Northwest.
Panorama location is 6266789.998 1859495.947 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Acmispon Prostratus - South Shores, Mission Bay



Pop. Area 2001 - 2019
Max Area: 15,970.40 sq. m.
Min Area: 15.60 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense/ing sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

Ambrosia pumila
San Diego Ambrosia



© City of San Diego 2015

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

AMPU_4KULA005_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:
 Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

AMPU_4KULA005_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon americanus</i> - American bird's-foot trefoil	Native	Annual	Herb	0.2
<i>Acmispon micranthus</i> - San Diego bird's-foot trefoil	Native	Annual	Herb	4
<i>Artemisia californica</i> - coastal sagebrush	Native	Perennial	Shrub	0.2
<i>Brassica nigra</i> - black mustard	Nonnative	Annual	Herb	0.2
<i>Bromus hordeaceus</i> - soft brome	Nonnative	Annual	Grass	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	0.2
<i>Camissoniopsis bistorta</i> - southern suncup	Native	Annual	Herb	1
<i>Centaurea melitensis</i> - Maltese star-thistle	Nonnative	Annual	Herb	0.2
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	2
<i>Croton setigerus</i> - dove weed	Native	Annual	Herb	1
<i>Daucus pusillus</i> - American wild carrot	Native	Annual	Herb	0.2
<i>Distichlis spicata</i> - saltgrass	Native	Perennial	Grass	0.2
<i>Erigeron canadensis</i> - Canada horseweed	Native	Annual	Herb	0.2
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	21
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	20
<i>Erodium cicutarium</i> - redstem stork's bill	Nonnative	Annual	Herb	0.2
<i>Erodium moschatum</i> - Musky stork's bill	Nonnative	Annual	Herb	0.2
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	0.2
<i>Gutierrezia californica</i> - San Joaquin snakeweed	Native	Perennial	Shrub	0.2
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
<i>Lythrum hyssopifolia</i> - Hyssop loosestrife	Nonnative	Annual	Herb	0.2
<i>Nuttallanthus texanus</i> - Texas toadflax	Native	Annual	Herb	0.2
<i>Pseudognaphalium beneolens</i> - cudweed	Native	Perennial	Herb	0.2
<i>Pseudognaphalium californicum</i> - ladies' tobacco	Native	Perennial	Herb	0.2
Unknown - herb	Unknown	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

AMPU_4KULA005_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="5"/>	Feral Pig Activity: <input type="text"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="3"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="2"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue weed management actions and consider native grassland habitat restoration project as funding permits

VII. MANAGEMENT ACTIONS IN LAST YEAR

Weed management using targeted herbicide applications and mowing/dethatching

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

None

NOTES:

***Ambrosia pumila* (San Diego Ragweed)**
Mission Trails Regional Park - Kumeyaay Lake
MSP Occurrence ID: AMPU_4KULA005-1



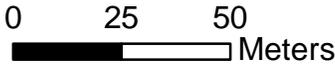
Panorama from Western edge of population, facing Northwest, North, Northeast, East.
Panorama location is 6321443.02 1886016.48 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Ambrosia pumila - Mission Trails Regional Park Kumeyaay Lake



Area 2019: 7,205.98 sq. m.
* Photopoint
□ Ambrosia pumila

Pop. Area 1998 - 2019
Max Area: 16,809.01 sq. m.
Min Area: 5,276.08 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.
THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.
PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense of this information is prohibited.
This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



Bloomeria clevelandii
San Diego Goldenstar



© City of San Diego, 2015

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_4EAEL014_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_4EAELO14_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	3
<i>Acmispon micranthus</i> - San Diego bird's-foot trefoil	Native	Annual	Herb	0.2
<i>Acmispon strigosus</i>	Native	Annual	Herb	0.2
<i>Artemisia californica</i> - coastal sagebrush	Native	Perennial	Shrub	3
<i>Avena fatua</i> - wild oat	Nonnative	Annual	Grass	0.2
<i>Bloomeria clevelandii</i> - San Diego goldenstar	Native	Perennial	Herb	2
<i>Brachypodium distachyon</i> - purple false brome	Nonnative	Annual	Grass	14
<i>Bromus diandrus</i> - rippgut brome	Nonnative	Annual	Grass	0.2
<i>Bromus hordeaceus</i> - soft brome	Nonnative	Annual	Grass	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	7
<i>Castilleja exserta</i> - exserted Indian paintbrush	Native	Annual	Herb	0.2
<i>Centaurea melitensis</i> - Maltese star-thistle	Nonnative	Annual	Herb	1
<i>Cerastium glomeratum</i> - sticky mouseear chickweed	Nonnative	Annual	Herb	0.2
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	0.2
<i>Cryptantha</i> sp. - cryptantha	Native	Annual	Herb	0.2
<i>Daucus pusillus</i> - American wild carrot	Native	Annual	Herb	0.2
<i>Deinandra fasciculata</i> - clustered tarweed	Native	Annual	Herb	2
<i>Dichelostemma capitatum</i> - bluedicks	Native	Perennial	Herb	0.2
<i>Diplacus aurantiacus</i> var. <i>Aurantiacus</i> - sticky monkeyflower	Native	Perennial	Shrub	3
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	2
<i>Erodium cicutarium</i> - redstem stork's bill	Nonnative	Annual	Herb	0.2
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	2
<i>Galium angustifolium</i> - narrowleaf bedstraw	Native	Perennial	Herb	2
<i>Hypochaeris glabra</i> - smooth cat's ear	Nonnative	Annual	Herb	6
<i>Isocoma menziesii</i> - Menzies' goldenbush	Native	Perennial	Shrub	0.2
<i>Jepsonia parryi</i> - Parry's jepsonia	Native	Perennial	Herb	0.2
<i>Lepidium nitidum</i> - shining pepperweed	Native	Annual	Herb	0.2
<i>Logfia filaginoides</i> - California cottonrose	Native	Annual	Herb	1
<i>Lonicera subspicata</i> - southern honeysuckle	Nonnative	Perennial	Shrub	1
<i>Malosma laurina</i> - laurel sumac	Native	Perennial	Shrub	12
<i>Pseudognaphalium</i> sp. - cudweed	Native	Perennial	Herb	0.2
<i>Rhamnus crocea</i> - spiny redberry	Native	Perennial	Shrub	5
<i>Salvia apiana</i> - white sage	Native	Perennial	Shrub	3
<i>Sanicula arguta</i> - sharp toothed snakeroot	Native	Perennial	Herb	0.2
<i>Silene gallica</i> - common catchfly	Nonnative	Annual	Herb	0.2
<i>Sisyrinchium bellum</i> - Western blue-eyed grass	Native	Perennial	Herb	0.2
<i>Sonchus oleraceus</i> - common sowthistle	Nonnative	Annual	Herb	0.2
<i>Stipa pulchra</i> - purple needle grass	Native	Perennial	Grass	0.2
Unknown - herb	Unknown	Annual	Herb	0.2
<i>Viola pedunculata</i>	Native	Perennial	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_4EAELO14_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text"/>	Feral Pig Activity: <input type="text"/>	Altered Hydrology: <input type="text"/>
Nonnative Grass: <input type="text"/>	Trampling: <input type="text"/>	Erosion: <input type="text"/>
Nonnative Woody Plants: <input type="text"/>	Vandalism: <input type="text"/>	Urban Runoff: <input type="text"/>
Competitive Native Plants: <input type="text"/>	Current Grazing: <input type="text"/>	Slope Movement: <input type="text"/>
Dumping/Trash: <input type="text"/>	Historic Grazing: <input type="text"/>	Soil Compaction: <input type="text"/>
Encampments: <input type="text"/>	Historic Agriculture: <input type="text"/>	Fuel Modification Zone/ Fire Break: <input type="text"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue Preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

None

NOTES:

***Bloomeria clevelandii* (San Diego Goldenstar)**

East Elliott # 1

MSP Occurrence ID: BLCL_4EAEL014 - 1



Panorama from Southwestern edge of population, facing West, Southwest, South, Southeast, East.

Panorama location is 6319260.20 1891551.76 NAD83 State Plane California Zone 6 (feet)

Photos merged using ArcSoft Panorama Maker 4.

Bloomeria clevelandii - East Elliott

Point 3
Area: 2,493.86 sq. m.

Point 2
Area: 132.70 sq. m.

Point 5
Area: 25,155.28 sq. m.

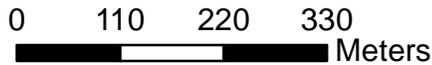
Point 1
Area: 65,558.38 sq. m.

Area 2019: 93,340.22 sq. m.

 Photopoint

 Bloomeria clevelandii

Pop. Area 2008 - 2019
Max Area: 809,519.00 sq. m.
Min Area: 2,404.00 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense of this information requires a separate sublicense agreement.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_4EAEL014_2

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_4EAELO14_2

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	1
<i>Acmispon micranthus</i> - San Diego bird's-foot trefoil	Native	Annual	Herb	0.2
<i>Adenostoma fasciculatum</i> - chamise	Native	Perennial	Shrub	18
<i>Antirrhinum nuttallianum</i> - Nuttall's snapdragon	Native	Annual	Herb	0.2
<i>Bloomeria clevelandii</i> - San Diego goldenstar	Native	Perennial	Herb	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	1
<i>Castilleja exserta</i> - exserted Indian paintbrush	Native	Annual	Herb	0.2
<i>Chlorogalum pomeridianum</i> - soap plant	Native	Perennial	Herb	0.2
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	0.2
<i>Cryptantha</i> sp. - cryptantha	Native	Annual	Herb	0.2
<i>Daucus pusillus</i> - American wild carrot	Native	Annual	Herb	1
<i>Deinandra fasciculata</i> - clustered tarweed	Native	Annual	Herb	0.2
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	1
<i>Erodium cicutarium</i> - redstem stork's bill	Nonnative	Annual	Herb	0.2
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	15
<i>Hypochaeris glabra</i> - smooth cat's ear	Nonnative	Annual	Herb	1
<i>Lamarckia aurea</i> - goldentop grass	Nonnative	Annual	Grass	0.5
<i>Lasthenia gracilis</i> - needle goldfields	Native	Annual	Herb	1
<i>Lepidium nitidum</i> - shining pepperweed	Native	Annual	Herb	0.2
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	3
<i>Lysimachia arvensis</i> - Scarlet pimpernel	Nonnative	Annual	Herb	0.2
<i>Navarretia hamata</i> - hooked pincushionplant	Native	Annual	Herb	0.2
<i>Plantago erecta</i> - California plantain	Native	Annual	Herb	0.2
<i>Rhamnus crocea</i> - spiny redberry	Native	Perennial	Shrub	3
<i>Selaginella cinerascens</i> - mesa spikemoss	Native	Perennial	Fern	0.2
<i>Silene gallica</i> - common catchfly	Nonnative	Annual	Herb	0.2
<i>Sonchus oleraceus</i> - common sowthistle	Nonnative	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_4EAELO14_2

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text"/>	Feral Pig Activity: <input type="text"/>	Altered Hydrology: <input type="text"/>
Nonnative Grass: <input type="text"/>	Trampling: <input type="text"/>	Erosion: <input type="text"/>
Nonnative Woody Plants: <input type="text"/>	Vandalism: <input type="text"/>	Urban Runoff: <input type="text"/>
Competitive Native Plants: <input type="text"/>	Current Grazing: <input type="text"/>	Slope Movement: <input type="text"/>
Dumping/Trash: <input type="text"/>	Historic Grazing: <input type="text"/>	Soil Compaction: <input type="text"/>
Encampments: <input type="text"/>	Historic Agriculture: <input type="text"/>	Fuel Modification Zone/ Fire Break: <input type="text"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stweradship

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

None

NOTES:

Raven nest on wooden tramission pole

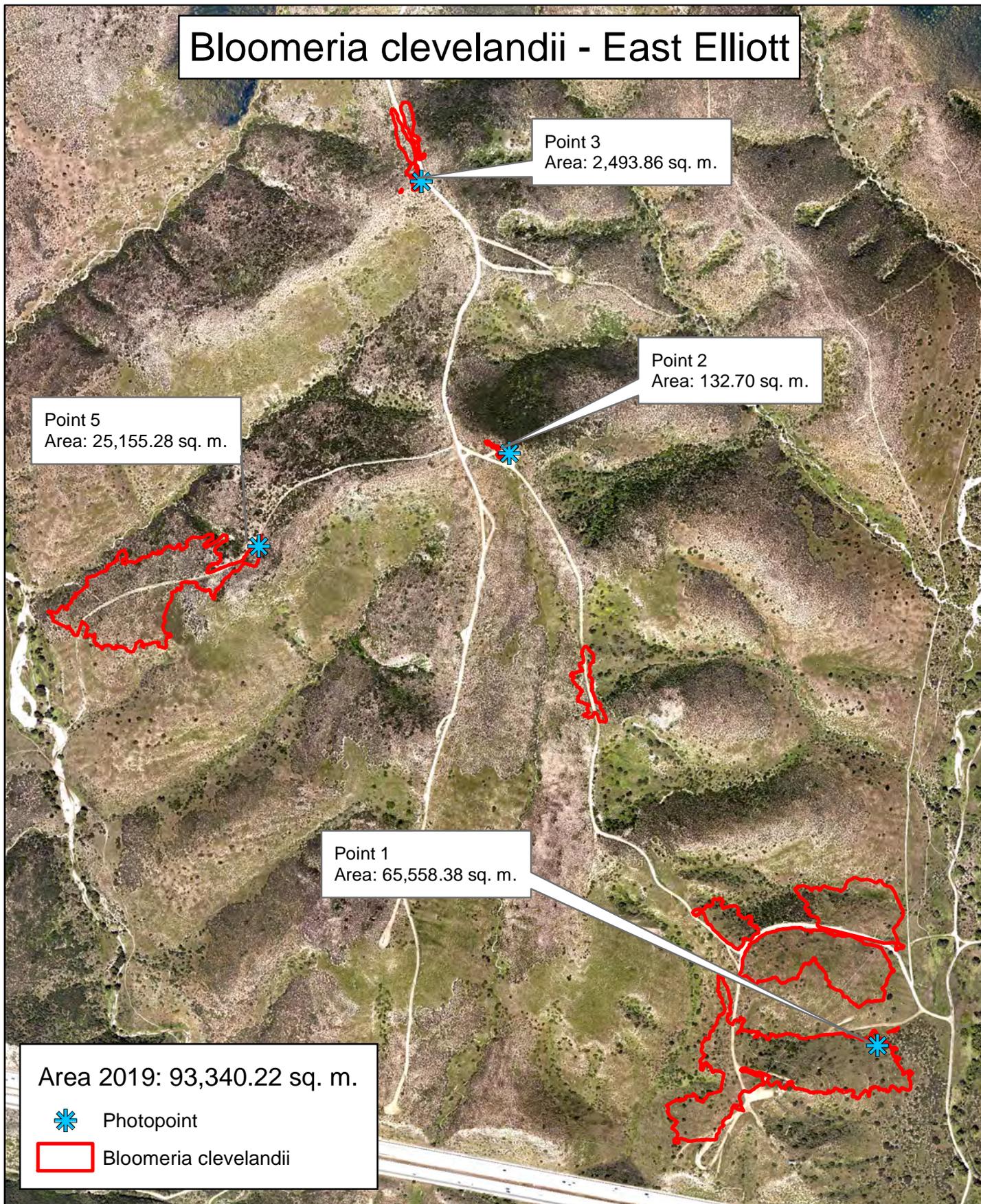
***Bloomeria clevelandii* (San Diego Goldenstar)
East Elliott # 2**

MSP Occurrence ID: BLCL_4EAEL014 - 2



Panorama from Southeastern edge of population, facing North, West, South.
Panorama location is 6317389.88 1894565.90 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Bloomeria clevelandii - East Elliott



Pop. Area 2008 - 2019
 Max Area: 809,519.00 sq. m.
 Min Area: 2,404.00 sq. m.



Source: San GIS & City of San Diego Parks & Rec
 Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense of this information requires a separate sublicense agreement.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_4EAEL014_3

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_4EAELO14_3

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	2
<i>Adenostoma fasciculatum</i> - chamise	Native	Perennial	Shrub	20
<i>Antirrhinum nuttallianum</i> - Nuttall's snapdragon	Native	Annual	Herb	0.2
<i>Bloomeria clevelandii</i> - San Diego goldenstar	Native	Perennial	Herb	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	0.2
<i>Calochortus</i> sp. - lily	Native	Perennial	Herb	0.2
<i>Castilleja exserta</i> - exserted Indian paintbrush	Native	Annual	Herb	0.2
<i>Chlorogalum pomeridianum</i> - soap plant	Native	Perennial	Herb	0.2
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	2
<i>Cryptantha</i> sp. - cryptantha	Native	Annual	Herb	0.2
<i>Daucus pusillus</i> - American wild carrot	Native	Annual	Herb	0.2
<i>Dichelostemma capitatum</i> - bluedicks	Native	Perennial	Herb	0.2
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	4
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	5
<i>Hypochaeris glabra</i> - smooth cat's ear	Nonnative	Annual	Herb	0.2
<i>Lamarckia aurea</i> - goldentop grass	Nonnative	Annual	Grass	0.2
<i>Lasthenia gracilis</i> - needle goldfields	Native	Annual	Herb	6
<i>Lepidium nitidum</i> - shining pepperweed	Native	Annual	Herb	0.2
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	1
<i>Lupinus concinnus</i> - Bajada lupine	Native	Annual	Herb	0.2
<i>Navarretia hamata</i> - hooked pincushionplant	Native	Annual	Herb	0.2
<i>Pentachaeta aurea</i> - golden chaetopappa	Native	Annual	Herb	0.2
<i>Plantago erecta</i> - California plantain	Native	Annual	Herb	0.2
<i>Psilocarphus tenellus</i> - slender woolly heads	Native	Annual	Herb	1
<i>Selaginella cinerascens</i> - mesa spikemoss	Native	Perennial	Fern	1
<i>Silene gallica</i> - common catchfly	Nonnative	Annual	Herb	0.2
<i>Sonchus asper</i> - spiny sowthistle	Nonnative	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_4EAELO14_3

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text"/>
Nonnative Grass: <input type="text"/>	Trampling: <input type="text"/>	Erosion: <input type="text"/>
Nonnative Woody Plants: <input type="text"/>	Vandalism: <input type="text"/>	Urban Runoff: <input type="text"/>
Competitive Native Plants: <input type="text"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text"/>
Dumping/Trash: <input type="text"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text"/>
Encampments: <input type="text"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

None

NOTES:

***Bloomeria clevelandii* (San Diego Goldenstar)
East Elliott # 3**

MSP Occurrence ID: BLCL_4EAEL014 - 3



Panorama from Northwestern edge of population, facing South, Southwest, West, Northwest.
Panorama location is 6316943.661 1895945.738 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Bloomeria clevelandii - East Elliott

Point 3
Area: 2,493.86 sq. m.

Point 2
Area: 132.70 sq. m.

Point 5
Area: 25,155.28 sq. m.

Point 1
Area: 65,558.38 sq. m.

Area 2019: 93,340.22 sq. m.

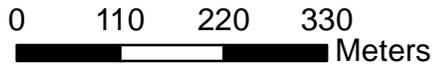


Photopoint



Bloomeria clevelandii

Pop. Area 2008 - 2019
Max Area: 809,519.00 sq. m.
Min Area: 2,404.00 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense of this information requires a separate sublicense agreement.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_4EAEL014_5

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_4EAELO14_5

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Acmispon glaber - deerweed	Native	Perennial	Shrub	8
Adenostoma fasciculatum - chamise	Native	Perennial	Shrub	9
Antirrhinum nuttallianum - Nuttall's snapdragon	Native	Annual	Herb	0.2
Bloomeria clevelandii - San Diego goldenstar	Native	Perennial	Herb	0.2
Brachypodium distachyon - purple false brome	Nonnative	Annual	Grass	0.2
Bromus madritensis - compact brome	Nonnative	Annual	Grass	0.2
Ceanothus tomentosus - woolyleaf ceanothus	Native	Perennial	Shrub	3
Centaurea melitensis - Maltese star-thistle	Nonnative	Annual	Herb	0.2
Chlorogalum pomeridianum - soap plant	Native	Perennial	Herb	1
Crassula connata - sand pygmyweed	Native	Annual	Herb	0.2
Deinandra fasciculata - clustered tarweed	Native	Annual	Herb	0.2
Diplacus aurantiacus var. Aurantiacus - sticky monkeyflower	Native	Perennial	Shrub	4
Eriogonum fasciculatum - Eastern Mojave buckwheat	Native	Perennial	Shrub	1
Eriophyllum confertiflorum - golden yarrow	Native	Annual	Herb	0.2
Festuca myuros - rattail fescue	Nonnative	Annual	Grass	6
Galium angustifolium - narrowleaf bedstraw	Native	Perennial	Herb	0.2
Helianthemum scoparium - Bisbee peak rushrose	Native	Perennial	Shrub	0.2
Hypochaeris glabra - smooth cat's ear	Nonnative	Annual	Herb	2
Juncus bufonius - toad rush	Native	Annual	Herb	2
Lamarckia aurea - goldentop grass	Nonnative	Annual	Grass	2
Logfia gallica - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
Marah macrocarpus - Cucamonga manroot	Native	Perennial	Herb	0.2
Osmadenia tenella - false rosinweed	Native	Annual	Herb	0.2
Pellaea mucronata - birdfoot cliffbrake	Native	Perennial	Fern	0.2
Plantago erecta - California plantain	Native	Annual	Herb	0.2
Psilocarphus tenellus - slender woolly heads	Native	Annual	Herb	0.2
Quercus berberidifolia - scrub oak	Native	Perennial	Tree	2
Silene gallica - common catchfly	Nonnative	Annual	Herb	0.2
Sisyrinchium bellum - Western blue-eyed grass	Native	Perennial	Herb	0.2
Sonchus asper - spiny sowthistle	Nonnative	Annual	Herb	0.2
Spergularia bocconi - sand spurry	Nonnative	Annual	Herb	1
Stipa lepida - foothill needle grass	Native	Perennial	Grass	1
Unknown - bulb	Unknown	Unknown	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_4EAELO14_5

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="4"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserved stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserved stewardship

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

None

NOTES:

SDG&E access road maintained as needed.

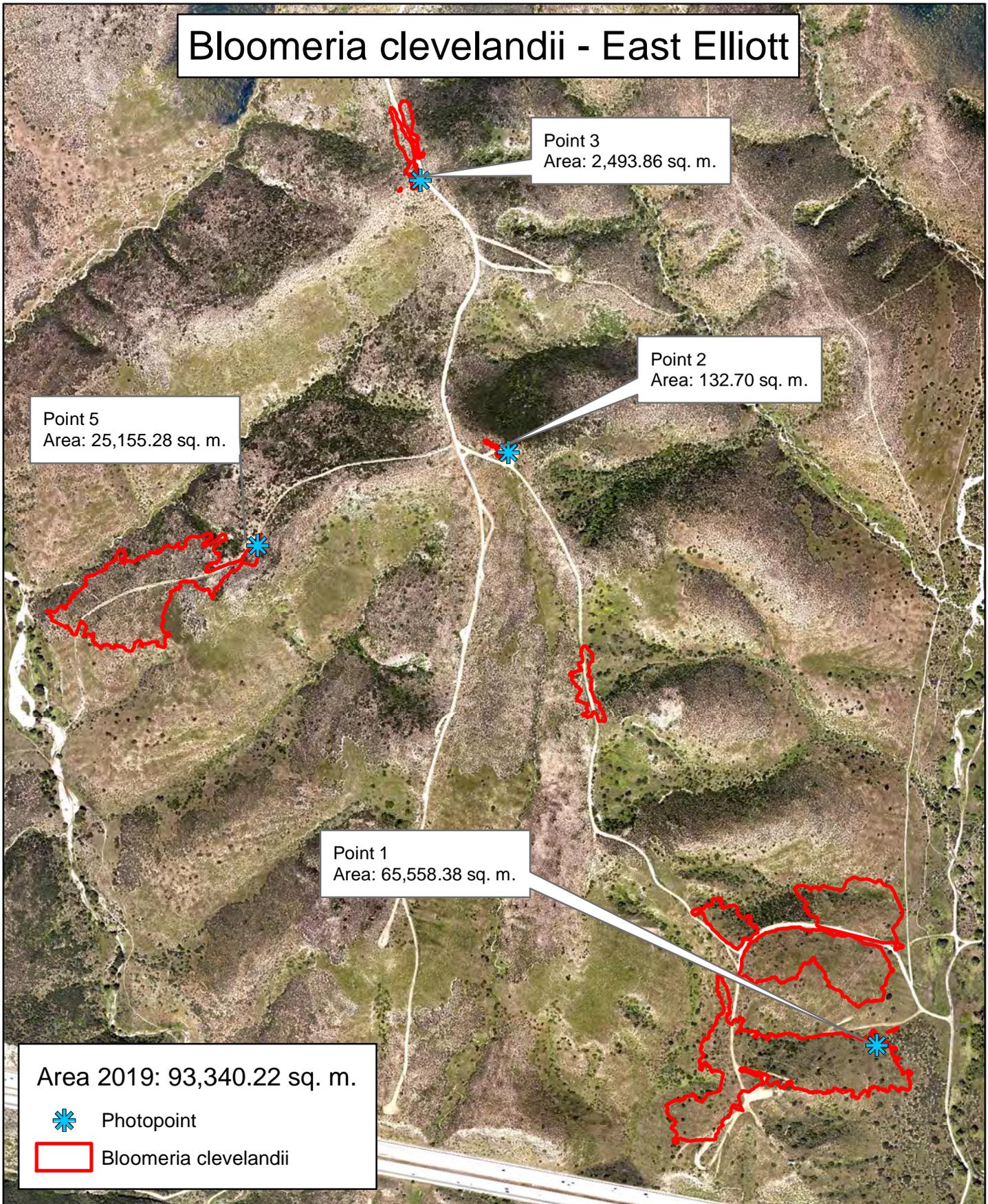
***Bloomeria clevelandii* (San Diego Goldenstar) East Elliott # 5**

MSP Occurrence ID: BLCL_4EAEL014 - 5



Panorama from Western edge of population, facing Southwest, South, Southeast.
Panorama location is 6316118.12 1894089.91 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Bloomeria clevelandii - East Elliott



Pop. Area 2008 - 2019
 Max Area: 809,519.00 sq. m.
 Min Area: 2,404.00 sq. m.



Source: San GIS & City of San Diego Parks & Rec
 Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense of this information requires a separate sublicense agreement.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_6LORI021_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_6LORI021_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	1
<i>Adenostoma fasciculatum</i> - chamise	Native	Perennial	Shrub	20
<i>Antirrhinum nuttallianum</i> - Nuttall's snapdragon	Native	Annual	Herb	0.2
<i>Apiastrum angustifolium</i> - mock parsley	Native	Annual	Herb	0.2
<i>Avena barbata</i> - slender oat	Nonnative	Annual	Grass	0.2
<i>Bloomeria clevelandii</i> - San Diego goldenstar	Native	Perennial	Herb	0.2
<i>Brodiaea orcuttii</i> - Orcutt's brodiaea	Native	Perennial	Herb	5
<i>Bromus hordeaceus</i> - soft brome	Nonnative	Annual	Grass	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	2
<i>Callitriche marginata</i> - California water starwort	Native	Annual	Herb	2
<i>Castilleja exserta</i> - exserted Indian paintbrush	Native	Annual	Herb	0.2
<i>Chlorogalum pomeridianum</i> - soap plant	Native	Perennial	Herb	0.2
<i>Crassula aquatica</i> - aquatic pygmy weed	Native	Annual	Herb	2
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	0.2
<i>Cryptantha</i> sp. - cryptantha	Native	Annual	Herb	0.2
<i>Daucus pusillus</i> - American wild carrot	Native	Annual	Herb	1
<i>Deinandra fasciculata</i> - clustered tarweed	Native	Annual	Herb	1
<i>Deschampsia danthonioides</i> - annual hairgrass	Native	Annual	Grass	0.2
<i>Dichelostemma capitatum</i> - bluedicks	Native	Perennial	Herb	0.2
<i>Downingia cuspidata</i> - Toothed downingia	Native	Annual	Herb	0.2
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	1
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	1
<i>Gastridium phleoides</i> - nit grass	Nonnative	Annual	Grass	0.2
<i>Helianthemum scoparium</i> - Bisbee peak rushrose	Native	Perennial	Shrub	0.2
<i>Hordeum marinum</i> - seaside barley	Nonnative	Annual	Grass	2
<i>Hypochaeris glabra</i> - smooth cat's ear	Nonnative	Annual	Herb	2
<i>Juncus bufonius</i> - toad rush	Native	Annual	Herb	1
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
<i>Lupinus bicolor</i> - annual lupine	Native	Annual	Herb	0.2
<i>Lysimachia arvensis</i> - Scarlet pimpernel	Nonnative	Annual	Herb	0.2
<i>Lythrum hyssopifolia</i> - Hyssop loosestrife	Nonnative	Annual	Herb	0.2
<i>Muilla maritima</i> - sea muilla	Native	Perennial	Herb	0.2
<i>Navarretia hamata</i> - hooked pincushionplant	Native	Annual	Herb	2
<i>Pentachaeta aurea</i> - golden chaetopappa	Native	Annual	Herb	0.2
<i>Pogogyne abramsii</i> - San Diego mesa mint	Native	Annual	Herb	7
<i>Psilocarphus brevissimus</i> - woolly marble	Native	Annual	Herb	20
<i>Psilocarphus tenellus</i> - slender woolly heads	Native	Annual	Herb	0.2
<i>Selaginella cinerascens</i> - mesa spikemoss	Native	Perennial	Fern	0.2
<i>Uropappus lindleyi</i> - silver puffs	Native	Annual	Herb	0.2
<i>Zeltnera venusta</i> - charming centaury	Native	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_6LORI021_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="4"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="4"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship and VPHCP required maintenace visits

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

None

NOTES:

***Bloomeria clevelandii* (San Diego Goldenstar)**
Lopez Ridge

MSP Occurrence ID: BLCL_6LORI021 - 1



Panorama from Eastern edge of population, facing Southwest, West, Northwest, North, Northeast.

Panorama location is 6278246.40 1915522.73 NAD83 State Plane California Zone 6 (feet)

Photos merged using ArcSoft Panorama Maker 4.

Bloomeria clevelandii - Lopez Ridge



Area 2019: 5,721.48 sq. m.

 Photopoint

 Bloomeria clevelandii

Pop. Area 2011 - 2019
Max Area: 5,721.48 sq. m.
Min Area: 12.00 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense of sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_3MAVA005_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_3MAVA005_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon micranthus</i> - San Diego bird's-foot trefoil	Native	Annual	Herb	0.2
<i>Artemisia californica</i> - coastal sagebrush	Native	Perennial	Shrub	8
<i>Avena barbata</i> - slender oat	Nonnative	Annual	Grass	0.2
<i>Bahiopsis laciniata</i> - torleaf goldeneye	Native	Perennial	Shrub	1
<i>Bloomeria clevelandii</i> - San Diego goldenstar	Native	Perennial	Herb	8
<i>Brassica nigra</i> - black mustard	Nonnative	Annual	Herb	0.2
<i>Bromus diandrus</i> - ripgut brome	Nonnative	Annual	Grass	0.2
<i>Bromus hordeaceus</i> - soft brome	Nonnative	Annual	Grass	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	3
<i>Centaurea melitensis</i> - Maltese star-thistle	Nonnative	Annual	Herb	10
<i>Clarkia purpurea</i> - winecup clarkia	Native	Annual	Herb	0.2
<i>Corethrogyne filaginifolia</i> - California sandaster	Native	Perennial	Herb	0.2
<i>Dichelostemma capitatum</i> - bluedicks	Native	Perennial	Herb	1
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	0.2
<i>Eriophyllum confertiflorum</i> - golden yarrow	Native	Annual	Herb	0.2
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	3
<i>Erodium cicutarium</i> - redstem stork's bill	Nonnative	Annual	Herb	0.2
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	4
<i>Festuca perennis</i> - Italian rye grass	Nonnative	Annual	Grass	0.2
<i>Galium angustifolium</i> - narrowleaf bedstraw	Native	Perennial	Herb	1
<i>Gutierrezia californica</i> - San Joaquin snakeweed	Native	Perennial	Shrub	0.2
<i>Hypochaeris glabra</i> - smooth cat's ear	Nonnative	Annual	Herb	0.2
<i>Isocoma menziesii</i> - Menzies' goldenbush	Native	Perennial	Shrub	0.2
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
<i>Lysimachia arvensis</i> - Scarlet pimpernel	Nonnative	Annual	Herb	0.2
<i>Malosma laurina</i> - laurel sumac	Native	Perennial	Shrub	3
<i>Osmadenia tenella</i> - false rosinweed	Native	Annual	Herb	0.2
<i>Oxalis californica</i> - California wood sorrel	Native	Annual	Herb	0.2
<i>Rhamnus crocea</i> - spiny redberry	Native	Perennial	Shrub	4
<i>Salvia apiana</i> - white sage	Native	Perennial	Shrub	2
<i>Silene gallica</i> - common catchfly	Nonnative	Annual	Herb	1
<i>Sonchus oleraceus</i> - common sowthistle	Nonnative	Annual	Herb	0.2
<i>Stipa lepida</i> - foothill needle grass	Native	Perennial	Grass	3
<i>Trifolium</i> sp. - clover	Unknown	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_3MAVA005_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="5"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="3"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="2"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

Badger foraging burrows

NOTES:

***Bloomeria clevelandii* (San Diego Goldenstar)
Marron Valley # 1**

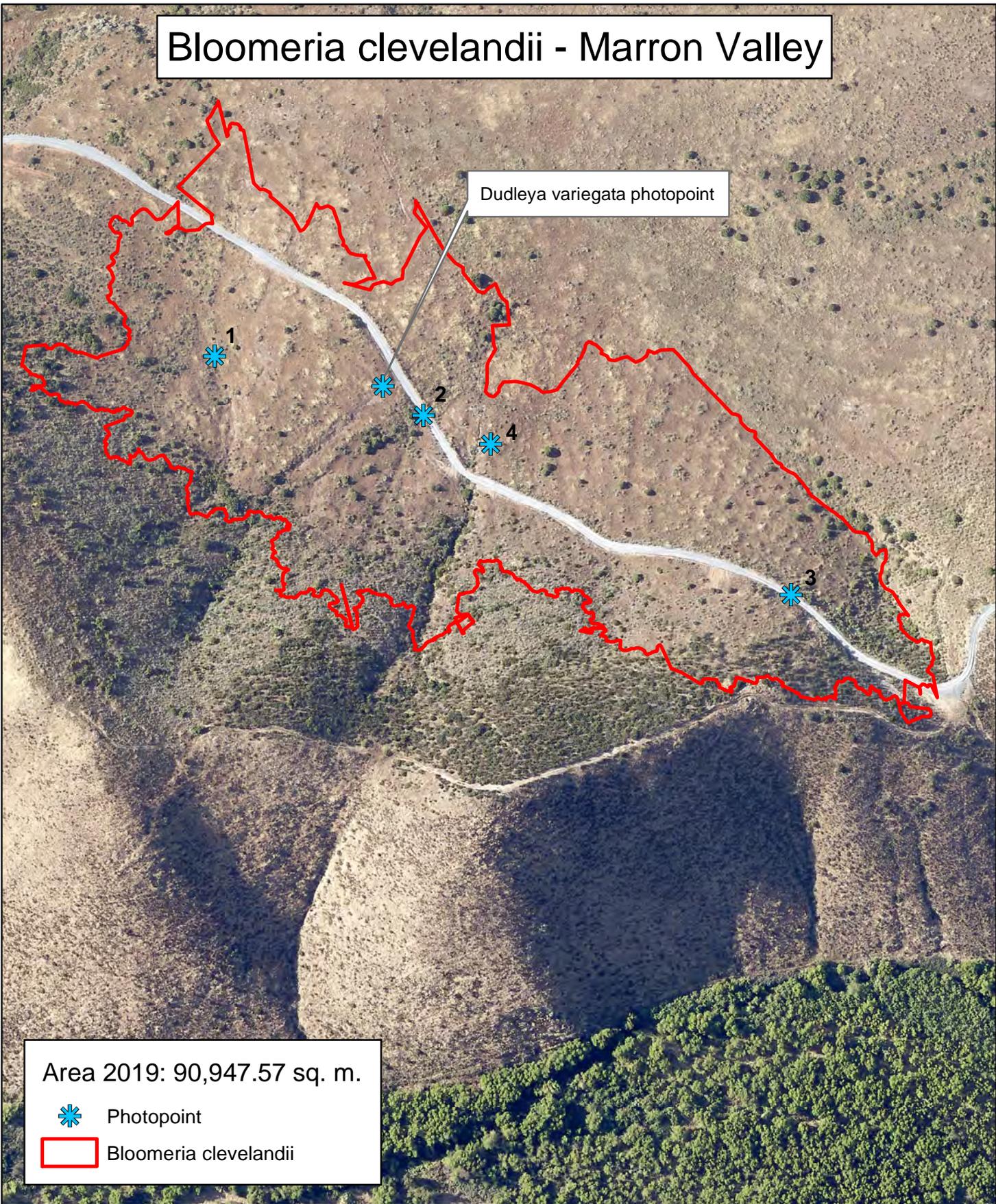
MSP Occurrence ID: BLCL_3MAVA005 - 1



Panorama from Western edge of population, facing Southeast, South, West, North.
Panorama location is 6406792.551 1788021.0137 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Bloomeria clevelandii - Marron Valley

Dudleya variegata photopoint



Area 2019: 90,947.57 sq. m.

- ☼ Photopoint
- ☐ Bloomeria clevelandii

Pop. Area 2004 - 2019
Max Area: 139,269.00 sq. m.
Min Area: 0 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense of this information is prohibited.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_3MAVA005_2

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_3MAVA005_2

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon americanus</i> - American bird's-foot trefoil	Native	Annual	Herb	0.2
<i>Acmispon micranthus</i> - San Diego bird's-foot trefoil	Native	Annual	Herb	2
<i>Artemisia californica</i> - coastal sagebrush	Native	Perennial	Shrub	5
<i>Avena barbata</i> - slender oat	Nonnative	Annual	Grass	0.2
<i>Baccharis sarothroides</i> - desertbroom	Native	Perennial	Shrub	1
<i>Bloomeria clevelandii</i> - San Diego goldenstar	Native	Perennial	Herb	4
<i>Bromus diandrus</i> - ripgut brome	Nonnative	Annual	Grass	0.2
<i>Bromus hordeaceus</i> - soft brome	Nonnative	Annual	Grass	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	1
<i>Calochortus splendens</i> - splendid mariposa lily	Native	Perennial	Herb	0.2
<i>Calystegia macrostegia</i> - island false bindweed	Native	Perennial	Herb	0.2
<i>Centaurea melitensis</i> - Maltese star-thistle	Nonnative	Annual	Herb	0.2
<i>Clarkia purpurea</i> - winecup clarkia	Native	Annual	Herb	0.2
<i>Corethrogyne filaginifolia</i> - California sandaster	Native	Perennial	Herb	0.2
<i>Dichelostemma capitatum</i> - blue-dicks	Native	Perennial	Herb	0.2
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	4
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	9
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	1
<i>Gutierrezia californica</i> - San Joaquin snakeweed	Native	Perennial	Shrub	2
<i>Hirschfeldia incana</i> - shortpod mustard	Nonnative	Perennial	Herb	2
<i>Hypochaeris glabra</i> - smooth cat's ear	Nonnative	Annual	Herb	0.2
<i>Isocoma menziesii</i> - Menzies' goldenbush	Native	Perennial	Shrub	0.2
<i>Lepidium nitidum</i> - shining pepperweed	Native	Annual	Herb	0.2
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
<i>Lysimachia arvensis</i> - Scarlet pimpernel	Nonnative	Annual	Herb	0.2
<i>Malosma laurina</i> - laurel sumac	Native	Perennial	Shrub	3
<i>Osmadenia tenella</i> - false rosinweed	Native	Annual	Herb	0.2
<i>Salvia apiana</i> - white sage	Native	Perennial	Shrub	3
<i>Sanicula arguta</i> - sharp toothed snakeroot	Native	Perennial	Herb	0.2
<i>Silene gallica</i> - common catchfly	Nonnative	Annual	Herb	0.2
<i>Sonchus oleraceus</i> - common sowthistle	Nonnative	Annual	Herb	0.2
<i>Stipa pulchra</i> - purple needle grass	Native	Perennial	Grass	1
<i>Stylocline gnaphaloides</i> - everlasting nest straw	Native	Annual	Herb	0.2
<i>Trifolium depauperatum</i> var. <i>truncatum</i> - dwarf sack clover	Native	Annual	Herb	0.2
<i>Trifolium</i> sp. - clover	Unknown	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_3MAVA005_2

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text"/>	Feral Pig Activity: <input type="text"/>	Altered Hydrology: <input type="text"/>
Nonnative Grass: <input type="text"/>	Trampling: <input type="text"/>	Erosion: <input type="text"/>
Nonnative Woody Plants: <input type="text"/>	Vandalism: <input type="text"/>	Urban Runoff: <input type="text"/>
Competitive Native Plants: <input type="text"/>	Current Grazing: <input type="text"/>	Slope Movement: <input type="text"/>
Dumping/Trash: <input type="text"/>	Historic Grazing: <input type="text"/>	Soil Compaction: <input type="text"/>
Encampments: <input type="text"/>	Historic Agriculture: <input type="text"/>	Fuel Modification Zone/ Fire Break: <input type="text"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

None

NOTES:

***Bloomeria clevelandii* (San Diego Goldenstar)
Marron Valley # 2**

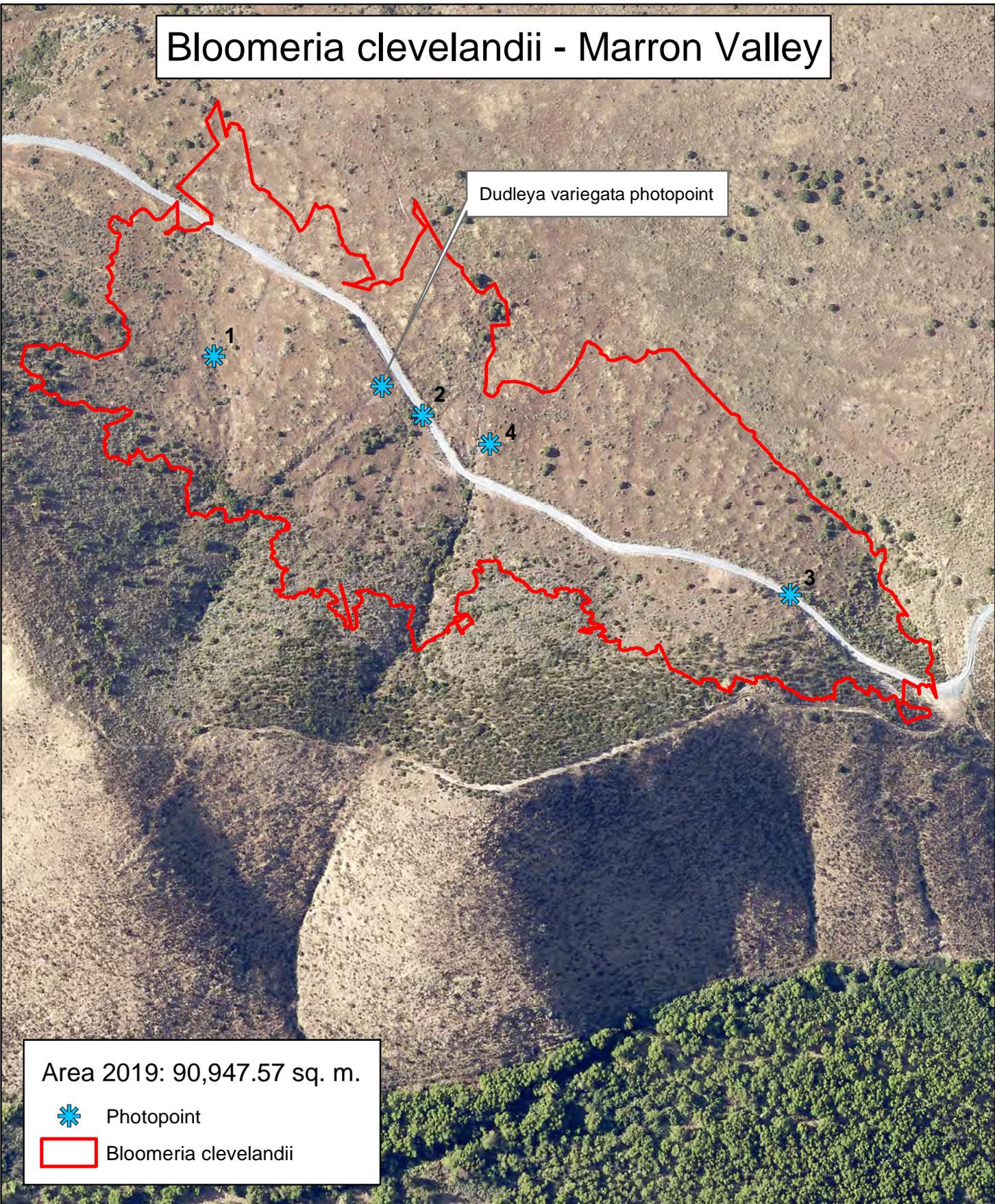
MSP Occurrence ID: BLCL_3MAVA005 - 2



Panorama from Western edge of population, facing South, Southwest.
Panorama location is 6407225.72 1787897.83 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Bloomeria clevelandii - Marron Valley

Dudleya variegata photopoint



Area 2019: 90,947.57 sq. m.

-  Photopoint
-  Bloomeria clevelandii

Pop. Area 2004 - 2019
Max Area: 139,269.00 sq. m.
Min Area: 0 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense of this information is prohibited.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_3MAVA005_3

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_3MAVA005_3

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Ambrosia psilostachya - Cuman ragweed	Native	Perennial	Herb	0.2
Artemisia californica - coastal sagebrush	Native	Perennial	Shrub	12
Avena barbata - slender oat	Nonnative	Annual	Grass	0.2
Bloomeria clevelandii - San Diego goldenstar	Native	Perennial	Herb	6
Bromus diandrus - ripgut brome	Nonnative	Annual	Grass	3
Bromus hordeaceus - soft brome	Nonnative	Annual	Grass	0.2
Bromus madritensis - compact brome	Nonnative	Annual	Grass	1
Centaurea melitensis - Maltese star-thistle	Nonnative	Annual	Herb	0.2
Cerastium glomeratum - sticky mouseear chickweed	Nonnative	Annual	Herb	0.2
Clarkia purpurea - winecup clarkia	Native	Annual	Herb	0.2
Corethrogyne filaginifolia - California sandaster	Native	Perennial	Herb	0.2
Daucus pusillus - American wild carrot	Native	Annual	Herb	0.2
Dichelostemma capitatum - bluedicks	Native	Perennial	Herb	0.2
Eriogonum fasciculatum - Eastern Mojave buckwheat	Native	Perennial	Shrub	4
Eriophyllum confertiflorum - golden yarrow	Native	Annual	Herb	1
Erodium cicutarium - redstem stork's bill	Nonnative	Annual	Herb	0.2
Festuca perennis - Italian rye grass	Nonnative	Annual	Grass	1
Galium angustifolium - narrowleaf bedstraw	Native	Perennial	Herb	1
Gutierrezia californica - San Joaquin snakeweed	Native	Perennial	Shrub	2
Hedypnois cretica - Cretanweed	Nonnative	Annual	Herb	0.2
Hesperoyucca whipplei - chaparral yucca	Native	Perennial	Shrub	0.2
Hirschfeldia incana - shortpod mustard	Nonnative	Perennial	Herb	3
Hypochaeris glabra - smooth cat's ear	Nonnative	Annual	Herb	0.2
Isocoma menziesii - Menzies' goldenbush	Native	Perennial	Shrub	0.2
Layia platyglossa - coastal tidytips	Native	Annual	Herb	1
Logfia gallica - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
Malosma laurina - laurel sumac	Native	Perennial	Shrub	1
Melica imperfecta - California melic	Native	Annual	Herb	1
Pentagramma glanduloviscida	Native	Perennial	Fern	0.2
Phalaris minor - littleseed canarygrass	Nonnative	Annual	Grass	0.2
Plantago erecta - California plantain	Native	Annual	Herb	1
Pseudognaphalium stramineum - cottonbatting plant	Native	Perennial	Herb	0.2
Salvia apiana - white sage	Native	Perennial	Shrub	4
Silene gallica - common catchfly	Nonnative	Annual	Herb	0.2
Sonchus oleraceus - common sowthistle	Nonnative	Annual	Herb	0.2
Stipa pulchra - purple needle grass	Native	Perennial	Grass	5
Trifolium depauperatum var. truncatum - dwarf sack clover	Native	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_3MAVA005_3

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text"/>	Feral Pig Activity: <input type="text"/>	Altered Hydrology: <input type="text"/>
Nonnative Grass: <input type="text"/>	Trampling: <input type="text"/>	Erosion: <input type="text"/>
Nonnative Woody Plants: <input type="text"/>	Vandalism: <input type="text"/>	Urban Runoff: <input type="text"/>
Competitive Native Plants: <input type="text"/>	Current Grazing: <input type="text"/>	Slope Movement: <input type="text"/>
Dumping/Trash: <input type="text"/>	Historic Grazing: <input type="text"/>	Soil Compaction: <input type="text"/>
Encampments: <input type="text"/>	Historic Agriculture: <input type="text"/>	Fuel Modification Zone/ Fire Break: <input type="text"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

None

NOTES:

***Bloomeria clevelandii* (San Diego Goldenstar)
Marron Valley # 3**

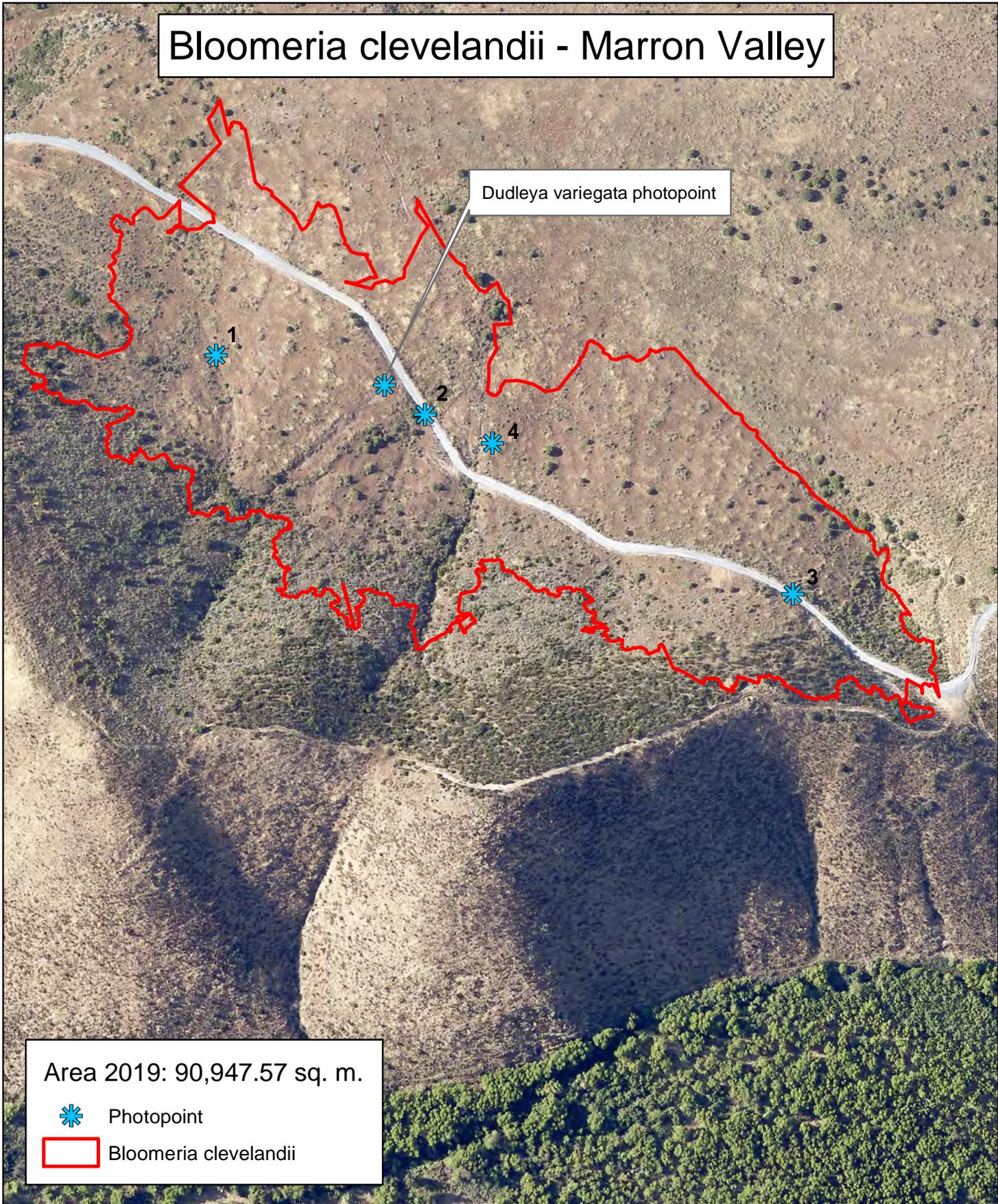
MSP Occurrence ID: BLCL_3MAVA005 - 3



Panorama from Northeastern edge of population, facing Northwest, North, Northeast, East.
Panorama location is 6407990.15 1787523.48 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Bloomeria clevelandii - Marron Valley

Dudleya variegata photopoint



Area 2019: 90,947.57 sq. m.

 Photopoint

 Bloomeria clevelandii

Pop. Area 2004 - 2019
Max Area: 139,269.00 sq. m.
Min Area: 0 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense of this information is prohibited.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_3MAVA005_4

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_3MAVA005_4

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon micranthus</i> - San Diego bird's-foot trefoil	Native	Annual	Herb	1
<i>Artemisia californica</i> - coastal sagebrush	Native	Perennial	Shrub	1
<i>Avena barbata</i> - slender oat	Nonnative	Annual	Grass	1
<i>Bloomeria clevelandii</i> - San Diego goldenstar	Native	Perennial	Herb	1
<i>Brassica nigra</i> - black mustard	Nonnative	Annual	Herb	0.2
<i>Bromus diandrus</i> - ripgut brome	Nonnative	Annual	Grass	0.2
<i>Bromus hordeaceus</i> - soft brome	Nonnative	Annual	Grass	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	5
<i>Calochortus splendens</i> - splendid mariposa lily	Native	Perennial	Herb	0.2
<i>Centaurea melitensis</i> - Maltese star-thistle	Nonnative	Annual	Herb	0.2
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	0.2
<i>Croton setigerus</i> - dove weed	Native	Annual	Herb	0.2
<i>Dichelostemma capitatum</i> - blue dicks	Native	Perennial	Herb	0.2
<i>Dudleya variegata</i> - Variegated dudleya	Native	Perennial	Herb	0.2
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	3
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	37
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	1
<i>Gastridium phleoides</i> - nit grass	Nonnative	Annual	Grass	0.2
<i>Gutierrezia californica</i> - San Joaquin snakeweed	Native	Perennial	Shrub	1
<i>Hedypnois cretica</i> - Cretanweed	Nonnative	Annual	Herb	0.2
<i>Hypochaeris glabra</i> - smooth cat's ear	Nonnative	Annual	Herb	0.2
<i>Isocoma menziesii</i> - Menzies' goldenbush	Native	Perennial	Shrub	1
<i>Lasthenia gracilis</i> - needle goldfields	Native	Annual	Herb	2
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
<i>Lysimachia arvensis</i> - Scarlet pimpernel	Nonnative	Annual	Herb	0.2
<i>Osmadenia tenella</i> - false rosinweed	Native	Annual	Herb	0.2
<i>Plantago erecta</i> - California plantain	Native	Annual	Herb	0.2
<i>Selaginella cinerascens</i> - mesa spikemoss	Native	Perennial	Fern	1
<i>Silene gallica</i> - common catchfly	Nonnative	Annual	Herb	0.2
<i>Sonchus oleraceus</i> - common sowthistle	Nonnative	Annual	Herb	0.2
<i>Stipa pulchra</i> - purple needle grass	Native	Perennial	Grass	0.2
<i>Trifolium</i> sp. - clover	Unknown	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_3MAVA005_4

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text"/>	Feral Pig Activity: <input type="text"/>	Altered Hydrology: <input type="text"/>
Nonnative Grass: <input type="text"/>	Trampling: <input type="text"/>	Erosion: <input type="text"/>
Nonnative Woody Plants: <input type="text"/>	Vandalism: <input type="text"/>	Urban Runoff: <input type="text"/>
Competitive Native Plants: <input type="text"/>	Current Grazing: <input type="text"/>	Slope Movement: <input type="text"/>
Dumping/Trash: <input type="text"/>	Historic Grazing: <input type="text"/>	Soil Compaction: <input type="text"/>
Encampments: <input type="text"/>	Historic Agriculture: <input type="text"/>	Fuel Modification Zone/ Fire Break: <input type="text"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

None

NOTES:

***Bloomeria clevelandii* (San Diego Goldenstar)**
Marron Valley # 4

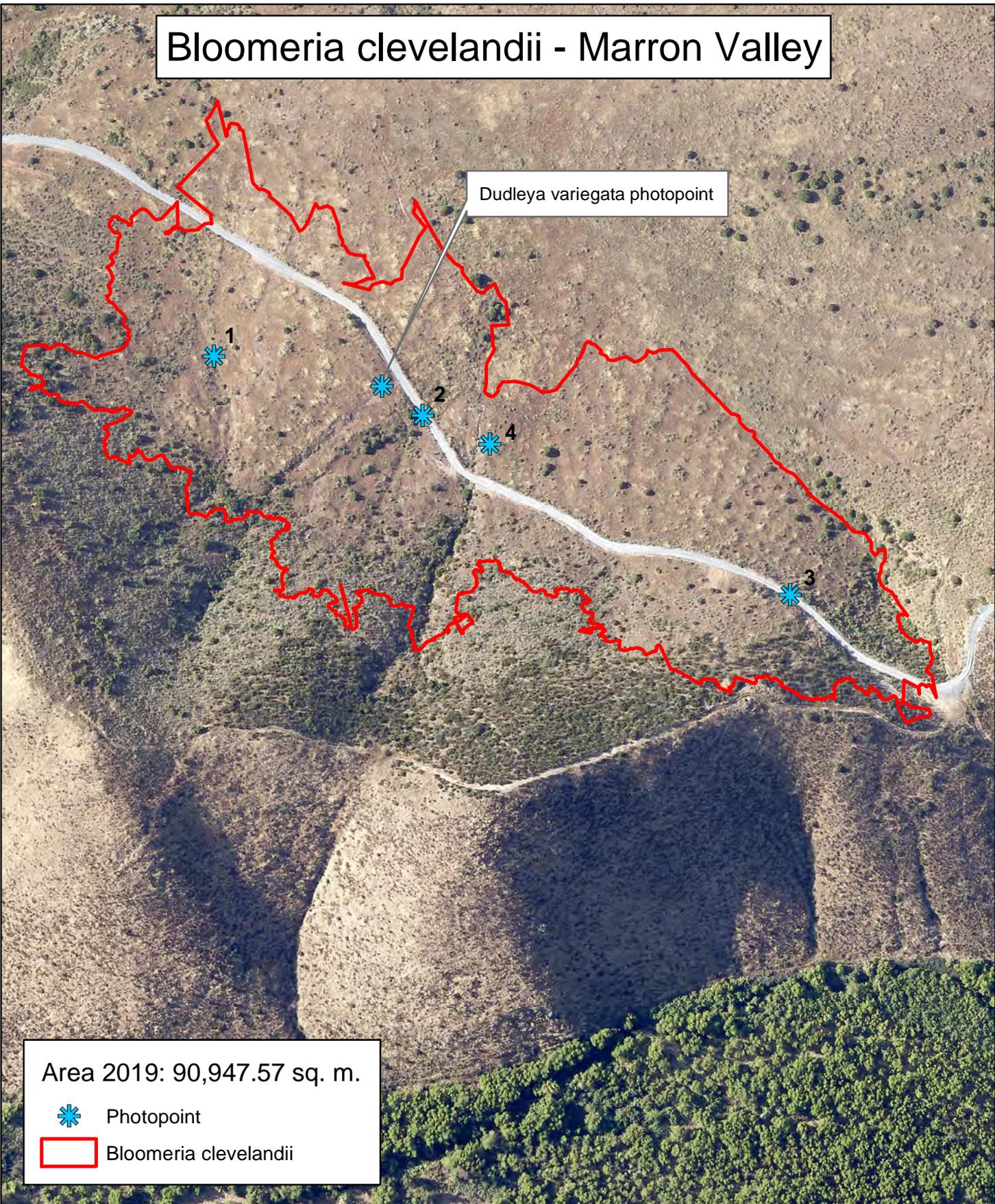
MSP Occurrence ID: BLCL_3MAVA005 - 4



Panorama from Eastern edge of population, facing Southeast, East, Northeast, North.
Panorama location is 6407366.178 1787837.573 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Bloomeria clevelandii - Marron Valley

Dudleya variegata photopoint



Area 2019: 90,947.57 sq. m.

- Photopoint
- Bloomeria clevelandii

Pop. Area 2004 - 2019
Max Area: 139,269.00 sq. m.
Min Area: 0 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense of this information is prohibited.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_4MTRP023_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_4MTRP023_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	7
<i>Adenostoma fasciculatum</i> - chamise	Native	Perennial	Shrub	8
<i>Artemisia californica</i> - coastal sagebrush	Native	Perennial	Shrub	3
<i>Avena barbata</i> - slender oat	Nonnative	Annual	Grass	0.2
<i>Brachypodium distachyon</i> - purple false brome	Nonnative	Annual	Grass	2
<i>Bromus diandrus</i> - rippgut brome	Nonnative	Annual	Grass	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	1
<i>Calochortus splendens</i> - splendid mariposa lily	Native	Perennial	Herb	0.2
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	0.2
<i>Daucus pusillus</i> - American wild carrot	Native	Annual	Herb	0.2
<i>Deinandra fasciculata</i> - clustered tarweed	Native	Annual	Herb	0.2
<i>Dichondra occidentalis</i> - western ponysfoot	Native	Perennial	Herb	0.2
<i>Diplacus aurantiacus</i> var. <i>Aurantiacus</i> - sticky monkeyflower	Native	Perennial	Shrub	2
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	10
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	37
<i>Hypochaeris glabra</i> - smooth cat's ear	Nonnative	Annual	Herb	10
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
<i>Sanicula arguta</i> - sharp toothed snakeroot	Native	Perennial	Herb	0.2
<i>Silene gallica</i> - common catchfly	Nonnative	Annual	Herb	0.2
<i>Sonchus asper</i> - spiny sowthistle	Nonnative	Annual	Herb	0.2
<i>Stipa pulchra</i> - purple needle grass	Native	Perennial	Grass	2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_4MTRP023_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="4"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="5"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship, monitoring

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

CAGN

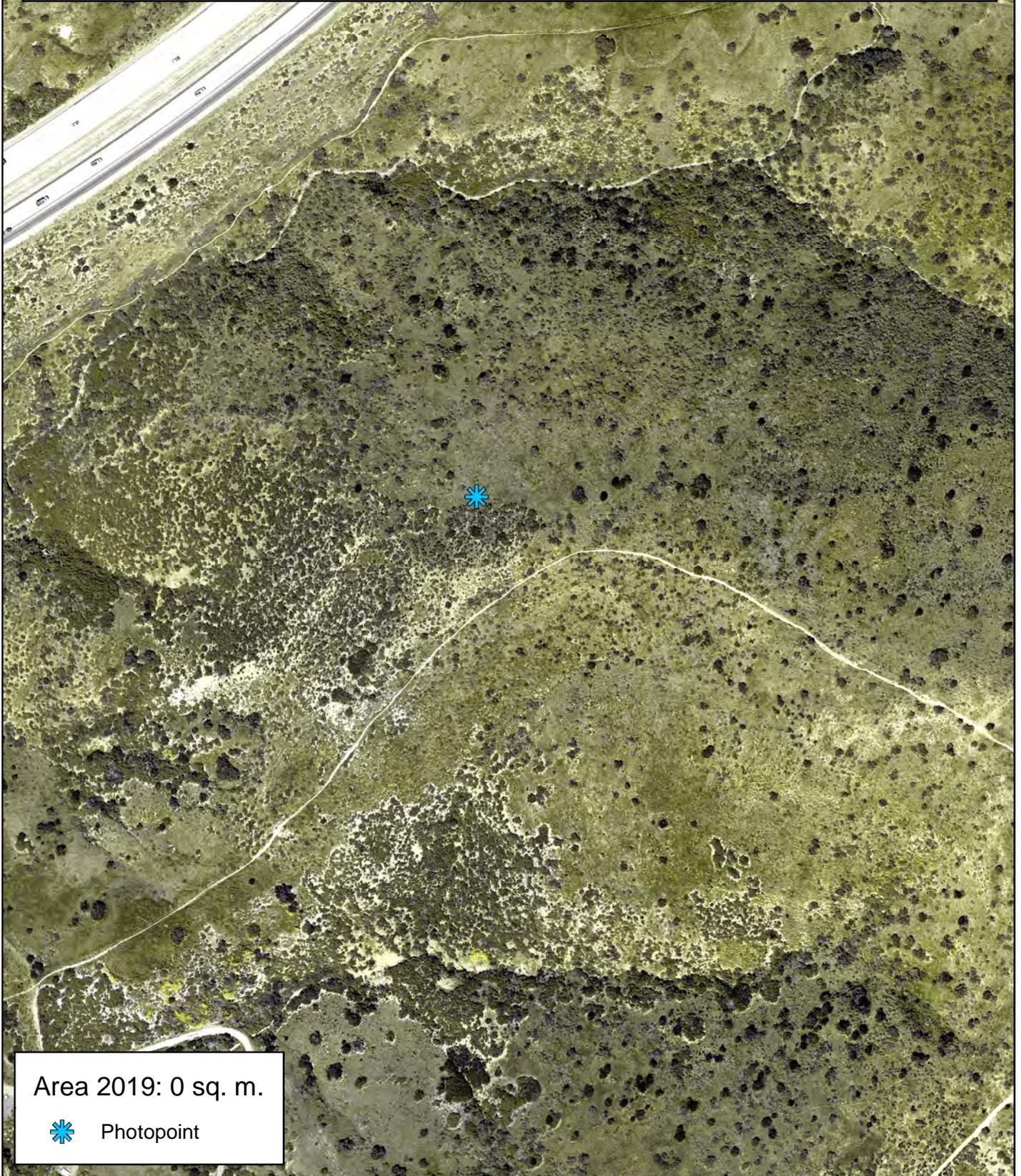
NOTES:

***Bloomeria clevelandii* (San Diego Goldenstar)**
Mission Trails Regional Park
MSP Occurrence ID: BLCL_4MTRP023 - 1



Panorama from Northwestern edge of population, facing Southeast, East, Northeast, North.
Panorama location is 6307533.854 1887727.084 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Bloomeria clevelandii - Mission Trails Regional Park



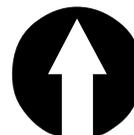
Area 2019: 0 sq. m.

 Photopoint

Pop. Area 2001 - 2019
Max Area: 1,255.77 sq. m.
Min Area: 0 sq. m.

0 50 100
 Meters

Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense of this information is prohibited.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_30TLA006_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_3OTLA006_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	0.2
<i>Bloomeria clevelandii</i> - San Diego goldenstar	Native	Perennial	Herb	0.2
<i>Bromus hordeaceus</i> - soft brome	Nonnative	Annual	Grass	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	2
<i>Calochortus splendens</i> - splendid mariposa lily	Native	Perennial	Herb	0.2
<i>Castilleja exserta</i> - exserted Indian paintbrush	Native	Annual	Herb	0.2
<i>Chlorogalum parviflorum</i> - smallflower soap plant	Native	Perennial	Herb	0.2
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	1
<i>Deinandra fasciculata</i> - clustered tarweed	Native	Annual	Herb	15
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	10
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	45
<i>Hordeum marinum</i> - seaside barley	Nonnative	Annual	Grass	0.2
<i>Hypochaeris glabra</i> - smooth cat's ear	Nonnative	Annual	Herb	0.2
<i>Isocoma menziesii</i> - Menzies' goldenbush	Native	Perennial	Shrub	3
<i>Lamarckia aurea</i> - goldentop grass	Nonnative	Annual	Grass	0.2
<i>Lasthenia gracilis</i> - needle goldfields	Native	Annual	Herb	1
<i>Lepidium nitidum</i> - shining pepperweed	Native	Annual	Herb	1
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
<i>Peritoma arborea</i> - bladderpod spiderflower	Native	Perennial	Shrub	0.2
<i>Polypogon monspeliensis</i> - annual rabbitsfoot grass	Nonnative	Annual	Grass	0.2
<i>Selaginella cinerascens</i> - mesa spikemoss	Native	Perennial	Fern	0.2
<i>Silene gallica</i> - common catchfly	Nonnative	Annual	Herb	0.2
<i>Sisyrinchium bellum</i> - Western blue-eyed grass	Native	Perennial	Herb	0.2
<i>Stipa pulchra</i> - purple needle grass	Native	Perennial	Grass	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_3OTLA006_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text"/>	Feral Pig Activity: <input type="text"/>	Altered Hydrology: <input type="text"/>
Nonnative Grass: <input type="text"/>	Trampling: <input type="text"/>	Erosion: <input type="text"/>
Nonnative Woody Plants: <input type="text"/>	Vandalism: <input type="text"/>	Urban Runoff: <input type="text"/>
Competitive Native Plants: <input type="text"/>	Current Grazing: <input type="text"/>	Slope Movement: <input type="text"/>
Dumping/Trash: <input type="text"/>	Historic Grazing: <input type="text"/>	Soil Compaction: <input type="text"/>
Encampments: <input type="text"/>	Historic Agriculture: <input type="text"/>	Fuel Modification Zone/ Fire Break: <input type="text"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preseve stwewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

None

NOTES:

N/a

***Bloomeria clevelandii* (San Diego Goldenstar)**

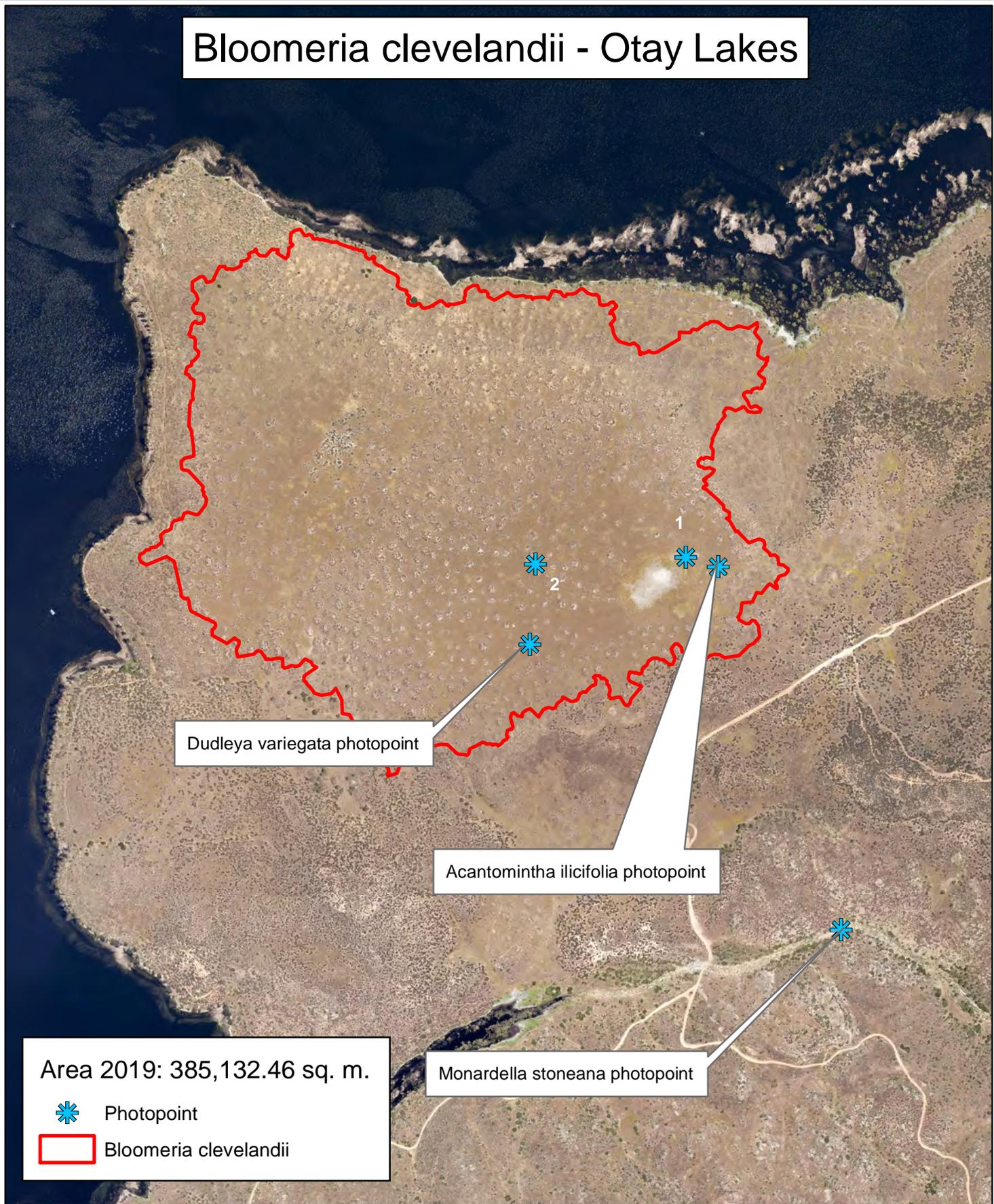
Otay Lakes Observation # 1

MSP Occurrence ID: BLCL_3OTLA006 - 1



Panorama from Northeastern edge of population, facing Northwest, North.
Panorama location is 6357208.466 1807472.481 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Bloomeria clevelandii - Otay Lakes



Dudleya variegata photopoint

Acantomintha ilicifolia photopoint

Monardella stoneana photopoint

Area 2019: 385,132.46 sq. m.

Photopoint

Bloomeria clevelandii

Pop. Area 2003 - 2019
 Max Area: 385,132.00 sq. m.
 Min Area: 0 sq. m.



Source: San GIS & City of San Diego Parks & Rec
 Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense of this information is prohibited.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_3OTLA006_2

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_3OTLA006_2

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	0.2
<i>Bloomeria clevelandii</i> - San Diego goldenstar	Native	Perennial	Herb	35
<i>Bromus hordeaceus</i> - soft brome	Nonnative	Annual	Grass	1
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	2
<i>Calochortus splendens</i> - splendid mariposa lily	Native	Perennial	Herb	0.2
<i>Castilleja exserta</i> - exserted Indian paintbrush	Native	Annual	Herb	0.2
<i>Chlorogalum parviflorum</i> - smallflower soap plant	Native	Perennial	Herb	0.2
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	0.2
<i>Cressa truxillensis</i> - spreading alkaliweed	Native	Perennial	Herb	0.2
<i>Cryptantha</i> sp. - cryptantha	Native	Annual	Herb	0.2
<i>Cuscuta californica</i> - California dodder	Native	Annual	Herb	10
<i>Deinandra fasciculata</i> - clustered tarweed	Native	Annual	Herb	35
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	3
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	20
<i>Eryngium aristulatum</i> var. <i>parishii</i> - San Diego button celery	Native	Annual	Herb	2
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	0.2
<i>Festuca perennis</i> - Italian rye grass	Nonnative	Annual	Grass	0.2
<i>Hordeum marinum</i> - seaside barley	Nonnative	Annual	Grass	0.2
<i>Hypochaeris glabra</i> - smooth cat's ear	Nonnative	Annual	Herb	0.2
<i>Isocoma menziesii</i> - Menzies' goldenbush	Native	Perennial	Shrub	0.2
<i>Lasthenia gracilis</i> - needle goldfields	Native	Annual	Herb	0.2
<i>Lepidium nitidum</i> - shining pepperweed	Native	Annual	Herb	1
<i>Lysimachia arvensis</i> - Scarlet pimpernel	Nonnative	Annual	Herb	0.2
<i>Microseris douglasii</i> ssp. <i>platycarpha</i> - Douglas' silverpuffs	Native	Annual	Herb	0.2
<i>Plantago erecta</i> - California plantain	Native	Annual	Herb	0.2
<i>Sisyrinchium bellum</i> - Western blue-eyed grass	Native	Perennial	Herb	0.2
<i>Stipa pulchra</i> - purple needle grass	Native	Perennial	Grass	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BLCL_3OTLA006_2

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="4"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

None

NOTES:

Plant layers overlapping: cuscuta, bloomeria/dienandra, and erodium

***Bloomeria clevelandii* (San Diego Goldenstar)**

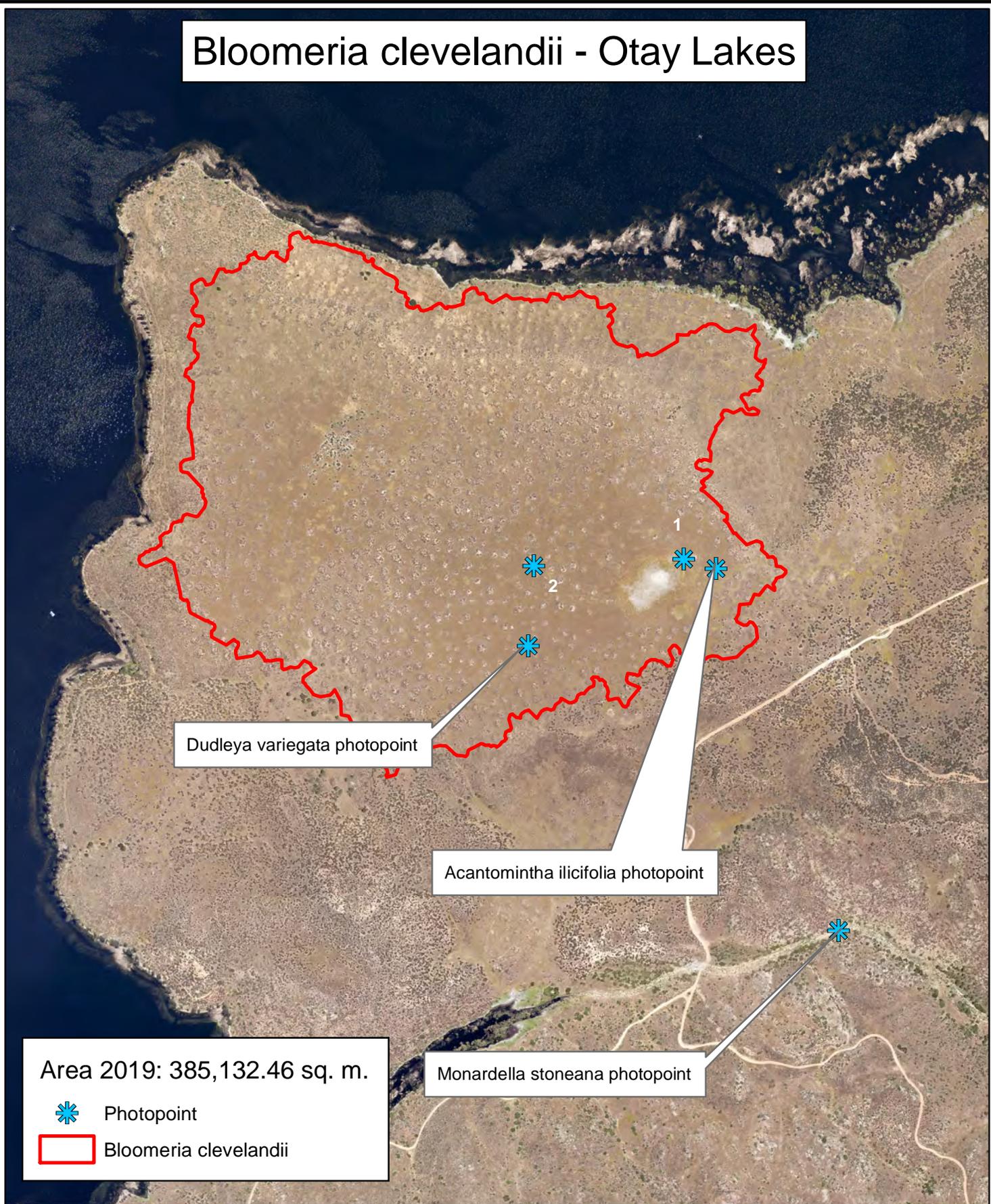
Otay Lakes Observation # 2

MSP Occurrence ID: BLCL_3OTLA006 - 2



Panorama from Southeastern edge of population, facing North, Northeast, East.
Panorama location is 6356421.86 1807483.77 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Bloomeria clevelandii - Otay Lakes



Dudleya variegata photopoint

Acantomintha ilicifolia photopoint

Monardella stoneana photopoint

Area 2019: 385,132.46 sq. m.

 Photopoint

 Bloomeria clevelandii

Pop. Area 2003 - 2019
 Max Area: 385,132.00 sq. m.
 Min Area: 0 sq. m.



Source: San GIS & City of San Diego Parks & Rec
 Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense of this information is prohibited.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



Brodiaea filifolia
Thread-leaved Brodiaea



© City of San Diego, 2014

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BRFI_6BMRA002_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:
 Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BRFI_6BMRA002_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Avena fatua - wild oat	Nonnative	Annual	Grass	15
Bloomeria crocea - common goldenstar	Native	Perennial	Herb	0.2
Brachypodium distachyon - purple false brome	Nonnative	Annual	Grass	35
Brassica nigra - black mustard	Nonnative	Annual	Herb	5
Brassica tournefortii - Asian mustard	Nonnative	Annual	Herb	0.2
Brodiaea filifolia - Thread-leaved brodiaea	Native	Perennial	Herb	0.2
Calochortus splendens - splendid mariposa lily	Native	Perennial	Herb	0.2
Calystegia macrostegia - island false bindweed	Native	Perennial	Herb	2
Centaurea melitensis - Maltese star-thistle	Nonnative	Annual	Herb	2
Convolvulus arvensis	Nonnative	Perennial	Herb	1
Convolvulus simulans - field bindweed	Native	Annual	Herb	4
Cynara cardunculus - artichoke thistle	Nonnative	Perennial	Herb	2
Deinandra fasciculata - clustered tarweed	Native	Annual	Herb	0.2
Eriogonum fasciculatum - Eastern Mojave buckwheat	Native	Perennial	Shrub	12
Festuca myuros - rattail fescue	Nonnative	Annual	Grass	1
Foeniculum vulgare - sweet fennel	Nonnative	Perennial	Herb	0.2
Lactuca serriola - prickly lettuce	Nonnative	Annual	Herb	0.2
Lupinus succulentus - Hollowleaf annual lupine	Native	Annual	Herb	2
Malosma laurina - laurel sumac	Native	Perennial	Shrub	8
Phalaris minor - littleseed canarygrass	Nonnative	Annual	Grass	0.2
Sonchus asper - spiny sowthistle	Nonnative	Annual	Herb	1
Stipa pulchra - purple needle grass	Native	Perennial	Grass	3

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BRFI_6BMRA002_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="7"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="7"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Multiple weed control visits per year needed to control nonnative annuals

VII. MANAGEMENT ACTIONS IN LAST YEAR

None

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

None

NOTES:

***Brodiaea filifolia* (Threadleaf Brodiaea)**
Black Mountain Ranch
MSP Occurrence ID: BRFI_6BMRA002 - 1



Panorama from Northeastern end of population, facing Northeast, East, Southeast.
Panorama location is 6296131.963 1933513.962 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Brodiaea filifolia - Black Mountain



Area 2019: 98.66 sq. m.
* Photopoint
□ Brodiaea filifolia

Pop. Area 2014 - 2019
Max Area: 353.90 sq. m.
Min Area: 31.36 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.
THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.
PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense of this information is prohibited.
This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



Brodiaea orcuttii
Orcutt's Brodiaea



© City of San Diego, 2015

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BROR_2NODR002_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:
 Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BROR_2NODR002_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Antirrhinum nuttallianum</i> - Nuttall's snapdragon	Native	Annual	Herb	0.2
<i>Avena fatua</i> - wild oat	Nonnative	Annual	Grass	0.2
<i>Brodiaea orcuttii</i> - Orcutt's brodiaea	Native	Perennial	Herb	0.2
<i>Bromus hordeaceus</i> - soft brome	Nonnative	Annual	Grass	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	1
<i>Castilleja exserta</i> - exserted Indian paintbrush	Native	Annual	Herb	0.2
<i>Cotula coronopifolia</i> - common brassbuttons	Nonnative	Perennial	Herb	0.2
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	5
<i>Croton setigerus</i> - dove weed	Native	Annual	Herb	0.2
<i>Deinandra fasciculata</i> - clustered tarweed	Native	Annual	Herb	27
<i>Dittrichia graveolens</i>	Nonnative	Annual	Herb	0.2
<i>Eleocharis macrostachya</i> - common spikerush	Native	Perennial	Herb	0.2
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	1
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	10
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	4
<i>Galium angustifolium</i> - narrowleaf bedstraw	Native	Perennial	Herb	0.2
<i>Hypochaeris glabra</i> - smooth cat's ear	Nonnative	Annual	Herb	1
<i>Isocoma menziesii</i> - Menzies' goldenbush	Native	Perennial	Shrub	0.2
<i>Juncus bufonius</i> - toad rush	Native	Annual	Herb	2
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
<i>Lythrum hyssopifolia</i> - Hyssop loosestrife	Nonnative	Annual	Herb	0.2
<i>Malosma laurina</i> - laurel sumac	Native	Perennial	Shrub	1
<i>Navarretia fossalis</i> - Spreading navarretia	Native	Annual	Herb	0.2
<i>Navarretia hamata</i> - hooked pincushionplant	Native	Annual	Herb	0.2
<i>Nuttallanthus texanus</i> - Texas toadflax	Native	Annual	Herb	0.2
<i>Phalaris lemmonii</i> - Lemmon's canarygrass	Native	Annual	Grass	0.2
<i>Polypogon monspeliensis</i> - annual rabbitsfoot grass	Nonnative	Annual	Grass	0.2
<i>Pseudognaphalium beneolens</i> - cudweed	Native	Perennial	Herb	0.2
<i>Psilocarphus brevissimus</i> - woolly marble	Native	Annual	Herb	0.2
<i>Psilocarphus tenellus</i> - slender woolly heads	Native	Annual	Herb	0.2
<i>Silene gallica</i> - common catchfly	Nonnative	Annual	Herb	0.2
<i>Sonchus oleraceus</i> - common sowthistle	Nonnative	Annual	Herb	0.2
<i>Stephanomeria diegensis</i> - San Diego milk aster	Native	Annual	Herb	0.2
Unknown - grass	Unknown	Unknown	Unknown	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BROR_2NODR002_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="4"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="4"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

VII. MANAGEMENT ACTIONS IN LAST YEAR

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

NOTES:

***Brodiaea orcuttii* (Orcutt's Brodiaea)**
Nobel Drive

MSP Occurrence ID: BROR_2NODR002 - 1



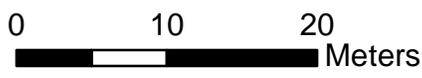
Panorama from Northern end of population, facing Northwest, West, Southwest, and South.
Panorama location is 6271105.37 1896318.834 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Brodiaea orcuttii - Nobel Drive



Area 2019: 130.00 sq. m.
* Photopoint
□ Brodiaea orcuttii

Pop. Area 2003 - 2019
Max Area: 130.00 sq. m.
Min Area: 0 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense of this information requires a separate sublicense agreement.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BROR_4OACR012_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BROR_40ACR012_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon americanus</i> - American bird's-foot trefoil	Native	Annual	Herb	5
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	1
<i>Acmispon micranthus</i> - San Diego bird's-foot trefoil	Native	Annual	Herb	0.2
<i>Acmispon strigosus</i>	Native	Annual	Herb	0.2
<i>Ambrosia psilostachya</i> - Cuman ragweed	Native	Perennial	Herb	0.2
<i>Antirrhinum nuttallianum</i> - Nuttall's snapdragon	Native	Annual	Herb	0.2
<i>Avena barbata</i> - slender oat	Nonnative	Annual	Grass	0.2
<i>Bothriochloa barbinodis</i> - cane bluestem	Native	Perennial	Grass	1
<i>Brachypodium distachyon</i> - purple false brome	Nonnative	Annual	Grass	7
<i>Brassica nigra</i> - black mustard	Nonnative	Annual	Herb	1
<i>Briza minor</i> - little quakinggrass	Nonnative	Annual	Grass	0.2
<i>Brodiaea orcuttii</i> - Orcutt's brodiaea	Native	Perennial	Herb	0.2
<i>Bromus diandrus</i> - rippgut brome	Nonnative	Annual	Grass	0.2
<i>Bromus hordeaceus</i> - soft brome	Nonnative	Annual	Grass	1
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	2
<i>Calystegia macrostegia</i> - island false bindweed	Native	Perennial	Herb	0.2
<i>Carduus pycnocephalus</i> - Italian plumeless thistle	Nonnative	Annual	Herb	0.2
<i>Ceanothus tomentosus</i> - woolyleaf ceanothus	Native	Perennial	Shrub	8
<i>Centaurea melitensis</i> - Maltese star-thistle	Nonnative	Annual	Herb	0.2
<i>Cerastium glomeratum</i> - sticky mouseear chickweed	Nonnative	Annual	Herb	0.2
<i>Chamaesyce maculata</i> - spotted spurge	Nonnative	Annual	Herb	0.2
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	0.2
<i>Cryptantha</i> sp. - cryptantha	Native	Annual	Herb	0.2
<i>Cyperus eragrostis</i> - tall flatsedge	Native	Perennial	Herb	0.2
<i>Daucus pusillus</i> - American wild carrot	Native	Annual	Herb	0.2
<i>Dichelostemma capitatum</i> - blue-dicks	Native	Perennial	Herb	0.2
<i>Digitaria sanguinalis</i> - hairy crabgrass	Nonnative	Annual	Grass	1
<i>Eleocharis montevidensis</i> - sand spikerush	Native	Perennial	Herb	0.2
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	1
<i>Eriophyllum confertiflorum</i> - golden yarrow	Native	Annual	Herb	0.2
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	0.2
<i>Erodium cicutarium</i> - redstem stork's bill	Nonnative	Annual	Herb	0.2
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	0.2
<i>Festuca perennis</i> - Italian rye grass	Nonnative	Annual	Grass	6
<i>Galium aparine</i> - common bedstraw	Native	Annual	Herb	0.2
<i>Geranium carolinianum</i> - Carolina geranium	Native	Annual	Herb	0.2
<i>Hedypnois cretica</i> - Cretanweed	Nonnative	Annual	Herb	0.2
<i>Heteromeles arbutifolia</i> - toyon	Native	Perennial	Shrub	0.2
<i>Hypochaeris glabra</i> - smooth cat's ear	Nonnative	Annual	Herb	1
<i>Juncus bryoides</i> - moss rush	Native	Annual	Herb	0.2
<i>Juncus bufonius</i> - toad rush	Native	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

Juncus dubius - finger rush	Native	Perennial	Herb	0.2
Lamarckia aurea - goldentop grass	Nonnative	Annual	Grass	0.2
Lepidium nitidum - shining pepperweed	Native	Annual	Herb	0.2
Logfia gallica - narrowleaf cottonrose	Nonnative	Annual	Herb	1
Lysimachia arvensis - Scarlet pimpernel	Nonnative	Annual	Herb	0.2
Lythrum hyssopifolia - Hyssop loosestrife	Nonnative	Annual	Herb	0.2
Malosma laurina - laurel sumac	Native	Perennial	Shrub	7
Medicago polymorpha - burclover	Nonnative	Annual	Herb	0.2
Melinis repens - natal grass	Nonnative	Perennial	Grass	0.2
Mimulus guttatus - seep monkeyflower	Native	Annual	Herb	0.2
Muhlenbergia rigens - deergrass	Native	Perennial	Grass	0.2
Plantago coronopus - buckhorn plantain	Nonnative	Annual	Herb	0.2
Pseudognaphalium californicum - ladies' tobacco	Native	Perennial	Herb	0.2
Pseudognaphalium stramineum - cottonbatting plant	Native	Perennial	Herb	0.2
Salix gooddingii - Goodding's willow	Native	Perennial	Tree	0.2
Salvia mellifera - black sage	Native	Perennial	Shrub	12
Selaginella bigelovii - Bigelow's spike moss	Native	Perennial	Fern	0.2
Silene gallica - common catchfly	Nonnative	Annual	Herb	0.2
Sonchus asper - spiny sowthistle	Nonnative	Annual	Herb	0.2
Sonchus oleraceus - common sowthistle	Nonnative	Annual	Herb	0.2
Spergularia bocconi - sand spurry	Nonnative	Annual	Herb	0.2
Stachys rigida var. rigida - rough hedgenettle	Native	Perennial	Herb	0.2
Stephanomeria diegensis - San Diego milk aster	Native	Annual	Herb	0.2
Toxicodendron diversilobum - poison oak	Native	Perennial	Shrub	0.2
Trifolium albopurpureum - Indian clover	Native	Annual	Herb	0.2
Xanthium strumarium - rough cocklebur	Native	Perennial	Shrub	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BROR_4OACR012_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="4"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="4"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

2 Least Bell's Vireo singing in sycamore west of circle plot

NOTES:

***Brodiaea orcuttii* (Orcutt's Brodiaea)**
Mission Trails Regional Park- Oak Creek
MSP Occurrence ID: BROR_4OACR012 - 1



Panorama from Southern end of population, facing South, Southwest, West.
Panorama location is 6316339.88 1888177.768 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Brodiaea orcuttii - Oak Creek



Area 2019: 34.28 sq. m.

 Photopoint

 Brodiaea orcuttii

Pop. Area 2015 - 2019
Max Area: 61.10 sq. m.
Min Area: 0.58 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense of this information requires a sublicense agreement.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BROR_6ACA015_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BROR_6CACA015_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	0.2
<i>Acmispon micranthus</i> - San Diego bird's-foot trefoil	Native	Annual	Herb	0.2
<i>Adenostoma fasciculatum</i> - chamise	Native	Perennial	Shrub	2
<i>Apiastrum angustifolium</i> - mock parsley	Native	Annual	Herb	0.2
<i>Artemisia californica</i> - coastal sagebrush	Native	Perennial	Shrub	0.2
<i>Brodiaea orcuttii</i> - Orcutt's brodiaea	Native	Perennial	Herb	1
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	0.2
<i>Callitriche marginata</i> - California water starwort	Native	Annual	Herb	6
<i>Calochortus splendens</i> - splendid mariposa lily	Native	Perennial	Herb	0.2
<i>Castilleja exserta</i> - exserted Indian paintbrush	Native	Annual	Herb	0.2
<i>Centaurea melitensis</i> - Maltese star-thistle	Nonnative	Annual	Herb	0.2
<i>Chorizanthe polygonoides</i> var. <i>longispina</i> - knotweed spineflower	Native	Annual	Herb	0.2
<i>Clarkia purpurea</i> - winecup clarkia	Native	Annual	Herb	0.2
<i>Cneoridium dumosum</i> - bush rue	Native	Perennial	Shrub	1
<i>Crassula aquatica</i> - aquatic pygmy weed	Native	Annual	Herb	1
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	3
<i>Cryptantha</i> sp. - cryptantha	Native	Annual	Herb	1
<i>Cuscuta californica</i> - California dodder	Native	Annual	Herb	1
<i>Daucus pusillus</i> - American wild carrot	Native	Annual	Herb	1
<i>Deinandra fasciculata</i> - clustered tarweed	Native	Annual	Herb	26
<i>Eriophyllum confertiflorum</i> - golden yarrow	Native	Annual	Herb	0.2
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	1
<i>Erodium moschatum</i> - Musky stork's bill	Nonnative	Annual	Herb	0.2
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	5
<i>Hypochaeris glabra</i> - smooth cat's ear	Nonnative	Annual	Herb	0.2
<i>Juncus bufonius</i> - toad rush	Native	Annual	Herb	2
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
<i>Microseris douglasii</i> ssp. <i>platycarpa</i> - Douglas' silverpuffs	Native	Annual	Herb	0.2
<i>Muilla maritima</i> - sea muilla	Native	Perennial	Herb	0.2
<i>Navaretia hamata</i> - hooked pincushionplant	Native	Annual	Herb	0.2
<i>Osmadenia tenella</i> - false rosinweed	Native	Annual	Herb	0.2
<i>Plantago erecta</i> - California plantain	Native	Annual	Herb	2
<i>Pogogyne abramsii</i> - San Diego mesa mint	Native	Annual	Herb	0.2
<i>Pseudognaphalium stramineum</i> - cottonbatting plant	Native	Perennial	Herb	0.2
<i>Psilocarphus brevissimus</i> - woolly marble	Native	Annual	Herb	1
<i>Psilocarphus tenellus</i> - slender woolly heads	Native	Annual	Herb	0.2
<i>Salvia mellifera</i> - black sage	Native	Perennial	Shrub	0.2
<i>Selaginella cinerascens</i> - mesa spikemoss	Native	Perennial	Fern	0.2
<i>Zeltnera venusta</i> - charming centauray	Native	Annual	Herb	1

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BROR_6CACA015_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="3"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="2"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="3"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue weed maintenance as required by the VPHCP and clean up broken glass in site

VII. MANAGEMENT ACTIONS IN LAST YEAR

VPHCP required weed maintenance visits

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

None

NOTES:

Broken glass in circle plot and at gate entrance to open space property

***Brodiaea orcuttii* (Orcutt's Brodiaea)**

Carroll Canyon

MSP Occurrence ID: BROR_6CACA015 - 1



Panorama from Southern edge of population, facing East, Southeast, South, Southwest.
Panorama location is 6282439.860 1907633.765 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Brodiaea orcuttii - Carroll Canyon



Area 2019: 6,453.20 sq. m.
* Photopoint
□ Brodiaea orcuttii

Pop. Area 2003 - 2019
Max Area: 6,453.20 sq. m.
Min Area: 0 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense/sublicensing agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BROR_6LORI018_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BROR_6LORI018_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	1
<i>Adenostoma fasciculatum</i> - chamise	Native	Perennial	Shrub	20
<i>Antirrhinum nuttallianum</i> - Nuttall's snapdragon	Native	Annual	Herb	0.2
<i>Apiastrum angustifolium</i> - mock parsley	Native	Annual	Herb	0.2
<i>Avena barbata</i> - slender oat	Nonnative	Annual	Grass	0.2
<i>Bloomeria clevelandii</i> - San Diego goldenstar	Native	Perennial	Herb	0.2
<i>Brodiaea orcuttii</i> - Orcutt's brodiaea	Native	Perennial	Herb	5
<i>Bromus hordeaceus</i> - soft brome	Nonnative	Annual	Grass	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	2
<i>Callitriche marginata</i> - California water starwort	Native	Annual	Herb	2
<i>Castilleja exserta</i> - exserted Indian paintbrush	Native	Annual	Herb	0.2
<i>Chlorogalum pomeridianum</i> - soap plant	Native	Perennial	Herb	0.2
<i>Crassula aquatica</i> - aquatic pygmy weed	Native	Annual	Herb	2
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	0.2
<i>Cryptantha</i> sp. - cryptantha	Native	Annual	Herb	0.2
<i>Daucus pusillus</i> - American wild carrot	Native	Annual	Herb	1
<i>Deinandra fasciculata</i> - clustered tarweed	Native	Annual	Herb	1
<i>Deschampsia danthonioides</i> - annual hairgrass	Native	Annual	Grass	0.2
<i>Dichelostemma capitatum</i> - bluedicks	Native	Perennial	Herb	0.2
<i>Downingia cuspidata</i> - Toothed downingia	Native	Annual	Herb	0.2
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	1
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	1
<i>Gastridium phleoides</i> - nit grass	Nonnative	Annual	Grass	0.2
<i>Helianthemum scoparium</i> - Bisbee peak rushrose	Native	Perennial	Shrub	0.2
<i>Hordeum marinum</i> - seaside barley	Nonnative	Annual	Grass	2
<i>Hypochaeris glabra</i> - smooth cat's ear	Nonnative	Annual	Herb	2
<i>Juncus bufonius</i> - toad rush	Native	Annual	Herb	1
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
<i>Lupinus bicolor</i> - annual lupine	Native	Annual	Herb	0.2
<i>Lysimachia arvensis</i> - Scarlet pimpernel	Nonnative	Annual	Herb	0.2
<i>Lythrum hyssopifolia</i> - Hyssop loosestrife	Nonnative	Annual	Herb	0.2
<i>Muilla maritima</i> - sea muilla	Native	Perennial	Herb	0.2
<i>Navarretia hamata</i> - hooked pincushionplant	Native	Annual	Herb	2
<i>Pentachaeta aurea</i> - golden chaetopappa	Native	Annual	Herb	0.2
<i>Pogogyne abramsii</i> - San Diego mesa mint	Native	Annual	Herb	7
<i>Psilocarphus brevissimus</i> - woolly marble	Native	Annual	Herb	20
<i>Psilocarphus tenellus</i> - slender woolly heads	Native	Annual	Herb	0.2
<i>Selaginella cinerascens</i> - mesa spikemoss	Native	Perennial	Fern	0.2
<i>Uropappus lindleyi</i> - silver puffs	Native	Annual	Herb	0.2
<i>Zeltnera venusta</i> - charming centaury	Native	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

BROR_6LORI018_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="4"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="4"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship and VPHCP required maintenace visits

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

None

NOTES:

***Brodiaea orcuttii* (Orcutt's Brodiaea)**

Lopez Ridge

MSP Occurrence ID: BROR_6LORI018 - 1



Panorama from Eastern edge of population, facing Southwest, West, Northwest.
Panorama location is 6278246.403 1915522.734 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Brodiaea orcuttii - Lopez Ridge



Pop. Area 2003 - 2019
Max Area: 1,498.50 sq. m.
Min Area: 25.00 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or retransmission of this information is prohibited.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



Chloropyron maritimum ssp.
maritimum
Salt-marsh Bird's Beak



© 2016 City of San Diego

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

COMAM3_1DOBE007_

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

COMAM3_1DOBE007_

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Batis maritima	Native	Perennial	Shrub	0.2
Chloropyron maritimum var. maritimum - Salt marsh bird's-beak	Native	Annual	Herb	1
Distichlis littoralis - shoregrass	Native	Perennial	Grass	10
Frankenia salina - alkali seaheath	Native	Perennial	Herb	3
Jaumea carnosa - marsh jaumea	Native	Perennial	Herb	4
Juncus acutus - spiny rush	Native	Perennial	Herb	0.2
Limonium californicum - California sea lavender	Native	Perennial	Herb	0.2
Limonium duriusculum - European sea lavender	Nonnative	Perennial	Herb	1
Salicornia pacifica - glasswort	Native	Perennial	Herb	9
Suaeda esteroa - estuary seablite	Native	Perennial	Herb	0.2
Triglochin maritima - seaside arrow grass	Native	Perennial	Herb	5

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

COMAM3_1DOBE007_

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="2"/>	Trampling: <input type="text" value="4"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="6"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="3"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship and weed control efforts

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship and weed control to manage invasive Limonium

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

Least terns (2) observed flying over flood control channel.

NOTES:

***Chloropyron maritimum* ssp. *Maritimum* (Salt Marsh Bird's Beak)**

Dog Beach

MSP Occurrence ID: COMAM3_1DOBE007 - 1

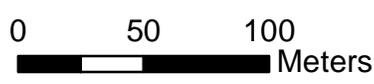


Panorama from Eastern end of population, facing Northeast, North, Northwest.
Panorama location is 6254606.503 1856076.178 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

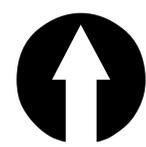
Chloropyron maritimum - Dog Beach



Pop. Area 2014 - 2019
Max Area: 10,023.10 sq. m.
Min Area: 223.57 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense/sublicensing agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

Cylindropuntia californica var. *californica*
Snake Cholla



© City of San Diego, 2015

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

CYCA_2BPGC001_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

CYCA_2BPGC001_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	0.2
<i>Adenostoma fasciculatum</i> - chamise	Native	Perennial	Shrub	3
<i>Antirrhinum nuttallianum</i> - Nuttall's snapdragon	Native	Annual	Herb	0.2
<i>Artemisia californica</i> - coastal sagebrush	Native	Perennial	Shrub	28
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	0.2
<i>Cercocarpus minutiflorus</i> - smooth mountain-mahogany	Native	Perennial	Shrub	3
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	0.2
<i>Cylindropuntia californica</i> - snake cholla	Native	Perennial	Herb	1
<i>Deinandra fasciculata</i> - clustered tarweed	Native	Annual	Herb	3
<i>Diplacus aurantiacus</i> var. <i>Aurantiacus</i> - sticky monkeyflower	Native	Perennial	Shrub	1
<i>Encelia californica</i> - California brittlebush	Native	Perennial	Shrub	3
<i>Erigeron canadensis</i> - Canada horseweed	Native	Annual	Herb	0.2
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	1
<i>Ferocactus viridescens</i> - San Diego barrel cactus	Native	Perennial	Shrub	0.2
<i>Helianthemum scoparium</i> - Bisbee peak rushrose	Native	Perennial	Shrub	0.2
<i>Isocoma menziesii</i> - Menzies' goldenbush	Native	Perennial	Shrub	3
<i>Malosma laurina</i> - laurel sumac	Native	Perennial	Shrub	8
<i>Mirabilis laevis</i> - desert wishbone bush	Native	Perennial	Herb	0.2
<i>Muhlenbergia microsperma</i> - littleseed muhly	Native	Annual	Grass	0.2
<i>Navarretia hamata</i> - hooked pincushionplant	Native	Annual	Herb	0.2
<i>Opuntia littoralis</i> - coastal pricklypear	Native	Perennial	Shrub	1
<i>Pennisetum setaceum</i> - crimson fountaingrass	Nonnative	Perennial	Grass	2
<i>Pseudognaphalium californicum</i> - ladies' tobacco	Native	Perennial	Herb	0.2
<i>Rhus integrifolia</i> - lemonade berry	Native	Perennial	Shrub	10
<i>Salvia mellifera</i> - black sage	Native	Perennial	Shrub	10
<i>Selaginella cinerascens</i> - mesa spikemoss	Native	Perennial	Fern	0.2
<i>Yucca schidigera</i> - Mojave yucca	Native	Perennial	Shrub	5

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

CYCA_2BPGC001_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="1"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="3"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="3"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship and remove fountain grass as funding permits

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserved stewardship

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

2 CAGN

NOTES:

***Cylindropuntia californica* var. *californica* (Snake Cholla)**
Balboa Golf Course

MSP Occurrence ID: CYCA_2BPGC001 - 1



Panorama from Northern edge of population, facing Northwest, North, Northeast.
Panorama location is 6287974.598 1845159.527 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Cylindropuntia californica - Balboa Golf Course

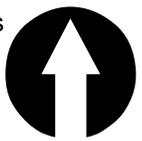


Area 2019: 701.50 sq. m.
* Photopoint
□ Cylindropuntia californica

Pop. Area 2004 - 2019
Max Area: 724.10 sq. m.
Min Area: 5.94 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.
THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.
PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense of this information is prohibited.
This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

CYCA_3GOME003_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

CYCA_3GOME003_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Ambrosia chenopodiifolia - San Diego bur ragweed	Native	Perennial	Shrub	3
Artemisia californica - coastal sagebrush	Native	Perennial	Shrub	5
Atriplex pacifica - Davidson's saltbush	Native	Annual	Herb	0.2
Bahiopsis laciniata - torhleaf goldeneye	Native	Perennial	Shrub	4
Bromus madritensis - compact brome	Nonnative	Annual	Grass	0.2
Centaurea melitensis - Maltese star-thistle	Nonnative	Annual	Herb	0.2
Crassula connata - sand pygmyweed	Native	Annual	Herb	5
Cryptantha sp. - cryptantha	Native	Annual	Herb	0.2
Deinandra fasciculata - clustered tarweed	Native	Annual	Herb	40
Dichelostemma capitatum - bluedicks	Native	Perennial	Herb	0.2
Encelia californica - California brittlebush	Native	Perennial	Shrub	0.2
Erodium botrys - longbeak stork's bill	Nonnative	Annual	Herb	1
Festuca myuros - rattail fescue	Nonnative	Annual	Grass	0.2
Lepidium nitidum - shining pepperweed	Native	Annual	Herb	0.2
Logfia gallica - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
Nicotiana clevelandii	Native	Annual	Herb	0.2
Plantago erecta - California plantain	Native	Annual	Herb	8
Pseudognaphalium stramineum - cottonbatting plant	Native	Perennial	Herb	0.2
Salsola tragus - prickly Russian thistle	Nonnative	Annual	Herb	0.2
Schismus barbatus - common Mediterranean grass	Nonnative	Annual	Grass	0.2
Selaginella cinerascens - mesa spikemoss	Native	Perennial	Fern	7
Simmondsia chinensis - jojoba	Native	Perennial	Shrub	10
Stipa lepida - foothill needle grass	Native	Perennial	Grass	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

CYCA_3GOME003_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="3"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

2 Black tailed jackrabbits; 1 CAGN

NOTES:

***Cylindropuntia californica* var. *californica* (Snake Cholla)**

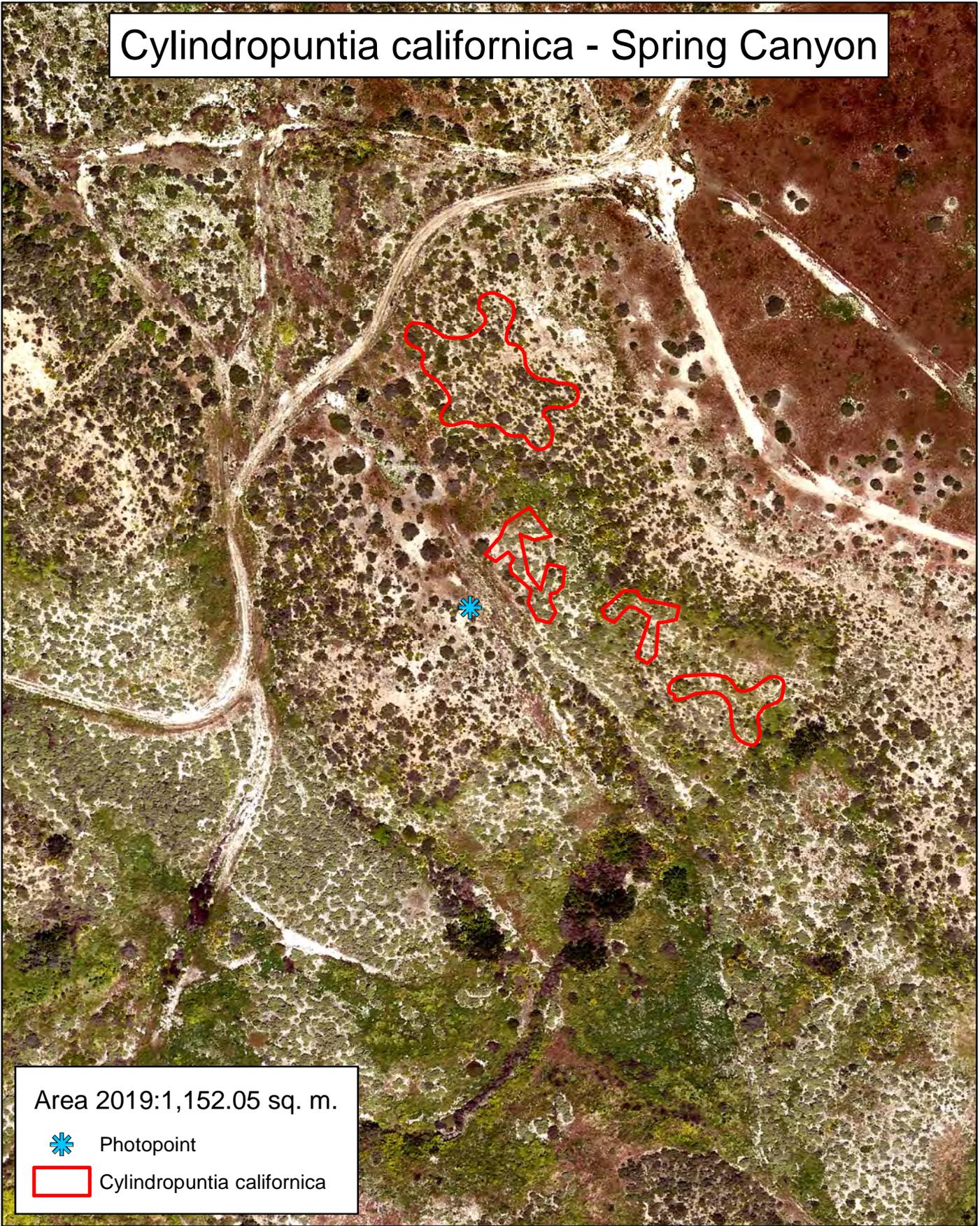
Spring Canyon

MSP Occurrence ID: CYCA_3GOME003 - 1



Panorama from Northeastern edge of population, facing North, Northeast, East, Southeast.
Panorama location is 6330060.051 1781287.695 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Cylindropuntia californica - Spring Canyon

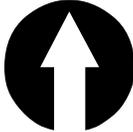


Area 2019: 1,152.05 sq. m.
* Photopoint
□ Cylindropuntia californica

Pop. Area 2002 - 2019
Max Area: 3,138.60 sq. m.
Min Area: 559.00 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense of this information requires a separate sublicense agreement.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



Deinandra conjugens
Otay Tarplant



© City of San Diego, 2015

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DECO13_3DERA020_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DECO13_3DERA020_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Ambrosia chenopodiifolia - San Diego bur ragweed	Native	Perennial	Shrub	1
Apiastrum angustifolium - mock parsley	Native	Annual	Herb	0.2
Artemisia californica - coastal sagebrush	Native	Perennial	Shrub	15
Baccharis sarothroides - desertbroom	Native	Perennial	Shrub	0.2
Bahiopsis laciniata - torhleaf goldeneye	Native	Perennial	Shrub	9
Brassica nigra - black mustard	Nonnative	Annual	Herb	0.2
Bromus hordeaceus - soft brome	Nonnative	Annual	Grass	0.2
Bromus madritensis - compact brome	Nonnative	Annual	Grass	1
Centaurea melitensis - Maltese star-thistle	Nonnative	Annual	Herb	0.2
Crassula connata - sand pygmyweed	Native	Annual	Herb	1
Cylindropuntia prolifera - coastal cholla	Native	Perennial	Shrub	0.2
Daucus pusillus - American wild carrot	Native	Annual	Herb	0.2
Deinandra conjugens - Otay tarplant	Native	Annual	Herb	0.2
Deinandra fasciculata - clustered tarweed	Native	Annual	Herb	3
Encelia californica - California brittlebush	Native	Perennial	Shrub	15
Erigeron canadensis - Canada horseweed	Native	Annual	Herb	0.2
Eriogonum fasciculatum - Eastern Mojave buckwheat	Native	Perennial	Shrub	0.2
Festuca myuros - rattail fescue	Nonnative	Annual	Grass	10
Heterotheca grandiflora - telegraphweed	Native	Annual	Herb	0.2
Logfia gallica - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
Lysimachia arvensis - Scarlet pimpernel	Nonnative	Annual	Herb	1
Matricaria discoidea - pineapple weed	Native	Annual	Herb	0.2
Medicago polymorpha - burclover	Nonnative	Annual	Herb	0.2
Mellilotus indica - annual yellow sweetclover	Nonnative	Annual	Herb	0.2
Oncosiphon piluliferum - stinknet	Nonnative	Annual	Herb	0.2
Peritoma arborea - bladderpod spiderflower	Native	Perennial	Shrub	0.2
Rhus integrifolia - lemonade berry	Native	Perennial	Shrub	8
Rosa minutifolia - small-leaved rose	Native	Perennial	Shrub	1
Schismus barbatus - common Mediterranean grass	Nonnative	Annual	Grass	0.2
Simmondsia chinensis - jojoba	Native	Perennial	Shrub	5
Sonchus asper - spiny sowthistle	Nonnative	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DECO13_3DERA020_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="4"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

None

NOTES:

***Deinandra conjugens* (Otay Tarplant)**

Dennery Ranch

MSP Occurrence ID: DECO13_3DERA020 - 1



Panorama from Southern edge of population, facing South, Southeast, East.
Panorama location is 6321437.419 1791601.507 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Deinandra conjugens - Dennery Ranch



Also Rosa minutifolia photopoint

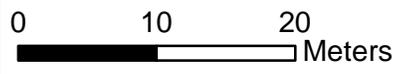
Area 2019: 344.87 sq. m.

 Photopoint

 Deinandra conjugens

SANDAG & SanGIS

Pop. Area 2000 - 2019
Max Area: 43,623.64 sq. m.
Min Area: 0 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense of this information is prohibited.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DECO13_3DREA021_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DECO13_3DREA021_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Avena fatua</i> - wild oat	Nonnative	Annual	Grass	12
<i>Bloomeria crocea</i> - common goldenstar	Native	Perennial	Herb	0.2
<i>Brachypodium distachyon</i> - purple false brome	Nonnative	Annual	Grass	1
<i>Brassica nigra</i> - black mustard	Nonnative	Annual	Herb	3
<i>Brassica tournefortii</i> - Asian mustard	Nonnative	Annual	Herb	1
<i>Bromus hordeaceus</i> - soft brome	Nonnative	Annual	Grass	1
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	0.2
<i>Centaurea melitensis</i> - Maltese star-thistle	Nonnative	Annual	Herb	2
<i>Croton californicus</i> - California croton	Native	Perennial	Herb	0.2
<i>Deinandra conjugens</i> - Otay tarplant	Native	Annual	Herb	40
<i>Deinandra fasciculata</i> - clustered tarweed	Native	Annual	Herb	0.2
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	1
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	0.2
<i>Festuca perennis</i> - Italian rye grass	Nonnative	Annual	Grass	8
<i>Gastridium phleoides</i> - nit grass	Nonnative	Annual	Grass	0.2
<i>Glebionis coronaria</i> - crown daisy	Nonnative	Annual	Herb	0.2
<i>Hedypnois cretica</i> - Cretanweed	Nonnative	Annual	Herb	1
<i>Isocoma menziesii</i> - Menzies' goldenbush	Native	Perennial	Shrub	0.2
<i>Lepidium nitidum</i> - shining pepperweed	Native	Annual	Herb	0.2
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	1
<i>Lysimachia arvensis</i> - Scarlet pimpernel	Nonnative	Annual	Herb	1
<i>Phalaris minor</i> - littleseed canarygrass	Nonnative	Annual	Grass	0.2
<i>Plantago erecta</i> - California plantain	Native	Annual	Herb	0.2
<i>Salsola tragus</i> - prickly Russian thistle	Nonnative	Annual	Herb	0.2
<i>Simmondsia chinensis</i> - jojoba	Native	Perennial	Shrub	1
<i>Sisyrinchium bellum</i> - Western blue-eyed grass	Native	Perennial	Herb	0.2
<i>Sonchus oleraceus</i> - common sowthistle	Nonnative	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DECO13_3DREA021_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="4"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="5"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="3"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship, regular patrols to prevent encampments and dumping, consider site specific restoration plan

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

None

NOTES:

***Deinandra conjugens* (Otay Tarplant)**
Dennery Ranch East

MSP Occurrence ID: DECO13_3DREA021 - 1



Panorama from Southern edge of population, facing Southwest, South, Southeast.
Panorama location is 6323116.396 1792756.721 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Deinandra conjugens - Dennery Ranch East

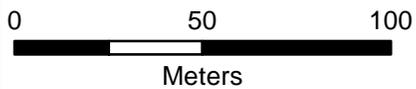


Area 2019: 57,841.10 sq. m.

 Photopoint

 Deinandra conjugens

Pop. Area 2000 - 2019
Max Area: 57,841.10 sq. m.
Min Area: 0 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense of this information is prohibited.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DECO13_3PRVA013_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:
 Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DECO13_3PRVA013_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	2
<i>Avena barbata</i> - slender oat	Nonnative	Annual	Grass	0.2
<i>Baccharis sarothroides</i> - desertbroom	Native	Perennial	Shrub	0.2
<i>Bahiopsis laciniata</i> - torhleaf goldeneye	Native	Perennial	Shrub	0.2
<i>Brachypodium distachyon</i> - purple false brome	Nonnative	Annual	Grass	65
<i>Brassica nigra</i> - black mustard	Nonnative	Annual	Herb	0.2
<i>Brassica tournefortii</i> - Asian mustard	Nonnative	Annual	Herb	2
<i>Bromus hordeaceus</i> - soft brome	Nonnative	Annual	Grass	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	2
<i>Calochortus splendens</i> - splendid mariposa lily	Native	Perennial	Herb	0.2
<i>Centaurea melitensis</i> - Maltese star-thistle	Nonnative	Annual	Herb	0.2
<i>Deinandra conjugens</i> - Otay tarplant	Native	Annual	Herb	0.2
<i>Deinandra fasciculata</i> - clustered tarweed	Native	Annual	Herb	2
<i>Dichelostemma capitatum</i> - bluedicks	Native	Perennial	Herb	0.2
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	3
<i>Erodium cicutarium</i> - redstem stork's bill	Nonnative	Annual	Herb	0.2
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	1
<i>Festuca perennis</i> - Italian rye grass	Nonnative	Annual	Grass	1
<i>Hedynois cretica</i> - Cretanweed	Nonnative	Annual	Herb	1
<i>Hordeum marinum</i> - seaside barley	Nonnative	Annual	Grass	0.2
<i>Isocoma menziesii</i> - Menzies' goldenbush	Native	Perennial	Shrub	1
<i>Lepidium nitidum</i> - shining pepperweed	Native	Annual	Herb	0.2
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
<i>Salsola tragus</i> - prickly Russian thistle	Nonnative	Annual	Herb	1
<i>Sonchus asper</i> - spiny sowthistle	Nonnative	Annual	Herb	0.2
<i>Sonchus oleraceus</i> - common sowthistle	Nonnative	Annual	Herb	0.2
<i>Stipa pulchra</i> - purple needle grass	Native	Perennial	Grass	2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DECO13_3PRVA013_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="7"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship; consider developing a site specific restoration plan

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

Least Bell's Vireo observed at gate entrance to SDGE access road

NOTES:

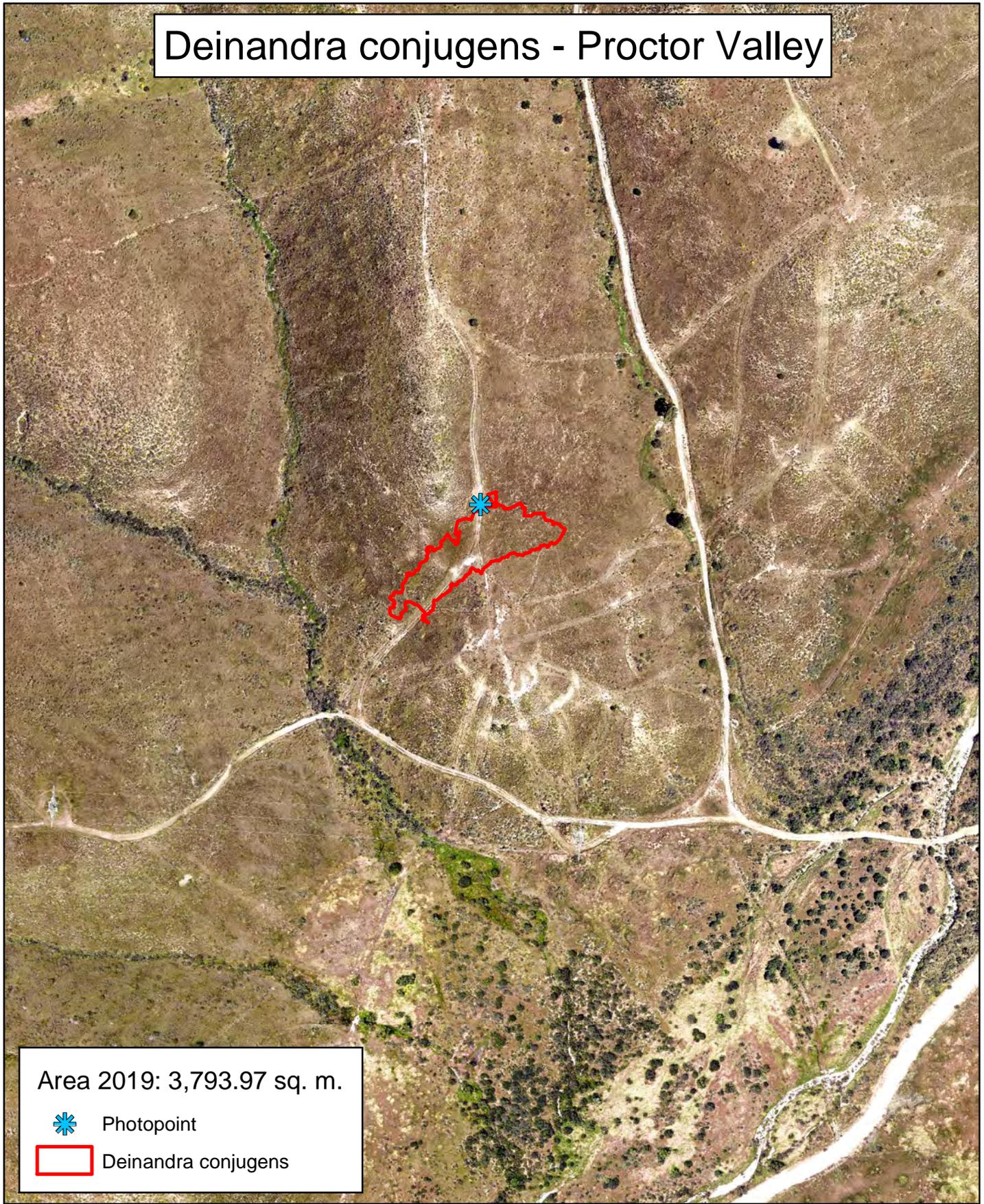
***Deinandra conjugens* (Otay Tarplant) Proctor Valley**

MSP Occurrence ID: DECO13_3PRVA013 - 1



Panorama from Southeastern edge of population, facing East, Southeast, South.
Panorama location is 6353224.49 1825326.86 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Deinandra conjugens - Proctor Valley

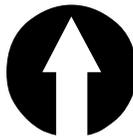


Area 2019: 3,793.97 sq. m.
* Photopoint
□ Deinandra conjugens

Pop. Area 2003 - 2019
Max Area: 3,793.97 sq. m.
Min Area: 0 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense of this information requires a separate sublicense agreement.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



Dicranostegia orcuttiana
Orcutt's Bird's Beak



© City of San Diego, 2015

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

COOR7_3DREA007_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

COOR7_3DREA007_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Acanthomintha ilicifolia - San Diego thornmint	Native	Annual	Herb	0.2
Artemisia californica - coastal sagebrush	Native	Perennial	Shrub	2
Brachypodium distachyon - purple false brome	Nonnative	Annual	Grass	0.2
Brassica nigra - black mustard	Nonnative	Annual	Herb	3
Brassica tournefortii - Asian mustard	Nonnative	Annual	Herb	0.2
Bromus madritensis - compact brome	Nonnative	Annual	Grass	0.2
Centaurea melitensis - Maltese star-thistle	Nonnative	Annual	Herb	44
Cryptantha sp. - cryptantha	Native	Annual	Herb	0.2
Cylindropuntia prolifera - coastal cholla	Native	Perennial	Shrub	2
Daucus pusillus - American wild carrot	Native	Annual	Herb	0.2
Deinandra conjugens - Otay tarplant	Native	Annual	Herb	4
Deinandra fasciculata - clustered tarweed	Native	Annual	Herb	0.2
Dicranostegia orcuttiana - Orcutt's birds-beak	Native	Annual	Herb	2
Erigeron sumatrensis - tropical horseweed	Nonnative	Annual	Herb	0.2
Eriogonum fasciculatum - Eastern Mojave buckwheat	Native	Perennial	Shrub	1
Erodium malacoides	Nonnative	Annual	Herb	1
Galium angustifolium - narrowleaf bedstraw	Native	Perennial	Herb	0.2
Lysimachia arvensis - Scarlet pimpernel	Nonnative	Annual	Herb	0.2
Marrubium vulgare - White horehound	Nonnative	Perennial	Herb	0.2
Melilotus indica - annual yellow sweetclover	Nonnative	Annual	Herb	0.2
Oncosiphon piluliferum - stinknet	Nonnative	Annual	Herb	0.2
Parietaria hespera	Native	Annual	Herb	0.2
Peritoma arborea - bladderpod spiderflower	Native	Perennial	Shrub	0.2
Pterostegia drymarioides - woodland threadstem	Native	Annual	Herb	0.2
Rhus integrifolia - lemonade berry	Native	Perennial	Shrub	17
Simmondsia chinensis - jojoba	Native	Perennial	Shrub	6
Sonchus asper - spiny sowthistle	Nonnative	Annual	Herb	0.2
Stipa lepida - foothill needle grass	Native	Perennial	Grass	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

COOR7_3DREA007_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="7"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="3"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue prederve stewardship; consider more intendive weed control and creating a site specific restoration plan

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

CAGN in mapped extent

NOTES:

***Dicranostegia orcuttiana* (Orcutt's Bird's Beak)**

Dennergy Ranch East

MSP Occurrence ID: COOR7_3DREA007 - 1



Panorama from Southwestern end of population, facing Southwest, West, Northwest.
Panorama location is 6323225.326 1792984.827 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Dicranostegia orcuttiana - Dennery Ranch East



Area 2019: 3,503.81 sq. m.

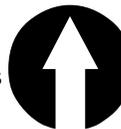
 Photopoint

 Dicranostegia orcuttiana

Pop. Area 2016 - 2019
Max Area: 3,503.81 sq. m.
Min Area: 0 sq. m.



Meters



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019

Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

COOR7_3ORVA001_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

COOR7_3ORVA001_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Artemisia californica - coastal sagebrush	Native	Perennial	Shrub	5
Baccharis pilularis - coyotebrush	Native	Perennial	Shrub	2
Baccharis salicifolia - mule-fat	Native	Perennial	Shrub	1
Baccharis sarothroides - desertbroom	Native	Perennial	Shrub	15
Brachypodium distachyon - purple false brome	Nonnative	Annual	Grass	0.2
Brassica nigra - black mustard	Nonnative	Annual	Herb	0.2
Bromus madritensis - compact brome	Nonnative	Annual	Grass	1
Cortaderia selloana - pampas grass	Nonnative	Perennial	Grass	1
Crassula connata - sand pygmyweed	Native	Annual	Herb	0.2
Dicranostegia orcuttiana - Orcutt's birds-beak	Native	Annual	Herb	5
Diplacus aurantiacus var. Aurantiacus - sticky monkeyflower	Native	Perennial	Shrub	8
Eriastrum filifolium	Native	Annual	Herb	0.2
Festuca myuros - rattail fescue	Nonnative	Annual	Grass	1
Galium angustifolium - narrowleaf bedstraw	Native	Perennial	Herb	0.2
Logfia gallica - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
Lysimachia minima - chaffweed	Native	Annual	Herb	0.2
Malosma laurina - laurel sumac	Native	Perennial	Shrub	10
Peritoma arborea - bladderpod spiderflower	Native	Perennial	Shrub	0.2
Pseudognaphalium stramineum - cottonbatting plant	Native	Perennial	Herb	0.2
Rhamnus crocea - spiny redberry	Native	Perennial	Shrub	1
Rhus integrifolia - lemonade berry	Native	Perennial	Shrub	20
Salix lasiolepis - Arroyo willow	Native	Perennial	Tree	15
Selaginella cinerascens - mesa spikemoss	Native	Perennial	Fern	1
Toxicodendron diversilobum - poison oak	Native	Perennial	Shrub	4

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

COOR7_3ORVA001_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs:

Feral Pig Activity:

Altered Hydrology:

Nonnative Grass:

Trampling:

Erosion:

Nonnative Woody Plants:

Vandalism:

Urban Runoff:

Competitive Native Plants:

Current Grazing:

Slope Movement:

Dumping/Trash:

Historic Grazing:

Soil Compaction:

Encampments:

Historic Agriculture:

Fuel Modification Zone/ Fire Break:

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship and weed control efforts as needed; Coordinate with SDG&E to ensure bio-monitor is aware of Orcutt's birdbeak populations and can identify the species.

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship and targeted weed control

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

CAGN

NOTES:

***Dicranostegia orcuttiana* (Orcutt's Bird's Beak)**

Otay River Valley

MSP Occurrence ID: COOR7_3ORVA001 - 1



Panorama from Southwestern end of population, facing North, Northeast, East.
Panorama location is 6316896.838 1794306.621 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Dicranostegia orcuttiana - Otay River Valley



Area 2019: 1,161.90 sq. m.

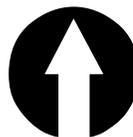
 Photopoint

 Dicranostegia orcuttiana

Pop. Area 2003 - 2019
Max Area: 1,161.90 sq. m.
Min Area: 9.00 sq. m.

0 10 20
Meters

Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

Dudleya brevifolia
Short-Leaved Dudleya



© City of San Diego, 2016

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUBLB2_6CMPR001_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location:

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent:

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUBLB2_6CMR001_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Adenostoma fasciculatum - chamise	Native	Perennial	Shrub	2
Bromus hordeaceus - soft brome	Nonnative	Annual	Grass	2
Crassula connata - sand pygmyweed	Native	Annual	Herb	1
Cryptantha sp. - cryptantha	Native	Annual	Herb	0.2
Deinandra fasciculata - clustered tarweed	Native	Annual	Herb	0.2
Dodecatheon clevelandii - padre's shootingstar	Native	Perennial	Herb	0.2
Eriogonum fasciculatum - Eastern Mojave buckwheat	Native	Perennial	Shrub	3
Erodium cicutarium - redstem stork's bill	Nonnative	Annual	Herb	0.2
Festuca myuros - rattail fescue	Nonnative	Annual	Grass	0.2
Hypochaeris glabra - smooth cat's ear	Nonnative	Annual	Herb	0.2
Logfia gallica - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
Opuntia littoralis - coastal pricklypear	Native	Perennial	Shrub	0.2
Osmadenia tenella - false rosinweed	Native	Annual	Herb	0.2
Plantago erecta - California plantain	Native	Annual	Herb	1
Pseudognaphalium stramineum - cottonbatting plant	Native	Perennial	Herb	0.2
Psilocarphus tenellus - slender woolly heads	Native	Annual	Herb	0.2
Selaginella cinerascens - mesa spikemoss	Native	Perennial	Fern	27
Xylococcus bicolor - mission manzanita	Native	Perennial	Shrub	0.2
Zeltnera venusta - charming centaury	Native	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUBLB2_6CMR001_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text"/>	Feral Pig Activity: <input type="text"/>	Altered Hydrology: <input type="text"/>
Nonnative Grass: <input type="text"/>	Trampling: <input type="text"/>	Erosion: <input type="text"/>
Nonnative Woody Plants: <input type="text"/>	Vandalism: <input type="text"/>	Urban Runoff: <input type="text"/>
Competitive Native Plants: <input type="text"/>	Current Grazing: <input type="text"/>	Slope Movement: <input type="text"/>
Dumping/Trash: <input type="text"/>	Historic Grazing: <input type="text"/>	Soil Compaction: <input type="text"/>
Encampments: <input type="text"/>	Historic Agriculture: <input type="text"/>	Fuel Modification Zone/ Fire Break: <input type="text"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continuepreserve stewardship and routine patrols to reduce off trail use

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship and routine patrols to reduce off trail use

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

None

NOTES:

***Dudleya brevifolia* (Short-Leaved Dudleya)**

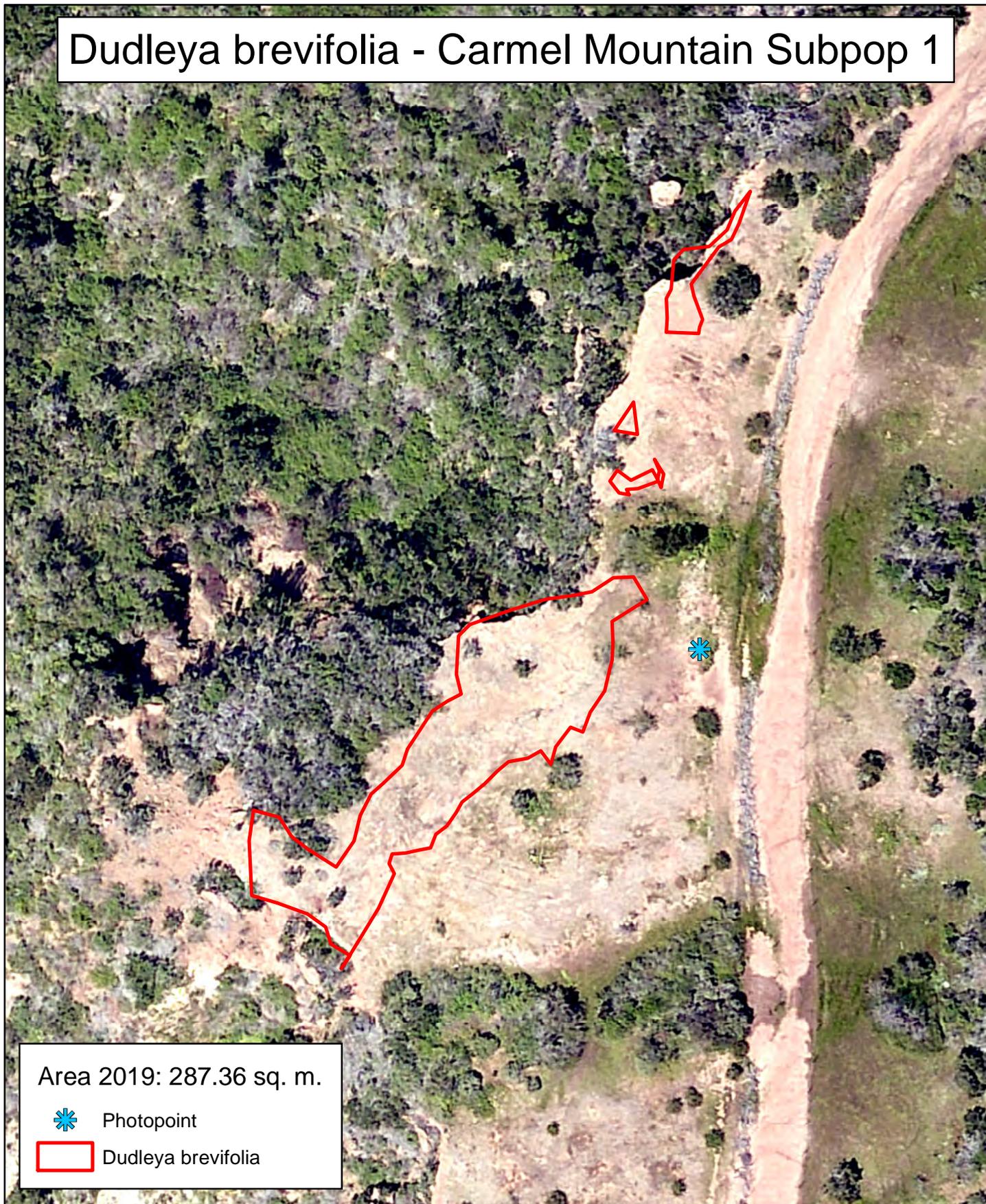
Carmel Mountain Subpopulation # 1

MSP Occurrence ID: DUBLB2_6CMPR001 - 1



Panorama from Northwestern edge of population, Southwest, West, Northwest, North.
Panorama location is 6264079.979 1920661.488 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Dudleya brevifolia - Carmel Mountain Subpop 1



Area 2019: 287.36 sq. m.

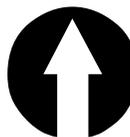
 Photopoint

 Dudleya brevifolia

Pop. Area 2001 - 2019
Max Area: 313.30 sq. m.
Min Area: 84.50 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or sublicensing of sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUBLB2_6CMPR001_2

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location:

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent:

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUBLB2_6CMR001_2

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	0.2
<i>Adenostoma fasciculatum</i> - chamise	Native	Perennial	Shrub	6
<i>Antirrhinum nuttallianum</i> - Nuttall's snapdragon	Native	Annual	Herb	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	0.2
<i>Cardionema ramosissimum</i> - sandcarpet	Native	Perennial	Herb	0.2
<i>Chorizanthe polygonoides</i> var. <i>longispina</i> - knotweed spineflower	Native	Annual	Herb	0.2
<i>Crassula aquatica</i> - aquatic pygmy weed	Native	Annual	Herb	0.2
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	0.2
<i>Deinandra fasciculata</i> - clustered tarweed	Native	Annual	Herb	0.2
<i>Dudleya brevifolia</i> - Short-leaved dudleya	Native	Perennial	Herb	1
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	0.2
<i>Eryngium aristulatum</i> var. <i>parishii</i> - San Diego button celery	Native	Annual	Herb	0.2
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	0.2
<i>Juncus bufonius</i> - toad rush	Native	Annual	Herb	0.2
<i>Lasthenia gracilis</i> - needle goldfields	Native	Annual	Herb	0.2
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
<i>Navarretia hamata</i> - hooked pincushionplant	Native	Annual	Herb	0.2
<i>Pogogyne abramsii</i> - San Diego mesa mint	Native	Annual	Herb	0.2
<i>Pseudognaphalium stramineum</i> - cottonbatting plant	Native	Perennial	Herb	0.2
<i>Psilocarphus brevissimus</i> - woolly marble	Native	Annual	Herb	0.2
<i>Psilocarphus tenellus</i> - slender woolly heads	Native	Annual	Herb	0.2
<i>Salvia mellifera</i> - black sage	Native	Perennial	Shrub	0.2
<i>Selaginella cinerascens</i> - mesa spikemoss	Native	Perennial	Fern	25
<i>Spergularia bocconi</i> - sand spurry	Nonnative	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUBLB2_6CMR001_2

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text"/>	Feral Pig Activity: <input type="text"/>	Altered Hydrology: <input type="text"/>
Nonnative Grass: <input type="text"/>	Trampling: <input type="text"/>	Erosion: <input type="text"/>
Nonnative Woody Plants: <input type="text"/>	Vandalism: <input type="text"/>	Urban Runoff: <input type="text"/>
Competitive Native Plants: <input type="text"/>	Current Grazing: <input type="text"/>	Slope Movement: <input type="text"/>
Dumping/Trash: <input type="text"/>	Historic Grazing: <input type="text"/>	Soil Compaction: <input type="text"/>
Encampments: <input type="text"/>	Historic Agriculture: <input type="text"/>	Fuel Modification Zone/ Fire Break: <input type="text"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship and routine patrols to discourage off trail use

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship and routine patrols

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

CAGN

NOTES:

***Dudleya brevifolia* (Short-Leaved Dudleya)**
Carmel Mountain Subpopulation # 2

MSP Occurrence ID: DUBLB2_6CMPR001 - 2



Panorama from Northeastern edge of population, North, Northeast, East, Southeast.
Panorama location is 6265696.74 1920365.46 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Dudleya brevifolia - Carmel Mountain Subpop 2

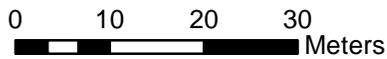


Area 2019: 479.54 sq. m.

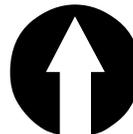
 Photopoint

 Dudleya brevifolia

Pop. Area 2001 - 2019
Max Area: 479.54 sq. m.
Min Area: 26.54 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUBLB2_6CMPR001_3

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUBLB2_6CMR001_3

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Plantago erecta - California plantain	Native	Annual	Herb	0.2
Pseudognaphalium stramineum - cottonbatting plant	Native	Perennial	Herb	0.2
Rhus integrifolia - lemonade berry	Native	Perennial	Shrub	9
Salvia mellifera - black sage	Native	Perennial	Shrub	1
Schismus barbatus - common Mediterranean grass	Nonnative	Annual	Grass	0.2
Selaginella cinerascens - mesa spikemoss	Native	Perennial	Fern	6
Stipa lepida - foothill needle grass	Native	Perennial	Grass	0.2
Stylocline gnaphaloides - everlasting nest straw	Native	Annual	Herb	0.2
Zeltnera venusta - charming centaury	Native	Annual	Herb	0.2
Adenostoma fasciculatum - chamise	Native	Perennial	Shrub	0.2
Antirrhinum nuttallianum - Nuttall's snapdragon	Native	Annual	Herb	0.2
Apiastrum angustifolium - mock parsley	Native	Annual	Herb	0.2
Bromus hordeaceus - soft brome	Nonnative	Annual	Grass	0.2
Bromus madritensis - compact brome	Nonnative	Annual	Grass	0.2
Centaurea melitensis - Maltese star-thistle	Nonnative	Annual	Herb	2
Cerastium glomeratum - sticky mouseear chickweed	Nonnative	Annual	Herb	0.2
Chorizanthe polygonoides var. longispina - knotweed spineflower	Native	Annual	Herb	1
Crassula connata - sand pygmyweed	Native	Annual	Herb	0.2
Daucus pusillus - American wild carrot	Native	Annual	Herb	0.2
Deinandra fasciculata - clustered tarweed	Native	Annual	Herb	1
Dudleya brevifolia - Short-leaved dudleya	Native	Perennial	Herb	2
Eriogonum fasciculatum - Eastern Mojave buckwheat	Native	Perennial	Shrub	3
Eriophyllum confertiflorum - golden yarrow	Native	Annual	Herb	0.2
Ferocactus viridescens - San Diego barrel cactus	Native	Perennial	Shrub	0.2
Festuca myuros - rattail fescue	Nonnative	Annual	Grass	2
Logfia gallica - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
Lysimachia arvensis - Scarlet pimpernel	Nonnative	Annual	Herb	0.2
Muilla maritima - sea muilla	Native	Perennial	Herb	0.2
Navarretia hamata - hooked pincushionplant	Native	Annual	Herb	0.2
Pentagramma triangularis - goldbeck fern	Native	Perennial	Fern	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUBLB2_6CMR001_3

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="3"/>	Trampling: <input type="text" value="3"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship and routine patrols to ensure people stay on trails

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship and routine enforcement patrols

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

CAGN calling in circle plot

NOTES:

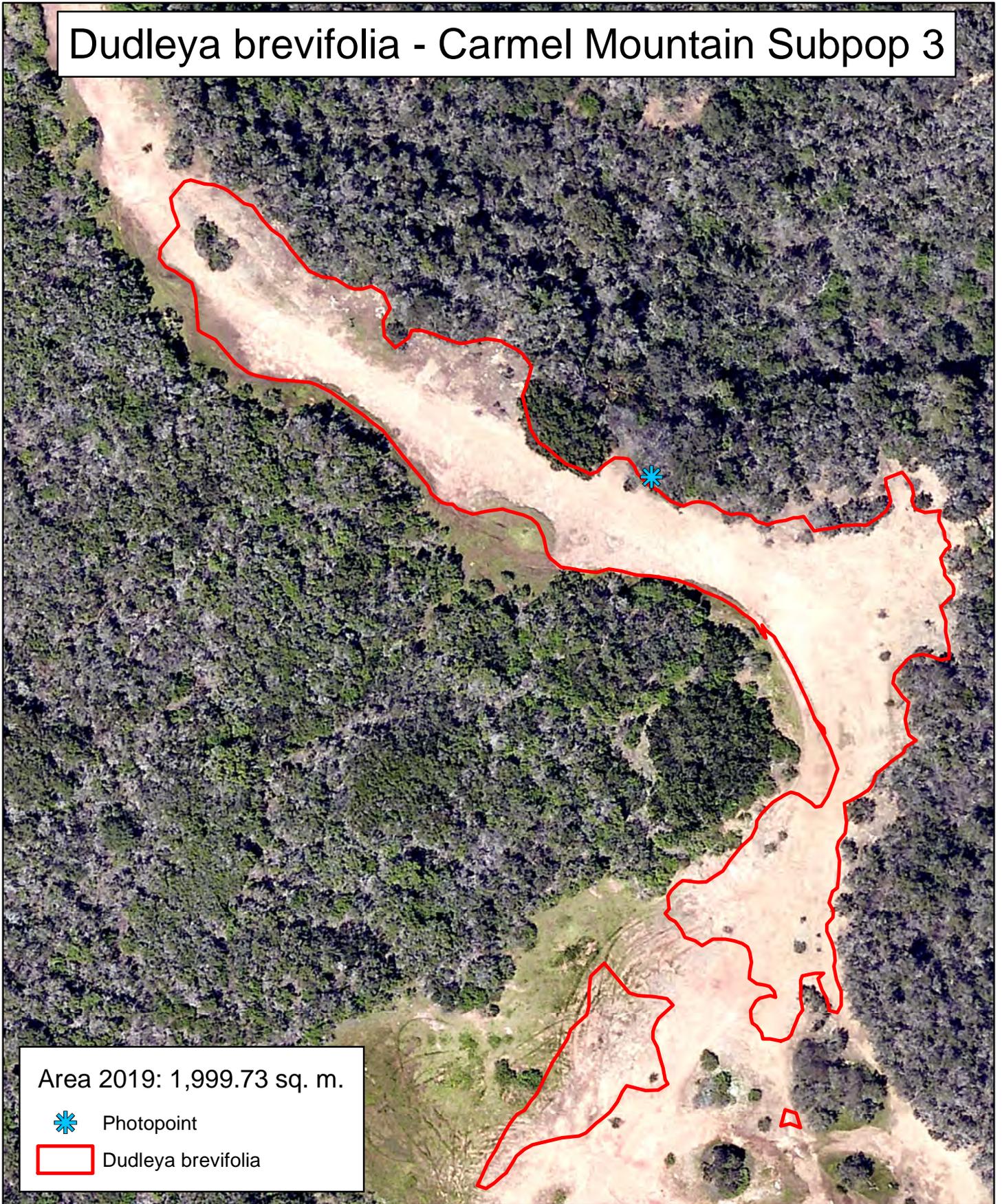
Noted footprints and trampling in Dudleya population by Sample Point 3

***Dudleya brevifolia* (Short-Leaved Dudleya)**
Carmel Mountain Subpopulation # 3
MSP Occurrence ID: DUBLB2_6CMPR001 - 3



Panorama from Southwestern edge of population, Southeast, South, Southwest, West, Northwest.
Panorama location is 6265588.551 1920725.098 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Dudleya brevifolia - Carmel Mountain Subpop 3



Area 2019: 1,999.73 sq. m.

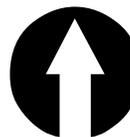
 Photopoint

 Dudleya brevifolia

Pop. Area 2001 - 2019
Max Area: 1,999.73 sq. m.
Min Area: 321.50 sq. m.

0 10 20
Meters

Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUBLB2_7CRCA003_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location:
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUBLB2_7CRCA003_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Adenostoma fasciculatum - chamise	Native	Perennial	Shrub	4
Apiastrum angustifolium - mock parsley	Native	Annual	Herb	0.2
Artemisia californica - coastal sagebrush	Native	Perennial	Shrub	3
Bromus madritensis - compact brome	Nonnative	Annual	Grass	0.2
Calochortus splendens - splendid mariposa lily	Native	Perennial	Herb	0.2
Camissoniopsis bistorta - southern suncup	Native	Annual	Herb	0.2
Chlorogalum parviflorum - smallflower soap plant	Native	Perennial	Herb	0.2
Cneoridium dumosum - bush rue	Native	Perennial	Shrub	0.2
Crassula connata - sand pygmyweed	Native	Annual	Herb	0.2
Diplacus aurantiacus var. Aurantiacus - sticky monkeyflower	Native	Perennial	Shrub	1
Dudleya brevifolia - Short-leaved dudleya	Native	Perennial	Herb	1
Eriogonum fasciculatum - Eastern Mojave buckwheat	Native	Perennial	Shrub	7
Festuca myuros - rattail fescue	Nonnative	Annual	Grass	0.2
Hypochaeris glabra - smooth cat's ear	Nonnative	Annual	Herb	0.2
Marah macrocarpus - Cucamonga manroot	Native	Perennial	Herb	0.2
Plantago erecta - California plantain	Native	Annual	Herb	1
Pseudognaphalium californicum - ladies' tobacco	Native	Perennial	Herb	0.2
Pseudognaphalium stramineum - cottonbatting plant	Native	Perennial	Herb	0.2
Rhus integrifolia - lemonade berry	Native	Perennial	Shrub	4
Salvia mellifera - black sage	Native	Perennial	Shrub	1
Selaginella bigelovii - Bigelow's spike moss	Native	Perennial	Fern	25
Sonchus asper - spiny sowthistle	Nonnative	Annual	Herb	0.2
Xylococcus bicolor - mission manzanita	Native	Perennial	Shrub	2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUBLB2_7CRCA003_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="3"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="3"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship, consider fencing site

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

CAGN

NOTES:

***Dudleya brevifolia* (Short-Leaved Dudleya)** **Crest Canyon – Northern Subpopulation**

MSP Occurrence ID: DUBLB2_7CRCA003 - 1



Panorama from Northeastern edge of population, West, North, East.
Panorama location is 6253917.07 1928311.12 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Dudleya brevifolia - Crest Canyon North

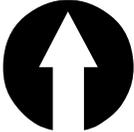


Area 2019: 120.71 sq. m.
* Photopoint
□ Dudleya brevifolia

Pop. Area 2001 - 2019
Max Area: 186.00 sq. m.
Min Area: 9.40 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUBLB2_7CRCA003_2

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUBLB2_7CRCA003_2

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Adenostoma fasciculatum - chamise	Native	Perennial	Shrub	16
Antirrhinum nuttallianum - Nuttall's snapdragon	Native	Annual	Herb	0.2
Bromus madritensis - compact brome	Nonnative	Annual	Grass	0.2
Ceanothus verrucosus - Wart-stemmed ceanothus	Native	Perennial	Shrub	0.2
Chlorogalum parviflorum - smallflower soap plant	Native	Perennial	Herb	0.2
Cneoridium dumosum - bush rue	Native	Perennial	Shrub	5
Crassula connata - sand pygmyweed	Native	Annual	Herb	0.2
Cryptantha sp. - cryptantha	Native	Annual	Herb	0.2
Deinandra fasciculata - clustered tarweed	Native	Annual	Herb	0.2
Diplacus aurantiacus var. Aurantiacus - sticky monkeyflower	Native	Perennial	Shrub	1
Dudleya brevifolia - Short-leaved dudleya	Native	Perennial	Herb	0.2
Dudleya lanceolata - lanceleaf liveforever	Native	Perennial	Herb	0.2
Isocoma menziesii - Menzies' goldenbush	Native	Perennial	Shrub	0.2
Malosma laurina - laurel sumac	Native	Perennial	Shrub	1
Marah macrocarpus - Cucamonga manroot	Native	Perennial	Herb	0.2
Matricaria discoidea - pineapple weed	Native	Annual	Herb	0.2
Plantago erecta - California plantain	Native	Annual	Herb	0.2
Pseudognaphalium stramineum - cottonbatting plant	Native	Perennial	Herb	0.2
Rhus integrifolia - lemonade berry	Native	Perennial	Shrub	1
Salvia mellifera - black sage	Native	Perennial	Shrub	2
Schismus barbatus - common Mediterranean grass	Nonnative	Annual	Grass	0.2
Selaginella cinerascens - mesa spikemoss	Native	Perennial	Fern	1
Spergularia bocconi - sand spurry	Nonnative	Annual	Herb	0.2
Stipa lepidota - foothill needle grass	Native	Perennial	Grass	0.2
Xylococcus bicolor - mission manzanita	Native	Perennial	Shrub	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUBLB2_7CRCA003_2

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="3"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="3"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship and patrols to enforce legal trail use

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship and regular patrols enforce legal trail use

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

None

NOTES:

149 plants found in mapped area for pt 2 (mapped area entirely in circle)

***Dudleya brevifolia* (Short-Leaved Dudleya)** **Crest Canyon – Southern Subpopulation**

MSP Occurrence ID: DUBLB2_7CRCA003 - 2



Panorama from Northern edge of population, Northwest, North, Northeast.
Panorama location is 6253843.22 1927609.02 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Dudleya brevifolia - Crest Canyon South



Area 2019: 24.23 sq. m.

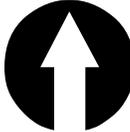
 Photopoint

 Dudleya brevifolia

Pop. Area 2005 - 2019
Max Area: 126.90 sq. m.
Min Area: 4.30 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

Dudleya variegata
Variegated Dudleya



© City of San Diego, 2004

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_6BMRA020_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:
 Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_6BMRA020_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Artemisia californica - coastal sagebrush	Native	Perennial	Shrub	2
Avena barbata - slender oat	Nonnative	Annual	Grass	0.2
Baccharis pilularis - coyotebrush	Native	Perennial	Shrub	0.2
Brachypodium distachyon - purple false brome	Nonnative	Annual	Grass	53
Brassica nigra - black mustard	Nonnative	Annual	Herb	1
Bromus hordeaceus - soft brome	Nonnative	Annual	Grass	0.2
Bromus madritensis - compact brome	Nonnative	Annual	Grass	0.2
Calochortus splendens - splendid mariposa lily	Native	Perennial	Herb	0.2
Calystegia macrostegia - island false bindweed	Native	Perennial	Herb	0.2
Chlorogalum parviflorum - smallflower soap plant	Native	Perennial	Herb	0.2
Corethrogyne filaginifolia - California sandaster	Native	Perennial	Herb	1
Cynara cardunculus - artichoke thistle	Nonnative	Perennial	Herb	5
Dichelostemma capitatum - bluedicks	Native	Perennial	Herb	0.2
Eriogonum fasciculatum - Eastern Mojave buckwheat	Native	Perennial	Shrub	1
Erodium cicutarium - redstem stork's bill	Nonnative	Annual	Herb	0.2
Erodium moschatum - Musky stork's bill	Nonnative	Annual	Herb	0.2
Heterotheca grandiflora - telegraphweed	Native	Annual	Herb	0.2
Isocoma menziesii - Menzies' goldenbush	Native	Perennial	Shrub	0.2
Lactuca serriola - prickly lettuce	Nonnative	Annual	Herb	0.2
Logfia gallica - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
Salvia apiana - white sage	Native	Perennial	Shrub	10
Sisyrinchium bellum - Western blue-eyed grass	Native	Perennial	Herb	0.2
Solanum sp. - nightshade	Unknown	Annual	Herb	0.2
Sonchus asper - spiny sowthistle	Nonnative	Annual	Herb	0.2
Sonchus oleraceus - common sowthistle	Nonnative	Annual	Herb	0.2
Stipa lepida - foothill needle grass	Native	Perennial	Grass	5
Stipa pulchra - purple needle grass	Native	Perennial	Grass	10
Zeltnera venusta - charming centaury	Native	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_6BMRA020_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse

Disturbances (Rank each as 1-6):

Nonnative Forbs:

Feral Pig Activity:

Altered Hydrology:

Nonnative Grass:

Trampling:

Erosion:

Nonnative Woody Plants:

Vandalism:

Urban Runoff:

Competitive Native Plants:

Current Grazing:

Slope Movement:

Dumping/Trash:

Historic Grazing:

Soil Compaction:

Encampments:

Historic Agriculture:

Fuel Modification Zone/ Fire Break:

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserce stewardship; consider preparation of a site specific restoration plan

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

CAGN

NOTES:

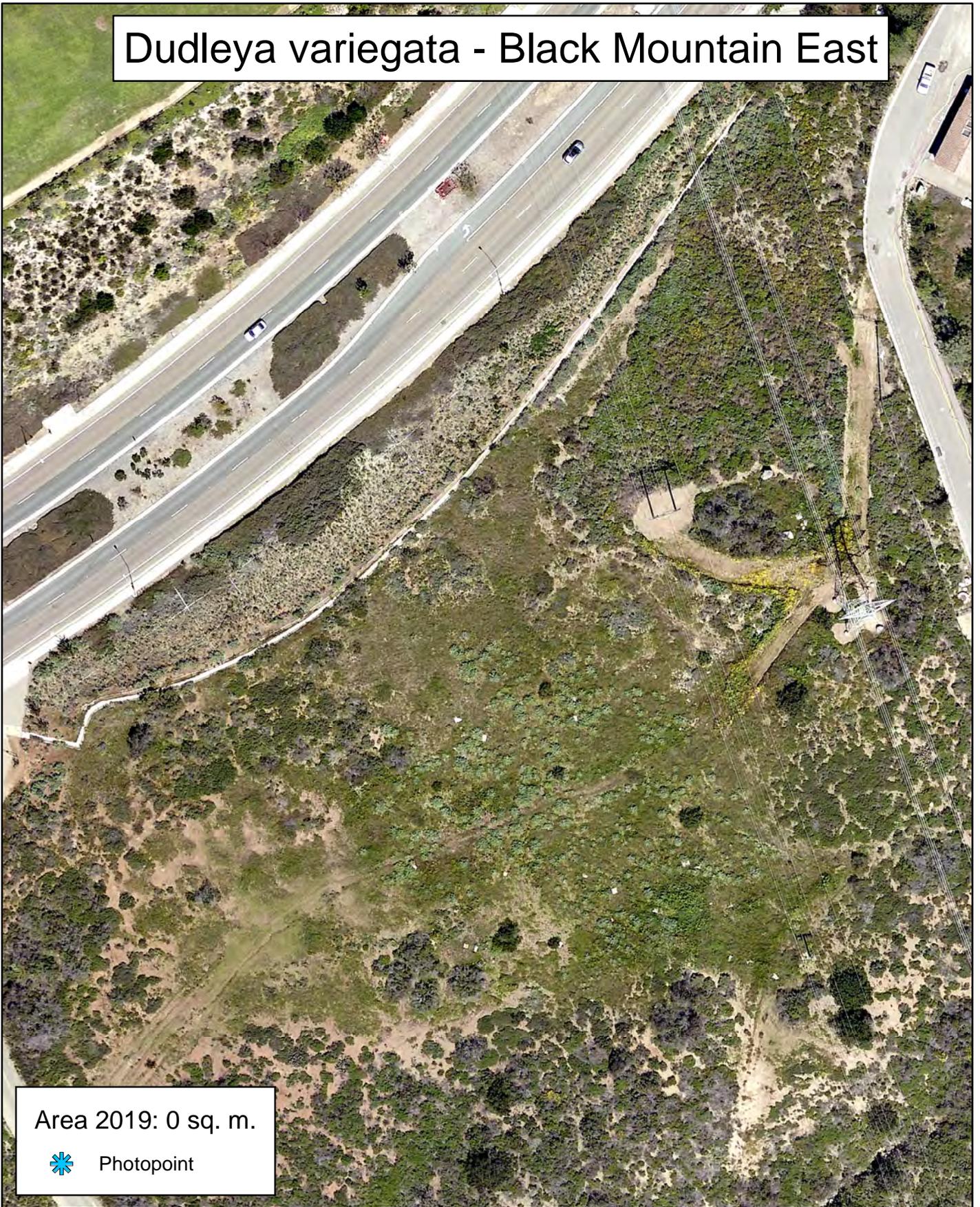
***Dudleya variegata* (Variegated Dudleya)**
Black Mountain East

MSP Occurrence ID: DUVA_6BMRA020 - 1



Panorama from Southeastern edge of population, facing East, Southeast, South.
Panorama location is 6291985.772 1939628.716 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Dudleya variegata - Black Mountain East



Area 2019: 0 sq. m.

 Photopoint

Pop. Area 2001 - 2019
Max Area: 1,845.90 sq. m.
Min Area: 0 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of this information requires the prior written consent of the City of San Diego.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_4EAEL012_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_4EAEL012_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	6
<i>Adenostoma fasciculatum</i> - chamise	Native	Perennial	Shrub	24
<i>Antirrhinum nuttallianum</i> - Nuttall's snapdragon	Native	Annual	Herb	0.2
<i>Apiastrum angustifolium</i> - mock parsley	Native	Annual	Herb	0.2
<i>Artemisia californica</i> - coastal sagebrush	Native	Perennial	Shrub	3
<i>Avena barbata</i> - slender oat	Nonnative	Annual	Grass	0.2
<i>Baccharis pilularis</i> - coyotebrush	Native	Perennial	Shrub	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	0.2
<i>Calochortus weedii</i> - Weed's mariposa lily	Native	Perennial	Herb	0.2
<i>Calystegia macrostegia</i> - island false bindweed	Native	Perennial	Herb	0.2
<i>Centaurea melitensis</i> - Maltese star-thistle	Nonnative	Annual	Herb	0.2
<i>Chlorogalum parviflorum</i> - smallflower soap plant	Native	Perennial	Herb	1
<i>Chorizanthe fimbriata</i> - fringed spineflower	Native	Annual	Herb	0.2
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	0.2
<i>Cryptantha</i> sp. - cryptantha	Native	Annual	Herb	1
<i>Daucus pusillus</i> - American wild carrot	Native	Annual	Herb	0.2
<i>Deinandra fasciculata</i> - clustered tarweed	Native	Annual	Herb	5
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	2
<i>Ferocactus viridescens</i> - San Diego barrel cactus	Native	Perennial	Shrub	0.2
<i>Hesperoyucca whipplei</i> - chaparral yucca	Native	Perennial	Shrub	1
<i>Lamarckia aurea</i> - goldentop grass	Nonnative	Annual	Grass	0.2
<i>Lepidium nitidum</i> - shining pepperweed	Native	Annual	Herb	0.2
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
<i>Malosma laurina</i> - laurel sumac	Native	Perennial	Shrub	4
<i>Microseris douglasii</i> ssp. <i>platycarpha</i> - Douglas' silverpuffs	Native	Annual	Herb	0.2
<i>Mirabilis laevis</i> - desert wishbone bush	Native	Perennial	Herb	0.2
<i>Navarretia hamata</i> - hooked pincushionplant	Native	Annual	Herb	0.2
<i>Oxalis californica</i> - California wood sorrel	Native	Annual	Herb	0.2
<i>Pseudognaphalium bicolor</i> - Twocolor cudweed	Native	Perennial	Herb	0.2
<i>Pseudognaphalium stramineum</i> - cottonbatting plant	Native	Perennial	Herb	0.2
<i>Quercus berberidifolia</i> - scrub oak	Native	Perennial	Tree	5
<i>Rhus integrifolia</i> - lemonade berry	Native	Perennial	Shrub	1
<i>Salvia mellifera</i> - black sage	Native	Perennial	Shrub	7
<i>Schismus barbatus</i> - common Mediterranean grass	Nonnative	Annual	Grass	0.2
<i>Silene gallica</i> - common catchfly	Nonnative	Annual	Herb	0.2
<i>Sonchus asper</i> - spiny sowthistle	Nonnative	Annual	Herb	0.2
<i>Stephanomeria diegensis</i> - San Diego milk aster	Native	Annual	Herb	0.2
<i>Stipa lepida</i> - foothill needle grass	Native	Perennial	Grass	0.2
<i>Stylocline gnaphaloides</i> - everlasting nest straw	Native	Annual	Herb	0.2
<i>Uropappus lindleyi</i> - silver puffs	Native	Annual	Herb	0.2
<i>Xylococcus bicolor</i> - mission manzanita	Native	Perennial	Shrub	2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_4EAEL012_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="4"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="5"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

None

NOTES:

***Dudleya variegata* (Variegated Dudleya)**
East Elliott – Hilltop

MSP Occurrence ID: DUVA_4EAEL012 - 1



Panorama from the Southwestern edge of population, facing Southeast, South, Southwest.
Panorama location is 6316264.13 1897663.71 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Dudleya variegata - East Elliott Hilltop

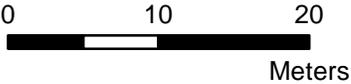


Area 2019: 130.21 sq. m.

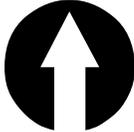
 Photopoint

 Dudleya variegata

Pop. Area 2004 - 2019
Max Area: 369.10 sq. m.
Min Area: 0 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_4EAEL012_2

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location:
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_4EAEL012_2

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	2
<i>Acmispon micranthus</i> - San Diego bird's-foot trefoil	Native	Annual	Herb	0.2
<i>Artemisia californica</i> - coastal sagebrush	Native	Perennial	Shrub	3
<i>Avena barbata</i> - slender oat	Nonnative	Annual	Grass	0.2
<i>Brachypodium distachyon</i> - purple false brome	Nonnative	Annual	Grass	6
<i>Brassica nigra</i> - black mustard	Nonnative	Annual	Herb	0.2
<i>Bromus hordeaceus</i> - soft brome	Nonnative	Annual	Grass	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	0.2
<i>Calochortus splendens</i> - splendid mariposa lily	Native	Perennial	Herb	1
<i>Centaurea melitensis</i> - Maltese star-thistle	Nonnative	Annual	Herb	0.2
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	0.2
<i>Daucus pusillus</i> - American wild carrot	Native	Annual	Herb	0.2
<i>Deinandra fasciculata</i> - clustered tarweed	Native	Annual	Herb	9
<i>Diplacus aurantiacus</i> var. <i>Aurantiacus</i> - sticky monkeyflower	Native	Perennial	Shrub	2
<i>Eriodictyon crassifolium</i> - Felt leaved yerba santa	Native	Perennial	Shrub	0.2
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	3
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	0.2
<i>Eucrypta chrysanthemifolia</i> - spotted eucrypta	Native	Annual	Herb	0.2
<i>Festuca myuros</i> - rattle tail fescue	Nonnative	Annual	Grass	1
<i>Galium angustifolium</i> - narrowleaf bedstraw	Native	Perennial	Herb	0.2
<i>Gastridium phleoides</i> - nit grass	Nonnative	Annual	Grass	1
<i>Geranium californicum</i> - California geranium	Native	Annual	Herb	0.2
<i>Hypochaeris glabra</i> - smooth cat's ear	Nonnative	Annual	Herb	0.2
<i>Isocoma menziesii</i> - Menzies' goldenbush	Native	Perennial	Shrub	1
<i>Juncus dubius</i> - finger rush	Native	Perennial	Herb	2
<i>Lathyrus vestitus</i> var. <i>alefeldii</i> - San Diego pea	Native	Annual	Herb	0.2
<i>Lepidium nitidum</i> - shining pepperweed	Native	Annual	Herb	0.2
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
<i>Lysimachia arvensis</i> - Scarlet pimpernel	Nonnative	Annual	Herb	0.2
<i>Malosma laurina</i> - laurel sumac	Native	Perennial	Shrub	3
<i>Mimulus guttatus</i> - seep monkeyflower	Native	Annual	Herb	0.2
<i>Plantago erecta</i> - California plantain	Native	Annual	Herb	0.2
<i>Polypogon monspeliensis</i> - annual rabbitsfoot grass	Nonnative	Annual	Grass	0.2
<i>Pseudognaphalium californicum</i> - ladies' tobacco	Native	Perennial	Herb	0.2
<i>Rhamnus crocea</i> - spiny redberry	Native	Perennial	Shrub	2
<i>Salsola tragus</i> - prickly Russian thistle	Nonnative	Annual	Herb	0.2
<i>Salvia apiana</i> - white sage	Native	Perennial	Shrub	5
<i>Salvia mellifera</i> - black sage	Native	Perennial	Shrub	15
<i>Sanicula arguta</i> - sharp toothed snakeroot	Native	Perennial	Herb	0.2
<i>Selaginella bigelovii</i> - Bigelow's spike moss	Native	Perennial	Fern	0.2
<i>Selaginella cinerascens</i> - mesa spikemoss	Native	Perennial	Fern	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

Silene gallica - common catchfly	Nonnative	Annual	Herb	0.2
Stephanomeria diegensis - San Diego milk aster	Native	Annual	Herb	0.2
Stipa pulchra - purple needle grass	Native	Perennial	Grass	1
Vicia ludoviciana	Native	Annual	Herb	1
Zeltnera venusta - charming centaury	Native	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_4EAEL012_2

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text"/>	Feral Pig Activity: <input type="text"/>	Altered Hydrology: <input type="text"/>
Nonnative Grass: <input type="text"/>	Trampling: <input type="text"/>	Erosion: <input type="text"/>
Nonnative Woody Plants: <input type="text"/>	Vandalism: <input type="text"/>	Urban Runoff: <input type="text"/>
Competitive Native Plants: <input type="text"/>	Current Grazing: <input type="text"/>	Slope Movement: <input type="text"/>
Dumping/Trash: <input type="text"/>	Historic Grazing: <input type="text"/>	Soil Compaction: <input type="text"/>
Encampments: <input type="text"/>	Historic Agriculture: <input type="text"/>	Fuel Modification Zone/ Fire Break: <input type="text"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

California tohee nest w/ nestlings in white sage

NOTES:

***Dudleya variegata* (Variegated Dudleya)**
East Elliott – Creek
MSP Occurrence ID: DUVA_4EAEL012 - 2



Panorama from Northwestern edge of population, facing Southwest, West, Northwest, North.
Panorama location is 6316378.38 1897097.063 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Dudleya variegata - East Elliott Creek

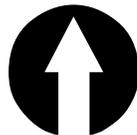


Area 2019: 0 sq. m.
* Photopoint

Pop. Area 2004 - 2019
Max Area: 1,725.20 sq. m.
Min Area: 0 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_3GOME003_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_3GOME003_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Ambrosia chenopodiifolia - San Diego bur ragweed	Native	Perennial	Shrub	1
Artemisia californica - coastal sagebrush	Native	Perennial	Shrub	4
Bromus madritensis - compact brome	Nonnative	Annual	Grass	1
Centaurea melitensis - Maltese star-thistle	Nonnative	Annual	Herb	0.2
Crassula connata - sand pygmyweed	Native	Annual	Herb	3
Cryptantha sp. - cryptantha	Native	Annual	Herb	1
Cylindropuntia prolifera - coastal cholla	Native	Perennial	Shrub	0.2
Deinandra fasciculata - clustered tarweed	Native	Annual	Herb	20
Dudleya variegata - Variegated dudleya	Native	Perennial	Herb	0.2
Eriogonum fasciculatum - Eastern Mojave buckwheat	Native	Perennial	Shrub	4
Erodium botrys - longbeak stork's bill	Nonnative	Annual	Herb	7
Ferocactus viridescens - San Diego barrel cactus	Native	Perennial	Shrub	0.2
Lamarckia aurea - goldentop grass	Nonnative	Annual	Grass	0.2
Lepidium nitidum - shining pepperweed	Native	Annual	Herb	0.2
Logfia gallica - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
Mirabilis laevis - desert wishbone bush	Native	Perennial	Herb	0.2
Plantago erecta - California plantain	Native	Annual	Herb	1
Psilocarphus brevissimus - woolly marble	Native	Annual	Herb	1
Salsola tragus - prickly Russian thistle	Nonnative	Annual	Herb	0.2
Schismus barbatus - common Mediterranean grass	Nonnative	Annual	Grass	0.2
Selaginella bigelovii - Bigelow's spike moss	Native	Perennial	Fern	0.2
Selaginella cinerascens - mesa spikemoss	Native	Perennial	Fern	6
Simmondsia chinensis - jojoba	Native	Perennial	Shrub	5
Stipa lepida - foothill needle grass	Native	Perennial	Grass	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_3GOME003_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="3"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship; fencing added to deter off road activity

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

None

NOTES:

Many dudleya appeared to be desiccating while still in bud

***Dudleya variegata* (Variegated Dudleya)**
Goat Mesa/Spring Canyon

MSP Occurrence ID: DUVA_3GOME003 - 1

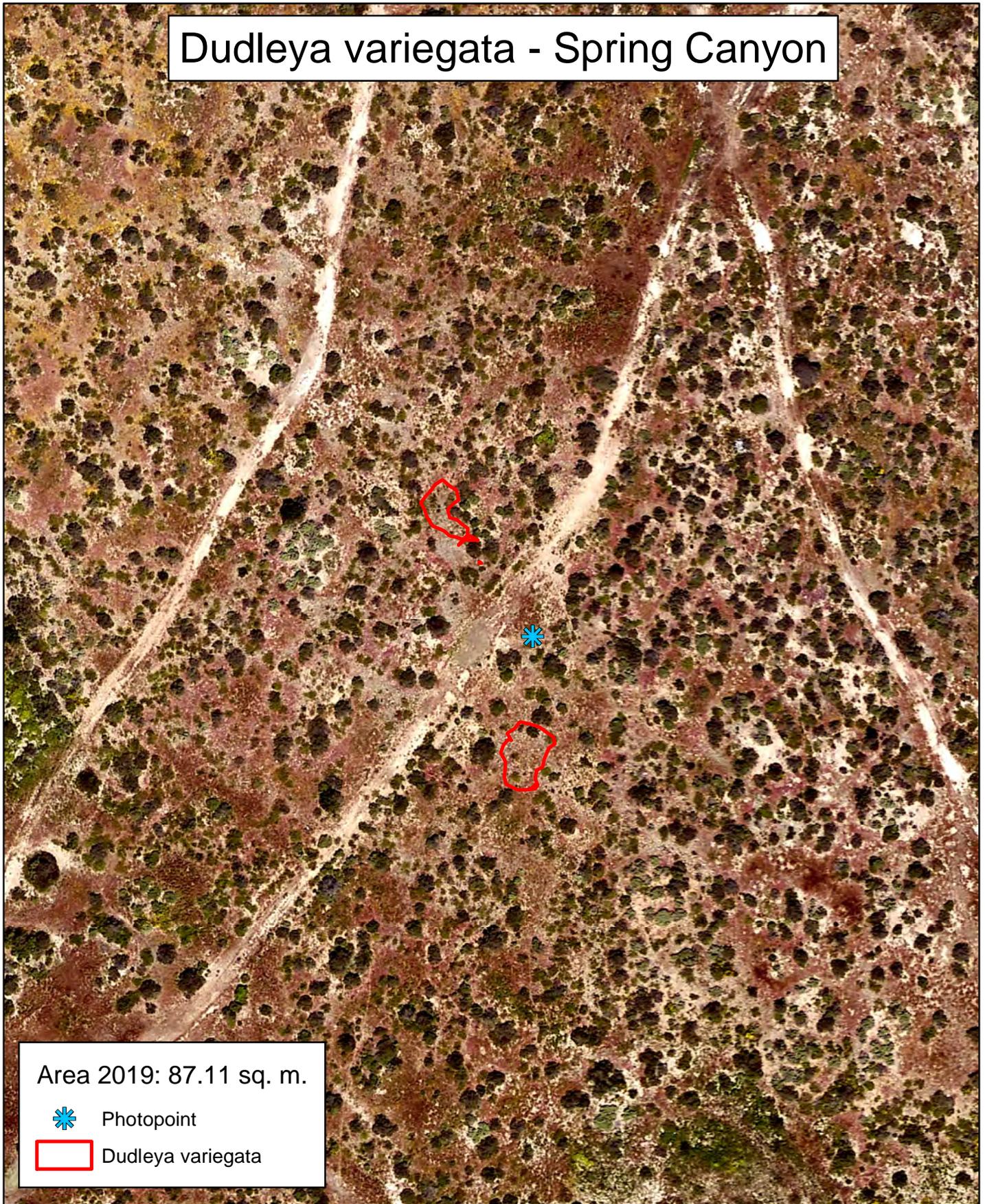


Panorama looking towards the Southwestern edge of the population, facing Southeast, South, Southwest.

Panorama location is 6330814.78 1782236.11 NAD83 State Plane California Zone 6 (feet)

Photos merged using ArcSoft Panorama Maker 4.

Dudleya variegata - Spring Canyon

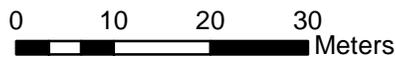


Area 2019: 87.11 sq. m.

 Photopoint

 Dudleya variegata

Pop. Area 2003 - 2019
Max Area: 1,065.54 sq. m.
Min Area: 37.00 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_3MAVA004_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:
 Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_3MAVA004_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon micranthus</i> - San Diego bird's-foot trefoil	Native	Annual	Herb	1
<i>Allium</i> sp. - onion	Native	Perennial	Herb	0.2
<i>Artemisia californica</i> - coastal sagebrush	Native	Perennial	Shrub	1
<i>Avena barbata</i> - slender oat	Nonnative	Annual	Grass	1
<i>Baccharis sarothroides</i> - desertbroom	Native	Perennial	Shrub	0.2
<i>Bloomeria clevelandii</i> - San Diego goldenstar	Native	Perennial	Herb	13
<i>Bromus diandrus</i> - ripgut brome	Nonnative	Annual	Grass	0.2
<i>Bromus hordeaceus</i> - soft brome	Nonnative	Annual	Grass	3
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	3
<i>Calochortus splendens</i> - splendid mariposa lily	Native	Perennial	Herb	0.2
<i>Centaurea melitensis</i> - Maltese star-thistle	Nonnative	Annual	Herb	0.2
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	2
<i>Dichelostemma capitatum</i> - bluedicks	Native	Perennial	Herb	0.2
<i>Dudleya variegata</i> - Variegated dudleya	Native	Perennial	Herb	1
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	25
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	2
<i>Gastridium phleoides</i> - nit grass	Nonnative	Annual	Grass	0.2
<i>Gutierrezia californica</i> - San Joaquin snakeweed	Native	Perennial	Shrub	0.2
<i>Hypochaeris glabra</i> - smooth cat's ear	Nonnative	Annual	Herb	1
<i>Lepidium nitidum</i> - shining pepperweed	Native	Annual	Herb	2
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
<i>Plantago erecta</i> - California plantain	Native	Annual	Herb	0.2
<i>Selaginella cinerascens</i> - mesa spikemoss	Native	Perennial	Fern	10
<i>Silene gallica</i> - common catchfly	Nonnative	Annual	Herb	10
Unknown - herb	Unknown	Annual	Herb	0.2
<i>Zeltnera venusta</i> - charming centauray	Native	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_3MAVA004_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="2"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="4"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="2"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

None

NOTES:

***Dudleya variegata* (Variegated Dudleya)**

Marron Valley

MSP Occurrence ID: DUVA_3MAVA004 - 1



Panorama from Northern edge of population, facing Southeast, South, Southwest.
Panorama location is 6407136.24 1787954.48 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Dudleya variegata - Marron Valley

Bloomeria clevelandii
Photopoint 1

Bloomeria clevelandii
Photopoint 2

Bloomeria clevelandii
Photopoint 3

Area 2019: 1,553.72 sq. m.

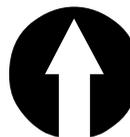
 Photopoint

 Dudleya variegata

Pop. Area 2005 - 2019
Max Area: 1,553.72 sq. m.
Min Area: 33.60 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_4MERO014_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_4MERO014_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	3
<i>Adolphia californica</i> - California adolphia	Native	Perennial	Shrub	2
<i>Artemisia californica</i> - coastal sagebrush	Native	Perennial	Shrub	7
<i>Bloomeria crocea</i> - common goldenstar	Native	Perennial	Herb	0.2
<i>Brachypodium distachyon</i> - purple false brome	Nonnative	Annual	Grass	1
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	3
<i>Centaurea melitensis</i> - Maltese star-thistle	Nonnative	Annual	Herb	0.2
<i>Chlorogalum parviflorum</i> - smallflower soap plant	Native	Perennial	Herb	4
<i>Corethrogyne filaginifolia</i> - California sandaster	Native	Perennial	Herb	1
<i>Daucus pusillus</i> - American wild carrot	Native	Annual	Herb	0.2
<i>Deinandra fasciculata</i> - clustered tarweed	Native	Annual	Herb	10
<i>Dudleya variegata</i> - Variegated dudleya	Native	Perennial	Herb	1
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	3
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	4
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	3
<i>Hypochaeris glabra</i> - smooth cat's ear	Nonnative	Annual	Herb	0.2
<i>Isocoma menziesii</i> - Menzies' goldenbush	Native	Perennial	Shrub	4
<i>Lepidium nitidum</i> - shining pepperweed	Native	Annual	Herb	0.2
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
<i>Lomatium dasycarpum</i> - woollyfruit desertparsley	Nonnative	Perennial	Herb	2
<i>Lysimachia arvensis</i> - Scarlet pimpernel	Nonnative	Annual	Herb	0.2
<i>Microseris douglasii</i> ssp. <i>platycarpha</i> - Douglas' silverpuffs	Native	Annual	Herb	0.2
<i>Plantago erecta</i> - California plantain	Native	Annual	Herb	0.2
<i>Rhus integrifolia</i> - lemonade berry	Native	Perennial	Shrub	2
<i>Selaginella cinerascens</i> - mesa spikemoss	Native	Perennial	Fern	6
<i>Sisyrinchium bellum</i> - Western blue-eyed grass	Native	Perennial	Herb	0.2
<i>Sonchus asper</i> - spiny sowthistle	Nonnative	Annual	Herb	0.2
<i>Stipa lepida</i> - foothill needle grass	Native	Perennial	Grass	6
<i>Zeltnera venusta</i> - charming centaury	Native	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_4MERO014_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="4"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Continue preserve stewardship

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

None

NOTES:

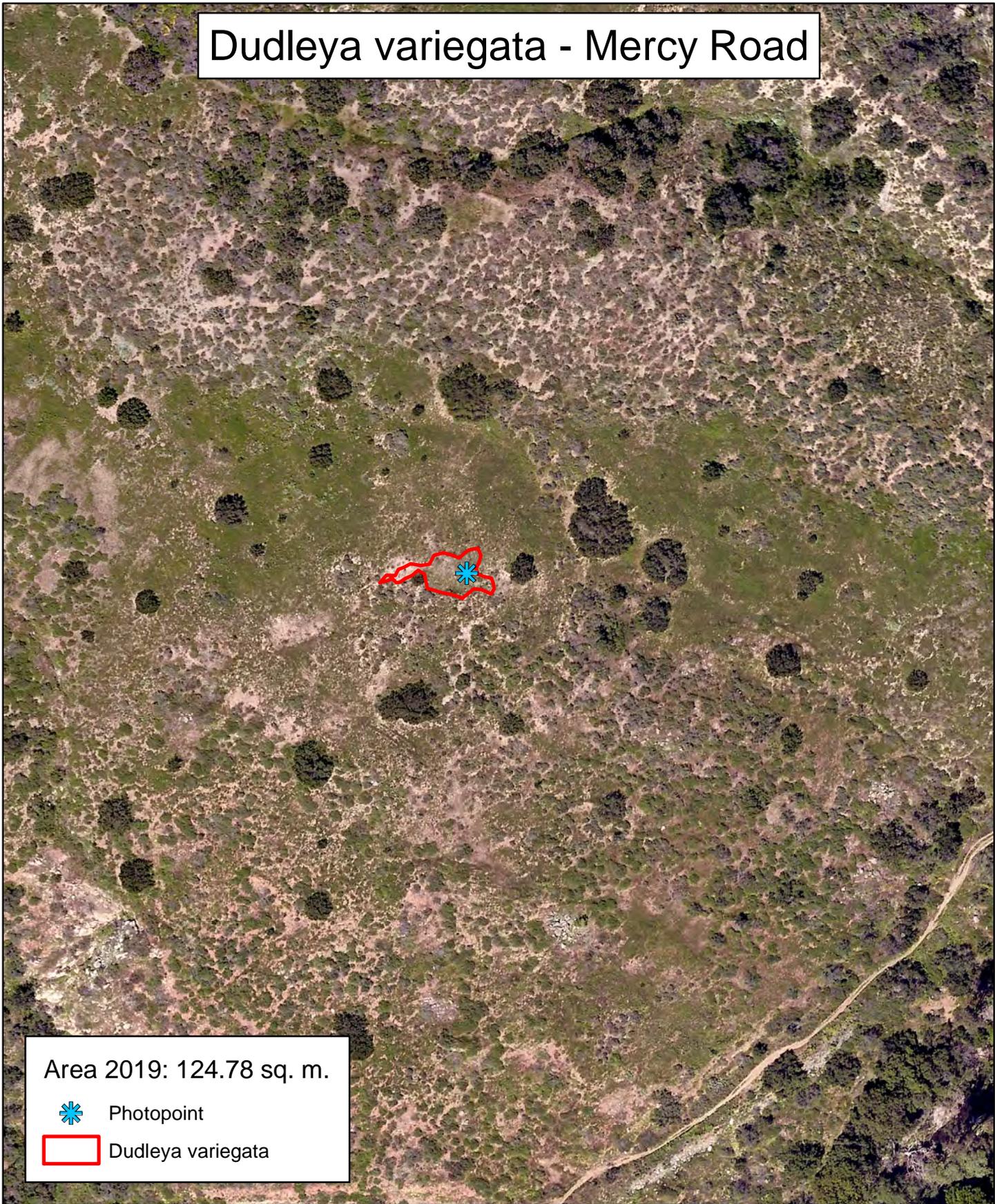
***Dudleya variegata* (Variegated Dudleya)**
Mercy Road

MSP Occurrence ID: DUVA_4MERO014 - 1



Panorama from Northwestern edge of population, facing Southwest, West, Northwest.
Panorama location is 6294507.443 1924420.89 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Dudleya variegata - Mercy Road

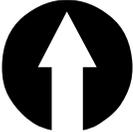


Area 2019: 124.78 sq. m.
* Photopoint
□ Dudleya variegata

Pop. Area 2003 - 2019
Max Area: 494.99 sq. m.
Min Area: 66.00 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_4MTRP015_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_4MTRP015_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	0.2
<i>Artemisia californica</i> - coastal sagebrush	Native	Perennial	Shrub	5
<i>Avena barbata</i> - slender oat	Nonnative	Annual	Grass	0.2
<i>Bahiopsis laciniata</i> - torleaf goldeneye	Native	Perennial	Shrub	2
<i>Brachypodium distachyon</i> - purple false brome	Nonnative	Annual	Grass	6
<i>Bromus hordeaceus</i> - soft brome	Nonnative	Annual	Grass	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	3
<i>Calochortus splendens</i> - splendid mariposa lily	Native	Perennial	Herb	0.2
<i>Centaurea melitensis</i> - Maltese star-thistle	Nonnative	Annual	Herb	1
<i>Chlorogalum parviflorum</i> - smallflower soap plant	Native	Perennial	Herb	0.2
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	1
<i>Cryptantha</i> sp. - cryptantha	Native	Annual	Herb	0.2
<i>Deinandra fasciculata</i> - clustered tarweed	Native	Annual	Herb	12
<i>Dichelostemma capitatum</i> - bluedicks	Native	Perennial	Herb	0.2
<i>Dudleya variegata</i> - Variegated dudleya	Native	Perennial	Herb	0.2
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	15
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	4
<i>Erodium cicutarium</i> - redstem stork's bill	Nonnative	Annual	Herb	0.2
<i>Ferocactus viridescens</i> - San Diego barrel cactus	Native	Perennial	Shrub	2
<i>Hypochaeris glabra</i> - smooth cat's ear	Nonnative	Annual	Herb	0.2
<i>Lactuca serriola</i> - prickly lettuce	Nonnative	Annual	Herb	0.2
<i>Lepidium nitidum</i> - shining pepperweed	Native	Annual	Herb	0.2
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	1
<i>Microseris douglasii</i> ssp. <i>platycarpha</i> - Douglas' silverpuffs	Native	Annual	Herb	0.2
<i>Mirabilis laevis</i> - desert wishbone bush	Native	Perennial	Herb	0.2
<i>Opuntia littoralis</i> - coastal pricklypear	Native	Perennial	Shrub	0.2
<i>Peritoma arborea</i> - bladderpod spiderflower	Native	Perennial	Shrub	3
<i>Pseudognaphalium californicum</i> - ladies' tobacco	Native	Perennial	Herb	0.2
<i>Selaginella cinerascens</i> - mesa spikemoss	Native	Perennial	Fern	10
<i>Silene gallica</i> - common catchfly	Nonnative	Annual	Herb	0.2
<i>Sonchus oleraceus</i> - common sowthistle	Nonnative	Annual	Herb	0.2
<i>Stephanomeria diegensis</i> - San Diego milk aster	Native	Annual	Herb	0.2
<i>Stipa lepida</i> - foothill needle grass	Native	Perennial	Grass	1
<i>Stipa pulchra</i> - purple needle grass	Native	Perennial	Grass	2
<i>Zeltnera venusta</i> - charming centauray	Native	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_4MTRP015_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text"/>	Feral Pig Activity: <input type="text"/>	Altered Hydrology: <input type="text"/>
Nonnative Grass: <input type="text"/>	Trampling: <input type="text"/>	Erosion: <input type="text"/>
Nonnative Woody Plants: <input type="text"/>	Vandalism: <input type="text"/>	Urban Runoff: <input type="text"/>
Competitive Native Plants: <input type="text"/>	Current Grazing: <input type="text"/>	Slope Movement: <input type="text"/>
Dumping/Trash: <input type="text"/>	Historic Grazing: <input type="text"/>	Soil Compaction: <input type="text"/>
Encampments: <input type="text"/>	Historic Agriculture: <input type="text"/>	Fuel Modification Zone/ Fire Break: <input type="text"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

None

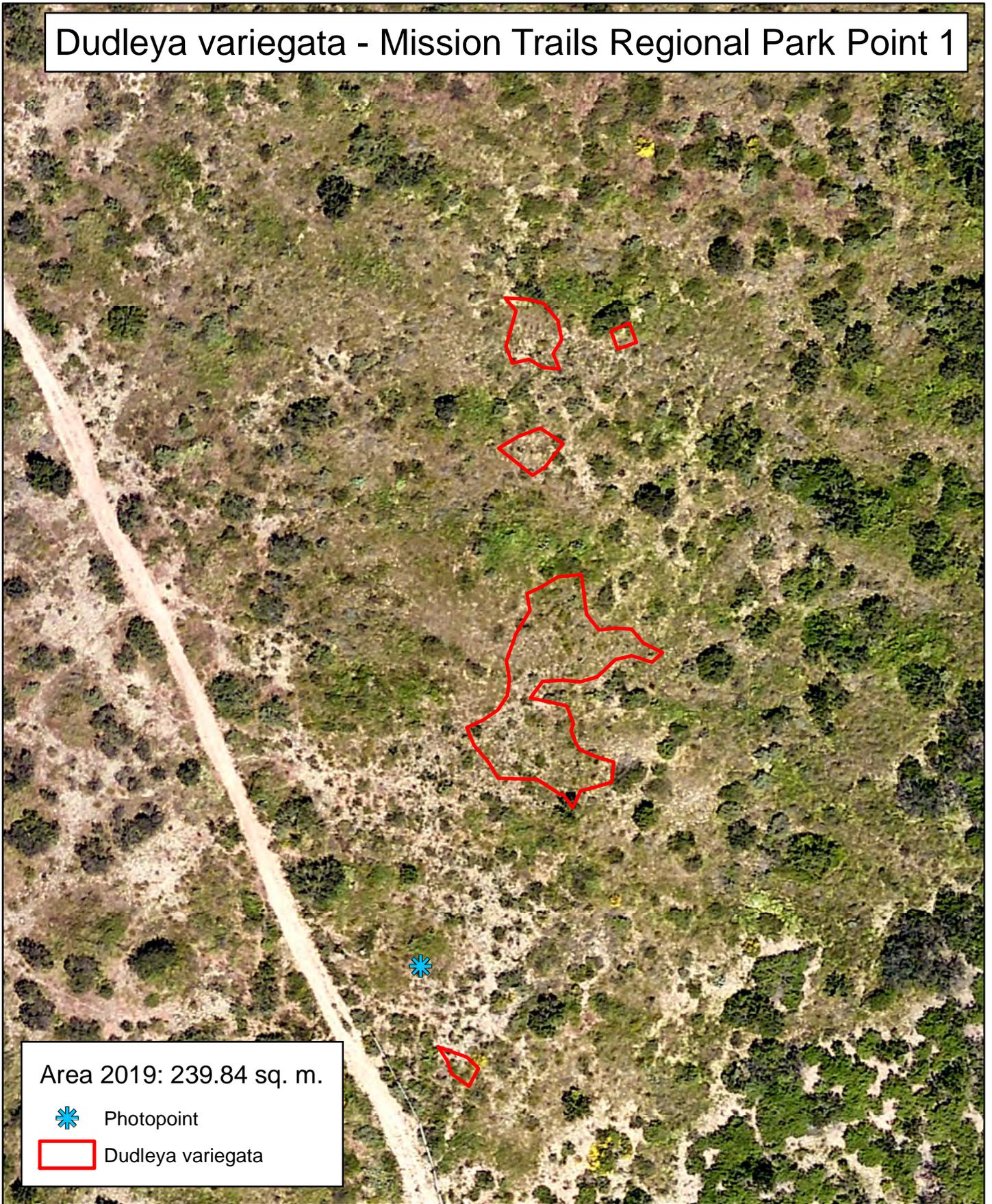
NOTES:

***Dudleya variegata* (Variegated Dudleya)**
Mission Trails Regional Park Subpopulation # 1
MSP Occurrence ID: DUVA_4MTRP015 - 1



Panorama from the Southern edge of population, facing Northwest, North, Northeast.
Panorama location is 6309627.30 1879705.91 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Dudleya variegata - Mission Trails Regional Park Point 1



Area 2019: 239.84 sq. m.

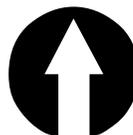
 Photopoint

 Dudleya variegata

Pop. Area 2004 - 2019
Max Area: 386.40 sq. m.
Min Area: 2.78 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of this information requires the prior written permission of the City of San Diego.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_4MTRP015_2

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_4MTRP015_2

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	3
<i>Artemisia californica</i> - coastal sagebrush	Native	Perennial	Shrub	2
<i>Avena barbata</i> - slender oat	Nonnative	Annual	Grass	0.2
<i>Bahiopsis laciniata</i> - torhleaf goldeneye	Native	Perennial	Shrub	0.2
<i>Brachypodium distachyon</i> - purple false brome	Nonnative	Annual	Grass	25
<i>Brassica nigra</i> - black mustard	Nonnative	Annual	Herb	0.2
<i>Bromus hordeaceus</i> - soft brome	Nonnative	Annual	Grass	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	1
<i>Calochortus splendens</i> - splendid mariposa lily	Native	Perennial	Herb	0.2
<i>Centaurea melitensis</i> - Maltese star-thistle	Nonnative	Annual	Herb	0.2
<i>Chlorogalum parviflorum</i> - smallflower soap plant	Native	Perennial	Herb	1
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	0.2
<i>Daucus pusillus</i> - American wild carrot	Native	Annual	Herb	0.2
<i>Deinandra fasciculata</i> - clustered tarweed	Native	Annual	Herb	1
<i>Dichelostemma capitatum</i> - bluedicks	Native	Perennial	Herb	0.2
<i>Dudleya variegata</i> - Variegated dudleya	Native	Perennial	Herb	0.2
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	12
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	7
<i>Erodium cicutarium</i> - redstem stork's bill	Nonnative	Annual	Herb	0.2
<i>Ferocactus viridescens</i> - San Diego barrel cactus	Native	Perennial	Shrub	1
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	4
<i>Galium angustifolium</i> - narrowleaf bedstraw	Native	Perennial	Herb	0.2
<i>Hedypnois cretica</i> - Cretanweed	Nonnative	Annual	Herb	0.2
<i>Hypochaeris glabra</i> - smooth cat's ear	Nonnative	Annual	Herb	0.2
<i>Isocoma menziesii</i> - Menzies' goldenbush	Native	Perennial	Shrub	0.2
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	1
<i>Malosma laurina</i> - laurel sumac	Native	Perennial	Shrub	3
<i>Marah macrocarpus</i> - Cucamonga manroot	Native	Perennial	Herb	0.2
<i>Osmadenia tenella</i> - false rosinweed	Native	Annual	Herb	0.2
<i>Rhus integrifolia</i> - lemonade berry	Native	Perennial	Shrub	0.2
<i>Selaginella cinerascens</i> - mesa spikemoss	Native	Perennial	Fern	4
<i>Silene gallica</i> - common catchfly	Nonnative	Annual	Herb	0.2
<i>Sonchus asper</i> - spiny sowthistle	Nonnative	Annual	Herb	0.2
<i>Sonchus oleraceus</i> - common sowthistle	Nonnative	Annual	Herb	0.2
<i>Stipa lepida</i> - foothill needle grass	Native	Perennial	Grass	0.2
<i>Stipa pulchra</i> - purple needle grass	Native	Perennial	Grass	1
<i>Zellnera venusta</i> - charming centaur	Native	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_4MTRP015_2

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text"/>	Feral Pig Activity: <input type="text"/>	Altered Hydrology: <input type="text"/>
Nonnative Grass: <input type="text"/>	Trampling: <input type="text"/>	Erosion: <input type="text"/>
Nonnative Woody Plants: <input type="text"/>	Vandalism: <input type="text"/>	Urban Runoff: <input type="text"/>
Competitive Native Plants: <input type="text"/>	Current Grazing: <input type="text"/>	Slope Movement: <input type="text"/>
Dumping/Trash: <input type="text"/>	Historic Grazing: <input type="text"/>	Soil Compaction: <input type="text"/>
Encampments: <input type="text"/>	Historic Agriculture: <input type="text"/>	Fuel Modification Zone/ Fire Break: <input type="text"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

None

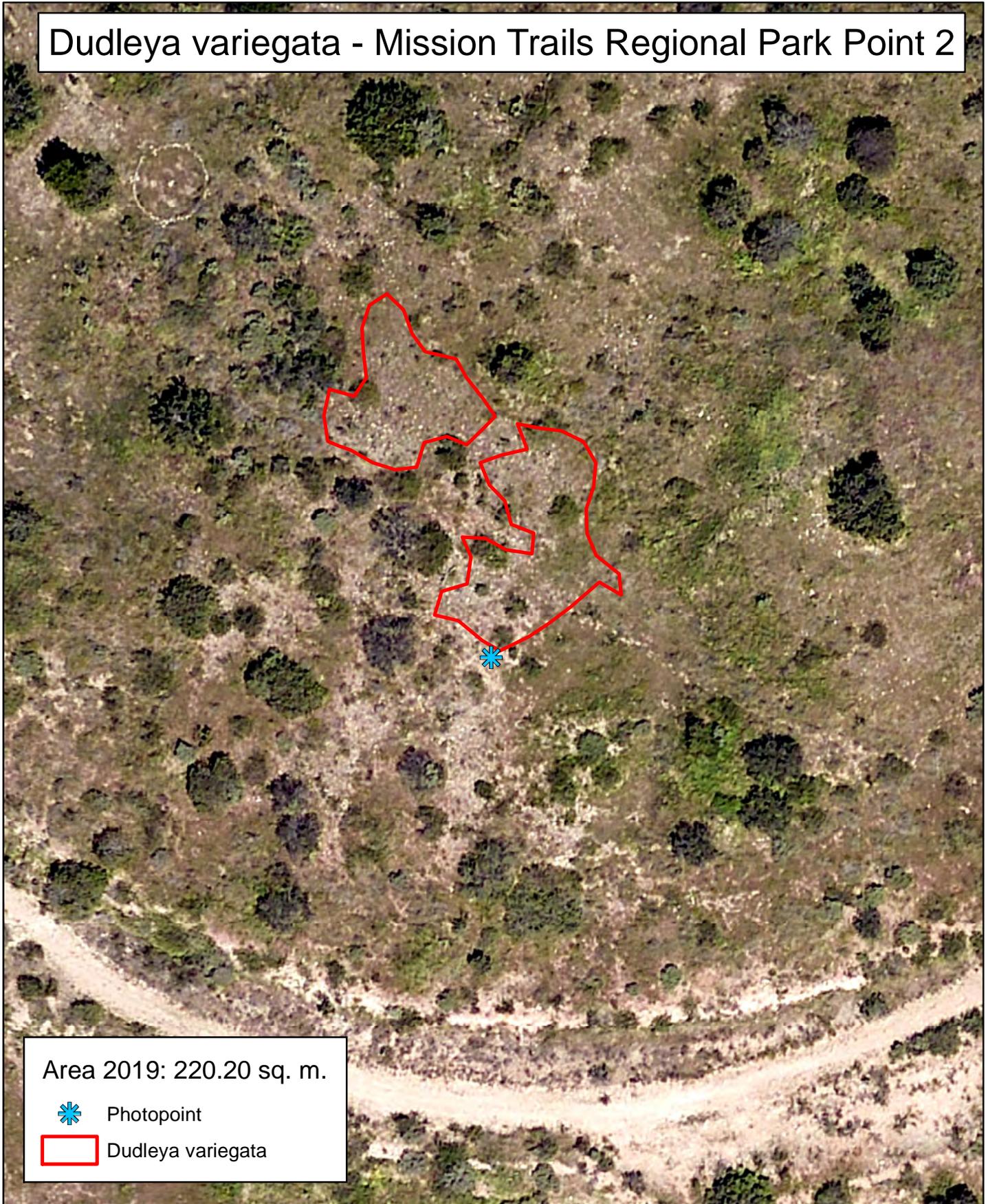
NOTES:

***Dudleya variegata* (Variegated Dudleya)**
Mission Trails Regional Park Subpopulation # 2
MSP Occurrence ID: DUVA_4MTRP015 - 2



Panorama from Northeastern edge of population, facing West, Northwest, North.
Panorama location is 6309229.821 1880126.564 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Dudleya variegata - Mission Trails Regional Park Point 2



Area 2019: 220.20 sq. m.



Photopoint

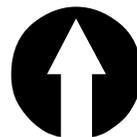


Dudleya variegata

Pop. Area 2004 - 2019
Max Area: 241.36 sq. m.
Min Area: 36.16 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreement.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_4MTRP015_3

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_4MTRP015_3

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	6
<i>Artemisia californica</i> - coastal sagebrush	Native	Perennial	Shrub	1
<i>Avena barbata</i> - slender oat	Nonnative	Annual	Grass	1
<i>Bloomeria crocea</i> - common goldenstar	Native	Perennial	Herb	0.2
<i>Brachypodium distachyon</i> - purple false brome	Nonnative	Annual	Grass	4
<i>Bromus hordeaceus</i> - soft brome	Nonnative	Annual	Grass	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	10
<i>Calochortus splendens</i> - splendid mariposa lily	Native	Perennial	Herb	0.2
<i>Centaurea melitensis</i> - Maltese star-thistle	Nonnative	Annual	Herb	0.2
<i>Chlorogalum parviflorum</i> - smallflower soap plant	Native	Perennial	Herb	0.2
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	0.2
<i>Cryptantha</i> sp. - cryptantha	Native	Annual	Herb	0.2
<i>Dichelostemma capitatum</i> - bluedicks	Native	Perennial	Herb	0.2
<i>Dichondra occidentalis</i> - western ponysfoot	Native	Perennial	Herb	1
<i>Dodecatheon clevelandii</i> - padre's shootingstar	Native	Perennial	Herb	0.2
<i>Dudleya variegata</i> - Variegated dudleya	Native	Perennial	Herb	0.2
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	6
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	5
<i>Festuca myuros</i> - raitail fescue	Nonnative	Annual	Grass	9
<i>Galium angustifolium</i> - narrowleaf bedstraw	Native	Perennial	Herb	1
<i>Hedynois cretica</i> - Cretanweed	Nonnative	Annual	Herb	1
<i>Heteromeles arbutifolia</i> - toyon	Native	Perennial	Shrub	0.2
<i>Hypochaeris glabra</i> - smooth cat's ear	Nonnative	Annual	Herb	0.2
<i>Lamarckia aurea</i> - goldentop grass	Nonnative	Annual	Grass	0.2
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
<i>Malosma laurina</i> - laurel sumac	Native	Perennial	Shrub	7
<i>Selaginella cinerascens</i> - mesa spikemoss	Native	Perennial	Fern	7
<i>Silene gallica</i> - common catchfly	Nonnative	Annual	Herb	2
<i>Sonchus asper</i> - spiny sowthistle	Nonnative	Annual	Herb	0.2
<i>Stephanomeria diegensis</i> - San Diego milk aster	Native	Annual	Herb	0.2
<i>Stipa pulchra</i> - purple needle grass	Native	Perennial	Grass	3

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_4MTRP015_3

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="4"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship, consider fencing to keep hikers on trail

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

None

NOTES:

***Dudleya variegata* (Variegated Dudleya)**
Mission Trails Regional Park Subpopulation # 3
MSP Occurrence ID: DUVA_4MTRP015 - 3



Panorama from Southwestern edge of population, facing Southeast, South, Southwest.
Panorama location is 6309578.77 1880426.96 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Dudleya variegata - Mission Trails Regional Park Point 3



Area 2019: 66.24 sq. m.
* Photopoint
□ Dudleya variegata

Pop. Area 2004 - 2019
Max Area: 66.24 sq. m.
Min Area: 0.04 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.
THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.
PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreements.
This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_4NAVA016_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_4NAVA016_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Artemisia californica - coastal sagebrush	Native	Perennial	Shrub	4
Baccharis pilularis - coyotebrush	Native	Perennial	Shrub	1
Baccharis sarothroides - desertbroom	Native	Perennial	Shrub	18
Bloomeria crocea - common goldenstar	Native	Perennial	Herb	0.2
Brachypodium distachyon - purple false brome	Nonnative	Annual	Grass	17
Brassica nigra - black mustard	Nonnative	Annual	Herb	3
Bromus hordeaceus - soft brome	Nonnative	Annual	Grass	0.2
Bromus madritensis - compact brome	Nonnative	Annual	Grass	0.2
Centaurea melitensis - Maltese star-thistle	Nonnative	Annual	Herb	0.2
Deinandra fasciculata - clustered tarweed	Native	Annual	Herb	0.2
Diplacus aurantiacus var. Aurantiacus - sticky monkeyflower	Native	Perennial	Shrub	18
Dudleya variegata - Variegated dudleya	Native	Perennial	Herb	0.2
Eriogonum fasciculatum - Eastern Mojave buckwheat	Native	Perennial	Shrub	1
Eriophyllum confertiflorum - golden yarrow	Native	Annual	Herb	0.2
Festuca myuros - rattail fescue	Nonnative	Annual	Grass	0.2
Gastridium phleoides - nit grass	Nonnative	Annual	Grass	0.2
Hedypnois cretica - Cretanweed	Nonnative	Annual	Herb	0.2
Isocoma menziesii - Menzies' goldenbush	Native	Perennial	Shrub	0.2
Logfia gallica - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
Lysimachia arvensis - Scarlet pimpernel	Nonnative	Annual	Herb	0.2
Pseudognaphalium californicum - ladies' tobacco	Native	Perennial	Herb	0.2
Ranunculus californicus	Native	Perennial	Herb	0.2
Rhus integrifolia - lemonade berry	Native	Perennial	Shrub	2
Salvia mellifera - black sage	Native	Perennial	Shrub	1
Sisyrinchium bellum - Western blue-eyed grass	Native	Perennial	Herb	3
Sonchus asper - spiny sowthistle	Nonnative	Annual	Herb	0.2
Sonchus oleraceus - common sowthistle	Nonnative	Annual	Herb	0.2
Stipa pulchra - purple needle grass	Native	Perennial	Grass	1

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_4NAVA016_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="4"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="4"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship; consider more aggressive weed management - create a site specific plan

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship; herbicide treatment to control nonnative brachypodium

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

None

NOTES:

***Dudleya variegata* (Variegated Dudleya)**

Navajo/Mission Gorge

MSP Occurrence ID: DUVA_4NAVA016 - 1



Panorama from Northwestern edge of population, facing Northeast, East, Southeast.
Panorama location is 6313074.339 1873618.051 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Dudleya variegata - Navajo/Mission Gorge



Area 2019: 80.55 sq. m.



Photopoint

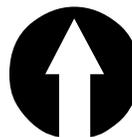


Dudleya variegata

Pop. Area 2003 - 2019
Max Area: 451.44 sq. m.
Min Area: 14.30 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_30TLA005_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_3OTLA005_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	0.2
<i>Bloomeria clevelandii</i> - San Diego goldenstar	Native	Perennial	Herb	0.2
<i>Bromus hordeaceus</i> - soft brome	Nonnative	Annual	Grass	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	0.2
<i>Castilleja exserta</i> - exserted Indian paintbrush	Native	Annual	Herb	2
<i>Chlorogalum parviflorum</i> - smallflower soap plant	Native	Perennial	Herb	0.2
<i>Cressa truxillensis</i> - spreading alkaliweed	Native	Perennial	Herb	0.2
<i>Cuscuta californica</i> - California dodder	Native	Annual	Herb	0.2
<i>Deinandra fasciculata</i> - clustered tarweed	Native	Annual	Herb	32
<i>Dichelostemma capitatum</i> - bluedicks	Native	Perennial	Herb	0.2
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	2
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	50
<i>Isocoma menziesii</i> - Menzies' goldenbush	Native	Perennial	Shrub	0.2
<i>Lepidium nitidum</i> - shining pepperweed	Native	Annual	Herb	1
<i>Microseris douglasii</i> ssp. <i>platycarpha</i> - Douglas' silverpuffs	Native	Annual	Herb	0.2
<i>Plantago erecta</i> - California plantain	Native	Annual	Herb	0.2
<i>Zeltnera venusta</i> - charming centaury	Native	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_30TLA005_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse

Disturbances (Rank each as 1-6):

Nonnative Forbs:

Feral Pig Activity:

Altered Hydrology:

Nonnative Grass:

Trampling:

Erosion:

Nonnative Woody Plants:

Vandalism:

Urban Runoff:

Competitive Native Plants:

Current Grazing:

Slope Movement:

Dumping/Trash:

Historic Grazing:

Soil Compaction:

Encampments:

Historic Agriculture:

Fuel Modification Zone/ Fire Break:

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserved stewardship

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

CAGN and san diego horned lizard

NOTES:

Horned lizard seen at navaretia site

***Dudleya variegata* (Variegated Dudleya)** **Otay Lakes**

MSP Occurrence ID: DUVA_3OTLA005 - 1

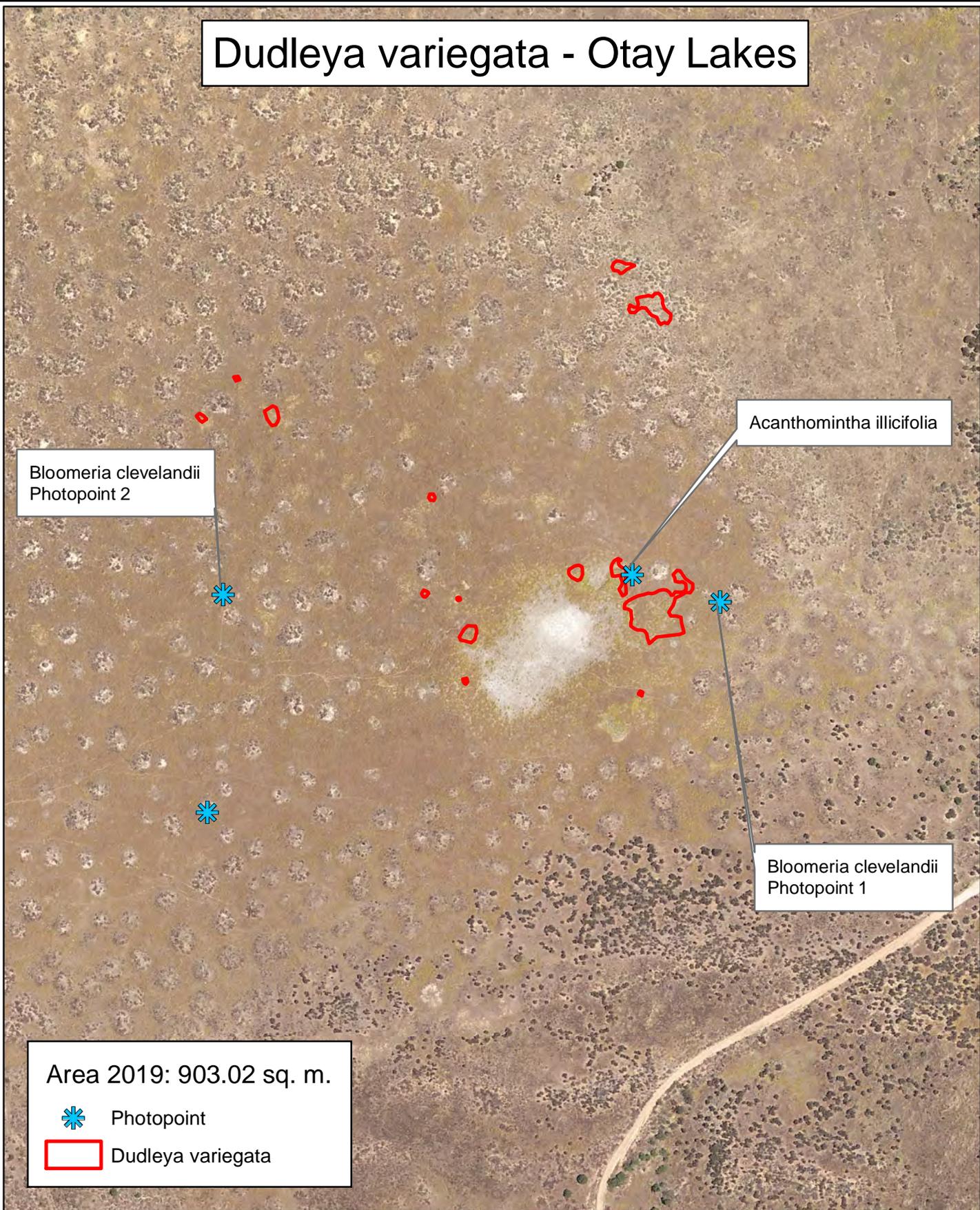


Panorama from Northeastern edge of the population, facing North, Northeast, East, Southeast.

Panorama location is 6356396.91 1807139.55 NAD83 State Plane California Zone 6 (feet)

Photos merged using ArcSoft Panorama Maker 4.

Dudleya variegata - Otay Lakes



Area 2019: 903.02 sq. m.

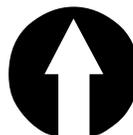
 Photopoint

 Dudleya variegata

Pop. Area 2003 - 2019
 Max Area: 196,313.40 sq. m.
 Min Area: 0 sq. m.



Source: San GIS & City of San Diego Parks & Rec
 Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_6SALU024_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:
 Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_6SALU024_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	12
<i>Artemisia californica</i> - coastal sagebrush	Native	Perennial	Shrub	6
<i>Brachypodium distachyon</i> - purple false brome	Nonnative	Annual	Grass	4
<i>Brassica nigra</i> - black mustard	Nonnative	Annual	Herb	3
<i>Bromus hordeaceus</i> - soft brome	Nonnative	Annual	Grass	2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	4
<i>Calystegia macrostegia</i> - island false bindweed	Native	Perennial	Herb	0.2
<i>Centaurea melitensis</i> - Maltese star-thistle	Nonnative	Annual	Herb	0.2
<i>Croton setigerus</i> - dove weed	Native	Annual	Herb	0.2
<i>Cryptantha</i> sp. - cryptantha	Native	Annual	Herb	0.2
<i>Daucus pusillus</i> - American wild carrot	Native	Annual	Herb	0.2
<i>Deinandra fasciculata</i> - clustered tarweed	Native	Annual	Herb	13
<i>Dichelostemma capitatum</i> - bluedicks	Native	Perennial	Herb	0.2
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	0.2
<i>Erodium botrys</i> - longbeak stork's bill	Nonnative	Annual	Herb	25
<i>Erodium cicutarium</i> - redstem stork's bill	Nonnative	Annual	Herb	0.2
<i>Erodium moschatum</i> - Musky stork's bill	Nonnative	Annual	Herb	0.2
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	4
<i>Hordeum marinum</i> - seaside barley	Nonnative	Annual	Grass	0.2
<i>Hypochaeris glabra</i> - smooth cat's ear	Nonnative	Annual	Herb	0.2
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
<i>Malacothamnus fasciculatus</i> - Mendocino bushmallow	Native	Perennial	Shrub	0.2
<i>Malosma laurina</i> - laurel sumac	Native	Perennial	Shrub	1
<i>Phacelia cicutaria</i> - caterpillar phacelia	Native	Annual	Herb	0.2
<i>Sonchus asper</i> - spiny sowthistle	Nonnative	Annual	Herb	0.2
<i>Stipa pulchra</i> - purple needle grass	Native	Perennial	Grass	0.2
<i>Zeltnera venusta</i> - charming centaury	Native	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

DUVA_6SALU024_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs:

Feral Pig Activity:

Altered Hydrology:

Nonnative Grass:

Trampling:

Erosion:

Nonnative Woody Plants:

Vandalism:

Urban Runoff:

Competitive Native Plants:

Current Grazing:

Slope Movement:

Dumping/Trash:

Historic Grazing:

Soil Compaction:

Encampments:

Historic Agriculture:

Fuel Modification Zone/ Fire Break:

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Prserve stewardship

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

None

NOTES:

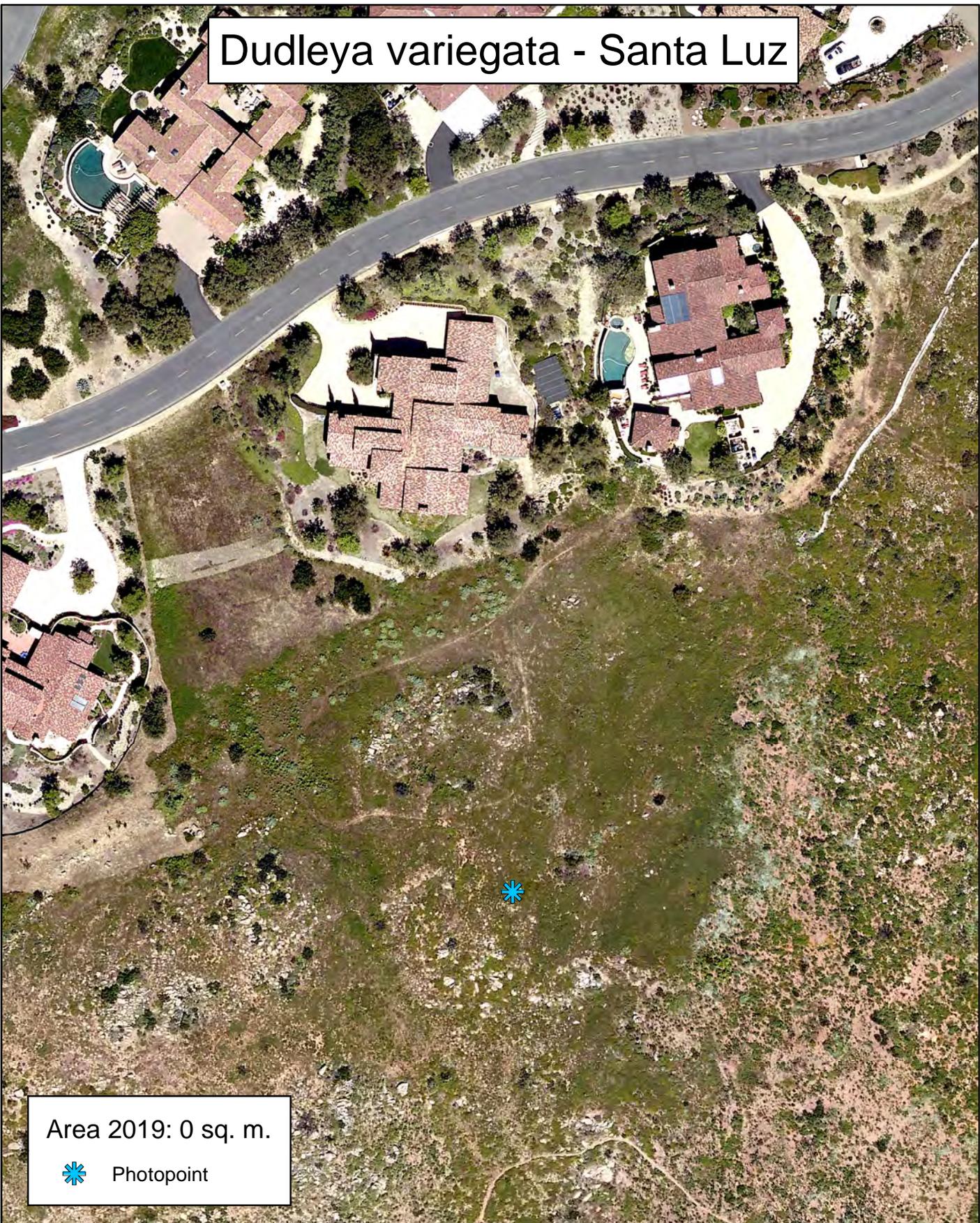
***Dudleya variegata* (Variegated Dudleya)**
Santa Luz East

MSP Occurrence ID: MSP Occurrence ID: DUVA_6SALU024_1



Panorama from Northeastern edge of population, facing Southeast, East, Northeast.
Panorama location is 6289735.96 1940293.56 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Dudleya variegata - Santa Luz

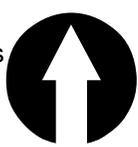


Area 2019: 0 sq. m.
* Photopoint

Pop. Area 2001 - 2019
Max Area: 617.05 sq. m.
Min Area: 0 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.
THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.
PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing sublicense agreement.
This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



Erysimum ammophilum
Coast wallflower



© City of San Diego, 2015

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ERAM4_6DEMA001_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ERAM4_6DEMA001_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	0.2
<i>Ambrosia psilostachya</i> - Cuman ragweed	Native	Perennial	Herb	20
<i>Artemisia californica</i> - coastal sagebrush	Native	Perennial	Shrub	17
<i>Baccharis pilularis</i> - coyotebrush	Native	Perennial	Shrub	4
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	1
<i>Camissoniopsis bistorta</i> - southern suncup	Native	Annual	Herb	0.2
<i>Croton californicus</i> - California croton	Native	Perennial	Herb	1
<i>Cryptantha</i> sp. - cryptantha	Native	Annual	Herb	0.2
<i>Erysimum amophilum</i> - Coast wallflower	Native	Perennial	Herb	3
<i>Eucrypta chrysanthemifolia</i> - spotted eucrypta	Native	Annual	Herb	0.2
<i>Malosma laurina</i> - laurel sumac	Native	Perennial	Shrub	18
<i>Marah macrocarpus</i> - Cucamonga manroot	Native	Perennial	Herb	17
<i>Mirabilis laevis</i> - desert wishbone bush	Native	Perennial	Herb	1
<i>Muhlenbergia microsperma</i> - littleseed muhly	Native	Annual	Grass	0.2
<i>Nicotiana glauca</i> - tree tobacco	Nonnative	Perennial	Shrub	6
<i>Nuttallanthus texanus</i> - Texas toadflax	Native	Annual	Herb	0.2
<i>Opuntia littoralis</i> - coastal pricklypear	Native	Perennial	Shrub	2
<i>Pseudognaphalium californicum</i> - ladies' tobacco	Native	Perennial	Herb	0.2
<i>Rhus integrifolia</i> - lemonade berry	Native	Perennial	Shrub	0.2
<i>Salvia apiana</i> - white sage	Native	Perennial	Shrub	3
<i>Scrophularia californica</i> - California figwort	Native	Perennial	Herb	8
<i>Stephanomeria diegensis</i> - San Diego milk aster	Native	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ERAM4_6DEMA001_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="3"/>
Nonnative Grass: <input type="text" value="3"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="4"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="3"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship; treat/remove nonnative tree tobacco from site.

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

CAGN

NOTES:

***Erysimum ammophilum* (Coast Wallflower)**

North City West Observation

MSP Occurrence ID: ERAM4_6DEMA001 - 1



Panorama from Northern edge of population, facing West, Southwest, South.
Panorama location is 6258825.981 19317194.938 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Erysimum ammophilum - Overlook Park

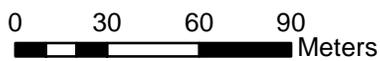


Area 2019: 1,532.09 sq. m.

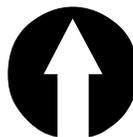
 Photopoint

 Erysimum ammophilum

Pop. Area 2015 - 2019
Max Area: 1,532.09 sq. m.
Min Area: 78.50 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of this information requires the prior written consent of the City of San Diego.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ERAM4_6GOCA003_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ERAM4_6GOCA003_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	6
<i>Acmispon micranthus</i> - San Diego bird's-foot trefoil	Native	Annual	Herb	0.2
<i>Ambrosia psilostachya</i> - Cuman ragweed	Native	Perennial	Herb	3
<i>Amsinckia intermedia</i> - common fiddleneck	Native	Annual	Herb	0.2
<i>Artemisia californica</i> - coastal sagebrush	Native	Perennial	Shrub	16
<i>Baccharis pilularis</i> - coyotebrush	Native	Perennial	Shrub	2
<i>Baccharis sarothroides</i> - desertbroom	Native	Perennial	Shrub	4
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	2
<i>Camissoniopsis bistorta</i> - southern suncup	Native	Annual	Herb	7
<i>Chaenactis glabriuscula</i> - yellow pincushion	Native	Annual	Herb	0.2
<i>Claytonia perfoliata</i> - Miner's lettuce	Native	Annual	Herb	2
<i>Corethrogyne filaginifolia</i> - California sandaster	Native	Perennial	Herb	1
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	2
<i>Croton californicus</i> - California croton	Native	Perennial	Herb	1
<i>Cryptantha</i> sp. - cryptantha	Native	Annual	Herb	2
<i>Cylindropuntia prolifera</i> - coastal cholla	Native	Perennial	Shrub	0.2
<i>Daucus pusillus</i> - American wild carrot	Native	Annual	Herb	4
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	7
<i>Eriogonum gracile</i> - slender buckwheat	Native	Annual	Herb	0.2
<i>Erodium cicutarium</i> - redstem stork's bill	Nonnative	Annual	Herb	0.2
<i>Erysimum amphilium</i> - Coast wallflower	Native	Perennial	Herb	1
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	5
<i>Galium angustifolium</i> - narrowleaf bedstraw	Native	Perennial	Herb	0.2
<i>Hazardia squarrosa</i> - sawtooth goldenbush	Native	Perennial	Shrub	1
<i>Hypochaeris glabra</i> - smooth cat's ear	Nonnative	Annual	Herb	3
<i>Logfia filaginoides</i> - California cottonrose	Native	Annual	Herb	2
<i>Lupinus bicolor</i> - annual lupine	Native	Annual	Herb	0.2
<i>Pseudognaphalium beneolens</i> - cudweed	Native	Perennial	Herb	0.2
<i>Pseudognaphalium californicum</i> - ladies' tobacco	Native	Perennial	Herb	0.2
<i>Salvia mellifera</i> - black sage	Native	Perennial	Shrub	2
<i>Selaginella cinerascens</i> - mesa spikemoss	Native	Perennial	Fern	5

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ERAM4_6GOCA003_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="3"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

CAGN heard south of point

NOTES:

***Erysimum ammophilum* (Coast Wallflower)**

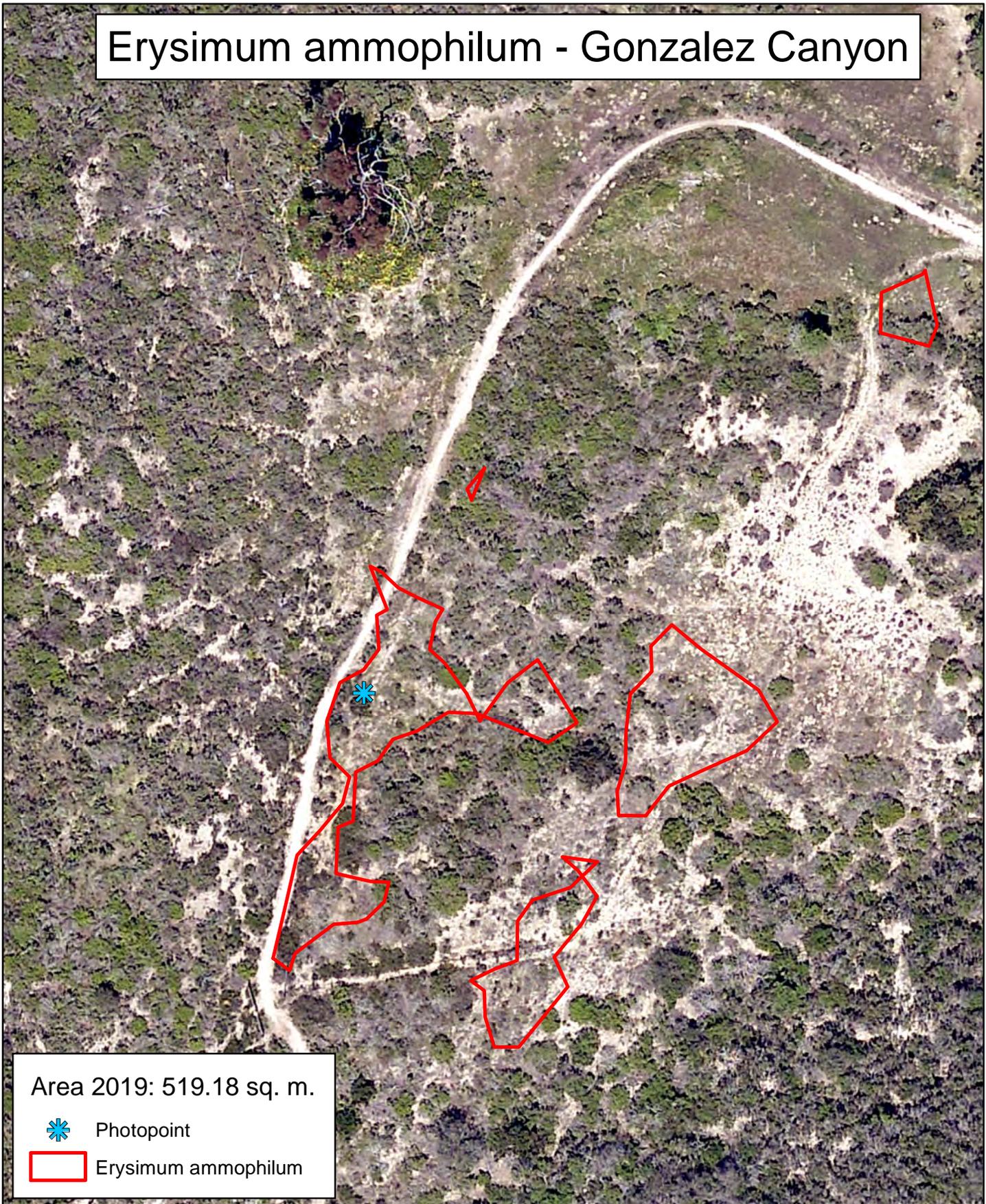
Gonzales Canyon

MSP Occurrence ID: ERAM4_6GOCA003 - 1



Panorama from Northern edge of population, facing Northeast, East, Southeast.
Panorama location is 6262965.904 1932798.061 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Erysimum ammophilum - Gonzalez Canyon



Area 2019: 519.18 sq. m.

-  Photopoint
-  Erysimum ammophilum

Pop. Area 2016 - 2019
Max Area: 925.60 sq. m.
Min Area: 26.20 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ERAM4_7CRCA002_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ERAM4_7CRCA002_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Artemisia californica - coastal sagebrush	Native	Perennial	Shrub	8
Bromus madritensis - compact brome	Nonnative	Annual	Grass	0.2
Cryptantha sp. - cryptantha	Native	Annual	Herb	0.2
Dichelostemma capitatum - bluedicks	Native	Perennial	Herb	0.2
Dodecatheon clelandii - padre's shootingstar	Native	Perennial	Herb	0.2
Dudleya lanceolata - lanceleaf liveforever	Native	Perennial	Herb	1
Ehrharta longiflora - longflowered veldtgrass	Nonnative	Annual	Grass	35
Encelia californica - California brittlebush	Native	Perennial	Shrub	2
Eriogonum fasciculatum - Eastern Mojave buckwheat	Native	Perennial	Shrub	2
Eriophyllum confertiflorum - golden yarrow	Native	Annual	Herb	0.2
Galium angustifolium - narrowleaf bedstraw	Native	Perennial	Herb	0.2
Hypochaeris glabra - smooth cat's ear	Nonnative	Annual	Herb	0.2
Malosma laurina - laurel sumac	Native	Perennial	Shrub	2
Marah macrocarpus - Cucamonga manroot	Native	Perennial	Herb	1
Mirabilis laevis - desert wishbone bush	Native	Perennial	Herb	5
Muhlenbergia microsperma - littleseed muhly	Native	Annual	Grass	0.2
Opuntia littoralis - coastal pricklypear	Native	Perennial	Shrub	0.2
Phacelia parryi - Parry's phacelia	Native	Annual	Herb	0.2
Pinus torreyana - torrey pine	Native	Perennial	Tree	8
Polypodium californicum - California polypody	Native	Perennial	Fern	4
Rhamnus crocea - spiny redberry	Native	Perennial	Shrub	1
Selaginella cinerascens - mesa spikemoss	Native	Perennial	Fern	7
Senecio californicus - California butterweed	Native	Perennial	Shrub	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ERAM4_7CRCA002_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="5"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue controlling velt grass.

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

None

NOTES:

Caulanthus heterophyllus: 0.2%, Linanthus dianthiflorus: 0.2%
A large sinkhole opened up in the canyon bottom in winter 2019 - it is not currently threatening ERAM populations.

***Erysimum ammophilum* (Coast Wallflower)**

Crest Canyon

MSP Occurrence ID: ERAM4_7CRCA002 - 1



Panorama from Northern edge of population, facing Southwest, West, Northwest.
Panorama location is 6253583.239 1932214.379 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Erysimum ammophilum - Crest Canyon



Area 2019: 759.77 sq. m.



Photopoint

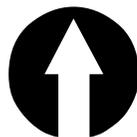


Erysimum ammophilum

Pop. Area 2015 - 2019
Max Area: 1,120.50 sq. m.
Min Area: 0 sq. m.

0 40 80
Meters

Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreement.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

Monardella stoneana
Jennifer's Monardella



© City of San Diego, 2005

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

MOST_3MAVA002_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

MOST_3MAVA002_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	0.2
<i>Ambrosia psilostachya</i> - Cuman ragweed	Native	Perennial	Herb	0.2
<i>Antirrhinum nuttallianum</i> - Nuttall's snapdragon	Native	Annual	Herb	0.2
<i>Artemisia californica</i> - coastal sagebrush	Native	Perennial	Shrub	1
<i>Avena barbata</i> - slender oat	Nonnative	Annual	Grass	0.2
<i>Baccharis sarothroides</i> - desertbroom	Native	Perennial	Shrub	7
<i>Bahiopsis laciniata</i> - torhleaf goldeneye	Native	Perennial	Shrub	5
<i>Brachypodium distachyon</i> - purple false brome	Nonnative	Annual	Grass	0.2
<i>Brassica tournefortii</i> - Asian mustard	Nonnative	Annual	Herb	0.2
<i>Brickellia californica</i> - California brickellbush	Native	Perennial	Shrub	2
<i>Bromus diandrus</i> - rippgut brome	Nonnative	Annual	Grass	3
<i>Bromus hordeaceus</i> - soft brome	Nonnative	Annual	Grass	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	2
<i>Calystegia macrostegia</i> - island false bindweed	Native	Perennial	Herb	1
<i>Cordylanthus rigidus</i> var. <i>setigerus</i> - stiffbranch bird's beak	Native	Annual	Herb	0.2
<i>Crassula connata</i> - sand pygmyweed	Native	Annual	Herb	0.2
<i>Croton setigerus</i> - dove weed	Native	Annual	Herb	0.2
<i>Cuscuta californica</i> - California dodder	Native	Annual	Herb	0.2
<i>Daucus pusillus</i> - American wild carrot	Native	Annual	Herb	0.2
<i>Dichelostemma capitatum</i> - bluedicks	Native	Perennial	Herb	0.2
<i>Dudleya pulverulenta</i> - chalk dudleya	Native	Perennial	Herb	0.2
<i>Ephedra californica</i> - California jointfir	Native	Perennial	Shrub	1
<i>Eriodictyon trichocalyx</i> - hairy yerba santa	Native	Perennial	Shrub	1
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	6
<i>Erodium cicutarium</i> - redstem stork's bill	Nonnative	Annual	Herb	0.2
<i>Funastrum cynanchoides</i> - climbing milkweed	Native	Perennial	Herb	0.2
<i>Galium angustifolium</i> - narrowleaf bedstraw	Native	Perennial	Herb	0.2
<i>Gutierrezia californica</i> - San Joaquin snakeweed	Native	Perennial	Shrub	0.2
<i>Hainardia cylindrica</i>	Nonnative	Annual	Grass	0.2
<i>Hedypnois cretica</i> - Cretanweed	Nonnative	Annual	Herb	0.2
<i>Hirschfeldia incana</i> - shortpod mustard	Nonnative	Perennial	Herb	1
<i>Hypochaeris glabra</i> - smooth cat's ear	Nonnative	Annual	Herb	0.2
<i>Juncus bufonius</i> - toad rush	Native	Annual	Herb	0.2
<i>Lamarckia aurea</i> - goldentop grass	Nonnative	Annual	Grass	0.2
<i>Lepidium nitidum</i> - shining pepperweed	Native	Annual	Herb	0.2
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
<i>Lythrum hyssopifolia</i> - Hyssop loosestrife	Nonnative	Annual	Herb	0.2
<i>Malosma laurina</i> - laurel sumac	Native	Perennial	Shrub	3
<i>Marah macrocarpus</i> - Cucamonga manroot	Native	Perennial	Herb	0.2
<i>Melica imperfecta</i> - California melic	Native	Annual	Herb	0.2
<i>Mimulus guttatus</i> - seep monkeyflower	Native	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

Monardella stoneana - Jennifer's monardella	Native	Perennial	Herb	1
Pentagramma glanduloviscida	Native	Perennial	Fern	0.2
Plantago erecta - California plantain	Native	Annual	Herb	0.2
Polypogon monspeliensis - annual rabbitsfoot grass	Nonnative	Annual	Grass	0.2
Pseudognaphalium bicolor - Twocolor cudweed	Native	Perennial	Herb	0.2
Pseudognaphalium stramineum - cottonbatting plant	Native	Perennial	Herb	0.2
Quercus sp. - oak	Native	Perennial	Tree	10
Romneya trichocalyx - hairy matilija poppy	Native	Perennial	Herb	0.2
Salvia apiana - white sage	Native	Perennial	Shrub	0.2
Selaginella bigelovii - Bigelow's spike moss	Native	Perennial	Fern	4
Silene gallica - common catchfly	Nonnative	Annual	Herb	0.2
Sisymbrium irio - London rocket	Nonnative	Annual	Herb	0.2
Sonchus asper - spiny sowthistle	Nonnative	Annual	Herb	0.2
Stephanomeria diegensis - San Diego milk aster	Native	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

MOST_3MAVA002_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="3"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="3"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserved stewardship

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

None

NOTES:

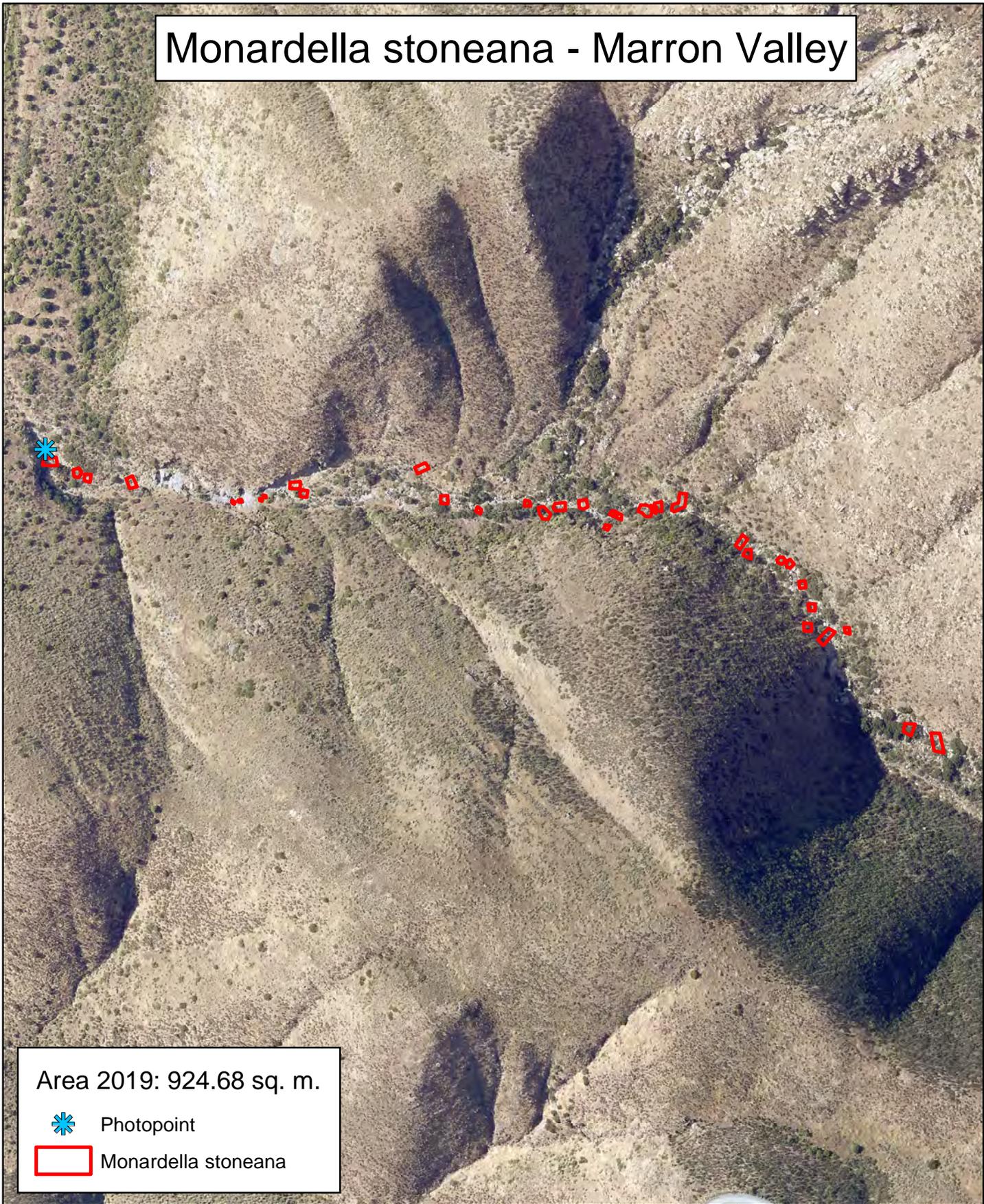
***Monardella stoneana* (Jennifer's Monardella)**
Marron Valley

MSP Occurrence ID: MOST_3MAVA002 - 1



Panorama from Northern edge of population, facing Southeast, South, Southwest
Panorama location is 6409398.728 1790116.116 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Monardella stoneana - Marron Valley



Area 2019: 924.68 sq. m.

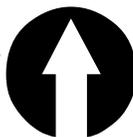
 Photopoint

 Monardella stoneana

Pop. Area 2003 - 2019
Max Area: 13,959.50 sq. m.
Min Area: 26.00 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing sublicense agreement.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

MOST_30TLA005_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:
 Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:
 Land Owner: Land Manager:
 Preserve Name: Occurrence Name:
 Surveyors: Other Surveyors:
 Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location
 Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:
 Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?
 Current Extent Mapping Method: Species Found in Max Extent
 If not found, known or suspected reason:
 Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):
 Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:
 Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:
 Is Sampling Area Representative of Current Mapped Extent?
 Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:
 Coordinates at Center of Plot: E: N:
 Camera Type: Coordinates of Photo Point: E: N:
 Photo Direction: Camera Height: Camera Angle: Photo Numbers:
 File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:
 Total % Cover:
 SANDAG 2012 Vegetation Alliance/Association:
 Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:
 Average Thatch Depth (cm): Thatch Depth Max (cm):
 Dead Standing Biomass? Dead Standing Biomass Species:
 Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):
 Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

MOST_30TLA005_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon americanus</i> - American bird's-foot trefoil	Native	Annual	Herb	1
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	0.2
<i>Artemisia californica</i> - coastal sagebrush	Native	Perennial	Shrub	2
<i>Avena fatua</i> - wild oat	Nonnative	Annual	Grass	0.2
<i>Bahiopsis laciniata</i> - torhleaf goldeneye	Native	Perennial	Shrub	1
<i>Brachypodium distachyon</i> - purple false brome	Nonnative	Annual	Grass	4
<i>Brassica nigra</i> - black mustard	Nonnative	Annual	Herb	0.2
<i>Brassica tournefortii</i> - Asian mustard	Nonnative	Annual	Herb	0.2
<i>Bromus diandrus</i> - rippgut brome	Nonnative	Annual	Grass	0.2
<i>Bromus hordeaceus</i> - soft brome	Nonnative	Annual	Grass	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	4
<i>Carduus pycnocephalus</i> - Italian plumeless thistle	Nonnative	Annual	Herb	0.2
<i>Centaurea melitensis</i> - Maltese star-thistle	Nonnative	Annual	Herb	0.2
<i>Croton setigerus</i> - dove weed	Native	Annual	Herb	0.2
<i>Daucus pusillus</i> - American wild carrot	Native	Annual	Herb	0.2
<i>Deinandra fasciculata</i> - clustered tarweed	Native	Annual	Herb	0.2
<i>Dichelostemma capitatum</i> - bluedicks	Native	Perennial	Herb	0.2
<i>Erigeron canadensis</i> - Canada horseweed	Native	Annual	Herb	0.2
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	2
<i>Festuca perennis</i> - Italian rye grass	Nonnative	Annual	Grass	9
<i>Foeniculum vulgare</i> - sweet fennel	Nonnative	Perennial	Herb	0.2
<i>Galium angustifolium</i> - narrowleaf bedstraw	Native	Perennial	Herb	0.2
<i>Geranium californicum</i> - California geranium	Native	Annual	Herb	0.2
<i>Heteromeles arbutifolia</i> - toyon	Native	Perennial	Shrub	0.2
<i>Hirschfeldia incana</i> - shortpod mustard	Nonnative	Perennial	Herb	1
<i>Iva hayesiana</i> - San Diego marsh elder	Native	Perennial	Shrub	16
<i>Juncus dubius</i> - finger rush	Native	Perennial	Herb	0.2
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
<i>Lonicera subspicata</i> - southern honeysuckle	Nonnative	Perennial	Shrub	1
<i>Lysimachia arvensis</i> - Scarlet pimpernel	Nonnative	Annual	Herb	0.2
<i>Lythrum hyssopifolia</i> - Hyssop loosestrife	Nonnative	Annual	Herb	0.2
<i>Malosma laurina</i> - laurel sumac	Native	Perennial	Shrub	3
<i>Mimulus guttatus</i> - seep monkeyflower	Native	Annual	Herb	0.2
<i>Phalaris minor</i> - littleseed canarygrass	Nonnative	Annual	Grass	0.2
<i>Polypogon monspeliensis</i> - annual rabbitsfoot grass	Nonnative	Annual	Grass	0.2
<i>Pseudognaphalium bicolor</i> - Twocolor cudweed	Native	Perennial	Herb	0.2
<i>Pseudognaphalium stramineum</i> - cottonbatting plant	Native	Perennial	Herb	0.2
<i>Silene gallica</i> - common catchfly	Nonnative	Annual	Herb	0.2
<i>Sonchus asper</i> - spiny sowthistle	Nonnative	Annual	Herb	0.2
<i>Stipa pulchra</i> - purple needle grass	Native	Perennial	Grass	1
<i>Tamarix</i> sp. - tamarisk	Nonnative	Perennial	Tree	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

MOST_30TLA005_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="1"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="4"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserved stewardship

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

None

NOTES:

***Monardella stoneana* (Jennifer's Monardella)**

Otay Lakes

MSP Occurrence ID: MOST_3OTLA005 - 1



Panorama from Northern edge of population, facing Northeast, East, Southeast.
Panorama location is 6357735.58 1805911.58 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Monardella stoneana - Otay Lakes



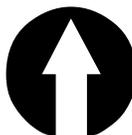
Area 2019: 0 sq. m.

 Photopoint

Pop. Area 2003 - 2019
Max Area: 7.98 sq. m.
Min Area: 0 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

Monardella viminea
Willowy Monardella



© City of San Diego, 2014

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

MOLIV_6FLCA007_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

MOLIV_6FLCA007_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
<i>Acmispon glaber</i> - deerweed	Native	Perennial	Shrub	1
<i>Ambrosia psilostachya</i> - Cuman ragweed	Native	Perennial	Herb	0.2
<i>Artemisia californica</i> - coastal sagebrush	Native	Perennial	Shrub	0.2
<i>Baccharis pilularis</i> - coyotebrush	Native	Perennial	Shrub	8
<i>Brachypodium distachyon</i> - purple false brome	Nonnative	Annual	Grass	0.2
<i>Brassica nigra</i> - black mustard	Nonnative	Annual	Herb	0.2
<i>Bromus madritensis</i> - compact brome	Nonnative	Annual	Grass	0.2
<i>Eriogonum fasciculatum</i> - Eastern Mojave buckwheat	Native	Perennial	Shrub	40
<i>Eriophyllum confertiflorum</i> - golden yarrow	Native	Annual	Herb	0.2
<i>Festuca myuros</i> - rattail fescue	Nonnative	Annual	Grass	0.2
<i>Foeniculum vulgare</i> - sweet fennel	Nonnative	Perennial	Herb	1
<i>Logfia gallica</i> - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
<i>Lysimachia arvensis</i> - Scarlet pimpernel	Nonnative	Annual	Herb	0.2
<i>Monardella viminea</i> - Willowy monardella	Native	Perennial	Herb	2
<i>Pseudognaphalium beneolens</i> - cudweed	Native	Perennial	Herb	0.2
<i>Pseudognaphalium bicolor</i> - Twocolor cudweed	Native	Perennial	Herb	0.2
<i>Pseudognaphalium californicum</i> - ladies' tobacco	Native	Perennial	Herb	0.2
<i>Salvia mellifera</i> - black sage	Native	Perennial	Shrub	0.2
<i>Solanum</i> sp. - nightshade	Unknown	Annual	Herb	0.2
<i>Sonchus asper</i> - spiny sowthistle	Nonnative	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

MOLIV_6FLCA007_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="3"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="3"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="3"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="3"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

None

NOTES:

Erigonum may be competitive

***Monardella viminea* (Willowy Monardella)**

Flanders Canyon

MSP Occurrence ID: MOLIV_6FLCA007 - 1



Panorama from Southern edge of population, facing West, Northwest, North.
Panorama location is 6278683.235 1908449.893 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Monardella viminea - Flanders Canyon



Area 2019: 347.65 sq. m.

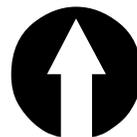
 Photopoint

 Monardella viminea

Pop. Area 2015 - 2019
Max Area: 399.70 sq. m.
Min Area: 314.10 sq. m.

0 10 20
 Meters

Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreement.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

MOLIV_6LOCA004_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

MOLIV_6LOCA004_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Ambrosia psilostachya - Cuman ragweed	Native	Perennial	Herb	0.2
Avena sp. - oat	Nonnative	Annual	Grass	0.2
Baccharis sarothroides - desertbroom	Native	Perennial	Shrub	4
Brachypodium distachyon - purple false brome	Nonnative	Annual	Grass	0.2
Brassica nigra - black mustard	Nonnative	Annual	Herb	1
Brickellia californica - California brickellbush	Native	Perennial	Shrub	2
Bromus diandrus - ripgut brome	Nonnative	Annual	Grass	35
Bromus hordeaceus - soft brome	Nonnative	Annual	Grass	1
Bromus madritensis - compact brome	Nonnative	Annual	Grass	2
Carduus pycnocephalus - Italian plumeless thistle	Nonnative	Annual	Herb	0.2
Carex sp. - sedge	Native	Perennial	Sedge	0.2
Centaurea melitensis - Maltese star-thistle	Nonnative	Annual	Herb	0.2
Cerastium glomeratum - sticky mouseear chickweed	Nonnative	Annual	Herb	0.2
Cercocarpus minutiflorus - smooth mountain-mahogany	Native	Perennial	Shrub	6
Daucus pusillus - American wild carrot	Native	Annual	Herb	0.2
Dichelostemma capitatum - blue-dicks	Native	Perennial	Herb	1
Eriogonum fasciculatum - Eastern Mojave buckwheat	Native	Perennial	Shrub	3
Erodium cicutarium - redstem stork's bill	Nonnative	Annual	Herb	0.2
Euphorbia peplus - petty spurge	Nonnative	Annual	Herb	0.2
Festuca myuros - rattail fescue	Nonnative	Annual	Grass	10
Festuca perennis - Italian rye grass	Nonnative	Annual	Grass	0.2
Foeniculum vulgare - sweet fennel	Nonnative	Perennial	Herb	1
Geranium californicum - California geranium	Native	Annual	Herb	0.2
Glebionis coronaria - crown daisy	Nonnative	Annual	Herb	1
Hypochaeris glabra - smooth cat's ear	Nonnative	Annual	Herb	0.2
Lactuca serriola - prickly lettuce	Nonnative	Annual	Herb	0.2
Lonicera subspicata - southern honeysuckle	Nonnative	Perennial	Shrub	0.2
Lysimachia arvensis - Scarlet pimpernel	Nonnative	Annual	Herb	0.2
Melilotus indica - annual yellow sweetclover	Nonnative	Annual	Herb	0.2
Opuntia littoralis - coastal pricklypear	Native	Perennial	Shrub	1
Phacelia cicutaria - caterpillar phacelia	Native	Annual	Herb	2
Phalaris minor - littleseed canarygrass	Nonnative	Annual	Grass	0.2
Prunus ilicifolia - hollyleaf cherry	Native	Perennial	Shrub	16
Pseudognaphalium stramineum - cottonbatting plant	Native	Perennial	Herb	0.2
Salvia apiana - white sage	Native	Perennial	Shrub	0.2
Silene gallica - common catchfly	Nonnative	Annual	Herb	0.2
Sonchus asper - spiny sowthistle	Nonnative	Annual	Herb	0.2
Toxicodendron diversilobum - poison oak	Native	Perennial	Shrub	1

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

MOLIV_6LOCA004_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="7"/>
Nonnative Grass: <input type="text" value="6"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="3"/>
Nonnative Woody Plants: <input type="text" value="3"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="7"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

VII. MANAGEMENT ACTIONS IN LAST YEAR

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

NOTES:

***Monardella viminea* (Willowy Monardella)**
Lopez Canyon – West Terrace Observation # 1
MSP Occurrence ID: MOLIV_6LOCA004 - 1



Panorama from Southern edge of population, facing South, Southwest, West.
Panorama location is 6275731.67 1913221.28 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Monardella viminea - Lopez Canyon West Terrace #1



Area 2019: 0 sq. m.

 Photopoint

Pop. Area 2004 - 2019
Max Area: 1,459.15 sq. m.
Min Area: 0 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreement.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

MOLIV_6LOCA004_2

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

MOLIV_6LOCA004_2

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Artemisia californica - coastal sagebrush	Native	Perennial	Shrub	0.2
Artemisia palmeri - San Diego sagewort	Native	Annual	Herb	0.2
Avena barbata - slender oat	Nonnative	Annual	Grass	0.2
Baccharis pilularis - coyotebrush	Native	Perennial	Shrub	11
Brassica nigra - black mustard	Nonnative	Annual	Herb	1
Brickellia californica - California brickellbush	Native	Perennial	Shrub	2
Bromus diandrus - ripgut brome	Nonnative	Annual	Grass	1
Bromus hordeaceus - soft brome	Nonnative	Annual	Grass	0.2
Bromus madritensis - compact brome	Nonnative	Annual	Grass	30
Camissoniopsis bistorta - southern suncup	Native	Annual	Herb	0.2
Centaurea melitensis - Maltese star-thistle	Nonnative	Annual	Herb	0.2
Cercocarpus minutiflorus - smooth mountain-mahogany	Native	Perennial	Shrub	1
Deinandra fasciculata - clustered tarweed	Native	Annual	Herb	0.2
Dichelostemma capitatum - bluedicks	Native	Perennial	Herb	0.2
Eriogonum fasciculatum - Eastern Mojave buckwheat	Native	Perennial	Shrub	11
Erodium botrys - longbeak stork's bill	Nonnative	Annual	Herb	0.2
Festuca myuros - rattail fescue	Nonnative	Annual	Grass	12
Hypochaeris glabra - smooth cat's ear	Nonnative	Annual	Herb	0.2
Lactuca serriola - prickly lettuce	Nonnative	Annual	Herb	0.2
Logfia gallica - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
Monardella viminea - Willow monardella	Native	Perennial	Herb	1
Opuntia littoralis - coastal pricklypear	Native	Perennial	Shrub	2
Phacelia cicutaria - caterpillar phacelia	Native	Annual	Herb	3
Scrophularia californica - California figwort	Native	Perennial	Herb	0.2
Sonchus asper - spiny sowthistle	Nonnative	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

MOLIV_6LOCA004_2

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text"/>	Feral Pig Activity: <input type="text"/>	Altered Hydrology: <input type="text"/>
Nonnative Grass: <input type="text"/>	Trampling: <input type="text"/>	Erosion: <input type="text"/>
Nonnative Woody Plants: <input type="text"/>	Vandalism: <input type="text"/>	Urban Runoff: <input type="text"/>
Competitive Native Plants: <input type="text"/>	Current Grazing: <input type="text"/>	Slope Movement: <input type="text"/>
Dumping/Trash: <input type="text"/>	Historic Grazing: <input type="text"/>	Soil Compaction: <input type="text"/>
Encampments: <input type="text"/>	Historic Agriculture: <input type="text"/>	Fuel Modification Zone/ Fire Break: <input type="text"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue Preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserved stewardship

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

None

NOTES:

***Monardella viminea* (Willowy Monardella)**
Lopez Canyon – East of Bridge Observation # 2
MSP Occurrence ID: MOLIV_6LOCA004 - 2



Panorama from Southeastern edge of population, facing Northeast, East, Southeast.
Panorama location is 6278255.527 1913718.712 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Monardella viminea - Lopez Canyon East of Bridge #2



Area 2019: 101.00 sq. m.

 Photopoint

 Monardella viminea

SANDAG & SanGIS

Pop. Area 2003 - 2019
Max Area: 435.80 sq. m.
Min Area: 1.00 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

MOLIV_6LOCA004_3

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location:

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent:

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

MOLIV_6LOCA004_3

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Ambrosia psilostachya - Cuman ragweed	Native	Perennial	Herb	0.2
Artemisia californica - coastal sagebrush	Native	Perennial	Shrub	0.2
Avena barbata - slender oat	Nonnative	Annual	Grass	0.2
Baccharis pilularis - coyotebrush	Native	Perennial	Shrub	11
Brachypodium distachyon - purple false brome	Nonnative	Annual	Grass	1
Brassica nigra - black mustard	Nonnative	Annual	Herb	1
Bromus diandrus - ripgut brome	Nonnative	Annual	Grass	0.2
Bromus madritensis - compact brome	Nonnative	Annual	Grass	0.2
Carduus pycnocephalus - Italian plumeless thistle	Nonnative	Annual	Herb	0.2
Carex sp. - sedge	Native	Perennial	Sedge	0.2
Centaurea melitensis - Maltese star-thistle	Nonnative	Annual	Herb	0.2
Cercocarpus minutiflorus - smooth mountain-mahogany	Native	Perennial	Shrub	30
Chamaesyce maculata - spotted spurge	Nonnative	Annual	Herb	0.2
Eriogonum fasciculatum - Eastern Mojave buckwheat	Native	Perennial	Shrub	2
Euphorbia peplus - petty spurge	Nonnative	Annual	Herb	0.2
Festuca perennis - Italian rye grass	Nonnative	Annual	Grass	0.2
Foeniculum vulgare - sweet fennel	Nonnative	Perennial	Herb	0.2
Glebionis coronaria - crown daisy	Nonnative	Annual	Herb	0.2
Hedypnois cretica - Cretanweed	Nonnative	Annual	Herb	0.2
Iva hayesiana - San Diego marsh elder	Native	Perennial	Shrub	1
Lactuca serriola - prickly lettuce	Nonnative	Annual	Herb	0.2
Lepidium didymum	Nonnative	Annual	Herb	0.2
Lobularia maritima	Nonnative	Perennial	Herb	0.2
Monardella viminea - Willowy monardella	Native	Perennial	Herb	0.2
Polycarpon tetraphyllum	Nonnative	Annual	Herb	0.2
Pseudognaphalium beneolens - cudweed	Native	Perennial	Herb	0.2
Rhus aromatica - basket bush	Native	Perennial	Shrub	0.2
Sonchus asper - spiny sowthistle	Nonnative	Annual	Herb	0.2
Toxicodendron diversilobum - poison oak	Native	Perennial	Shrub	5
Xanthium strumarium - rough cocklebur	Native	Perennial	Shrub	1

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

MOLIV_6LOCA004_3

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text"/>	Feral Pig Activity: <input type="text"/>	Altered Hydrology: <input type="text"/>
Nonnative Grass: <input type="text"/>	Trampling: <input type="text"/>	Erosion: <input type="text"/>
Nonnative Woody Plants: <input type="text"/>	Vandalism: <input type="text"/>	Urban Runoff: <input type="text"/>
Competitive Native Plants: <input type="text"/>	Current Grazing: <input type="text"/>	Slope Movement: <input type="text"/>
Dumping/Trash: <input type="text"/>	Historic Grazing: <input type="text"/>	Soil Compaction: <input type="text"/>
Encampments: <input type="text"/>	Historic Agriculture: <input type="text"/>	Fuel Modification Zone/ Fire Break: <input type="text"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue Preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserved stewardship

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

None

NOTES:

***Monardella viminea* (Willowy Monardella)**
Lopez Canyon – East of Bridge Observation # 3

MSP Occurrence ID: MOLIV_6LOCA004 - 3



Panorama from Southwestern edge of population, facing Southwest, West, Northwest.
Panorama location is 6279603.64 1914641.49 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Monardella viminea - Lopez Canyon East of Bridge #3



Area 2019: 0.04 sq. m

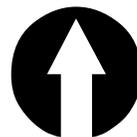
 Photopoint

 Monardella viminea

Pop. Area 2004 - 2019
Max Area: 290.00 sq. m.
Min Area: 0.04 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.



CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

MOLIV_4SYCA001_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

MOLIV_4SYCA001_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Acmispon micranthus - San Diego bird's-foot trefoil	Native	Annual	Herb	0.2
Artemisia californica - coastal sagebrush	Native	Perennial	Shrub	2
Avena barbata - slender oat	Nonnative	Annual	Grass	1
Brassica nigra - black mustard	Nonnative	Annual	Herb	2
Bromus diandrus - ripgut brome	Nonnative	Annual	Grass	1
Bromus hordeaceus - soft brome	Nonnative	Annual	Grass	0.2
Bromus madritensis - compact brome	Nonnative	Annual	Grass	2
Calystegia macrostegia - island false bindweed	Native	Perennial	Herb	0.2
Camissoniopsis bistorta - southern suncup	Native	Annual	Herb	0.2
Centaurea melitensis - Maltese star-thistle	Nonnative	Annual	Herb	3
Cercocarpus minutiflorus - smooth mountain-mahogany	Native	Perennial	Shrub	1
Crassula connata - sand pygmyweed	Native	Annual	Herb	0.2
Cryptantha sp. - cryptantha	Native	Annual	Herb	0.2
Daucus pusillus - American wild carrot	Native	Annual	Herb	0.2
Deinandra fasciculata - clustered tarweed	Native	Annual	Herb	0.2
Eriogonum fasciculatum - Eastern Mojave buckwheat	Native	Perennial	Shrub	12
Erodium botrys - longbeak stork's bill	Nonnative	Annual	Herb	0.2
Eschscholzia californica - California poppy	Native	Annual	Herb	0.2
Festuca myuros - rattail fescue	Nonnative	Annual	Grass	5
Festuca perennis - Italian rye grass	Nonnative	Annual	Grass	4
Galium angustifolium - narrowleaf bedstraw	Native	Perennial	Herb	1
Galium aparine - common bedstraw	Native	Annual	Herb	0.2
Hedypnois cretica - Cretanweed	Nonnative	Annual	Herb	0.2
Hirschfeldia incana - shortpod mustard	Nonnative	Perennial	Herb	1
Hypochaeris glabra - smooth cat's ear	Nonnative	Annual	Herb	1
Juncus bufonius - toad rush	Native	Annual	Herb	0.2
Lepidium nitidum - shining pepperweed	Native	Annual	Herb	0.2
Logfia gallica - narrowleaf cottonrose	Nonnative	Annual	Herb	1
Lonicera subspicata - southern honeysuckle	Nonnative	Perennial	Shrub	0.2
Lysimachia arvensis - Scarlet pimpernel	Nonnative	Annual	Herb	0.2
Malosma laurina - laurel sumac	Native	Perennial	Shrub	0.2
Phacelia cicutaria - caterpillar phacelia	Native	Annual	Herb	0.2
Pholistoma racemosum	Native	Annual	Herb	0.2
Prunus ilicifolia - hollyleaf cherry	Native	Perennial	Shrub	9
Pseudognaphalium stramineum - cottonbatting plant	Native	Perennial	Herb	0.2
Rhus aromatica - basket bush	Native	Perennial	Shrub	0.2
Salvia apiana - white sage	Native	Perennial	Shrub	1
Salvia columbariae	Native	Annual	Herb	0.2
Selaginella bigelovii - Bigelow's spike moss	Native	Perennial	Fern	0.2
Silene gallica - common catchfly	Nonnative	Annual	Herb	4
Sonchus oleraceus - common sowthistle	Nonnative	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

Stephanomeria diegensis - San Diego milk aster	Native	Annual	Herb	0.2
Stephanomeria exigua - small wirelettuce	Native	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

MOLIV_4SYCA001_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="4"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="3"/>
Nonnative Grass: <input type="text" value="4"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="4"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship. Consider plan to restore flow regime.

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserved stewardship

VIII. CNDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDB)

CAGN

NOTES:

***Monardella viminea* (Willowy Monardella)**

Sycamore Canyon

MSP Occurrence ID: MOLIV_4SYCA001 - 1



Panorama from Southern end of population, facing Southeast, South, Southwest.
Panorama location is 6334282.342 1916610.357 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Monardella viminea - Sycamore Canyon

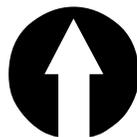


Area 2019: 244.56 sq. m.
* Photopoint
□ Monardella viminea

Pop. Area 2001 - 2019
Max Area: 15,970.40 sq. m.
Min Area: 15.60 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicensing of sublicense agreements.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

Rosa minutifolia
Baja Rose



© City of San Diego, 2015

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ROMI80_3DENC001_1

2019 | Page 1 of 3

Scientific Name: Common Name: MSP Occurr. ID:

Sample Point #: CNDDDB Elem. Occurr. #: Translocated? Management Unit:

Land Owner: Land Manager:

Preserve Name: Occurrence Name:

Surveyors: Other Surveyors:

Affiliation:

I. OCCURRENCE STATUS - Assess # plants in both species-specific sampling area (typically 10-m radius circle) and in current mapped extent.

Survey Date: Time Start: Time End: Mapped Extent Info Location

Number of Plants in Mapped Extent: Exact or Estimate? Uncertainty:

Area of Current Mapped Extent: Area Units: Area Exact (GPS) or Estim?

Current Extent Mapping Method: Species Found in Max Extent

If not found, known or suspected reason:

Number of Plants in Circle: Exact or Estimate? Uncertainty: Circle Area (sq_m):

Phenology in Circle Plot (1-6): % Vegetative: % Flowering: % Dead: % Fruiting:

Evidence in Circle Plot (1-6): % Herbivory: % Diseased: % Stunted:

Is Sampling Area Representative of Current Mapped Extent?

Collection Taken? Collector: Collection #: Museum/Herbarium:

II. SAMPLING AREA LOCATION AND SITE PHOTOMONITORING

GPS Accuracy: GPS Accuracy Units: Datum: Coordinate System:

Coordinates at Center of Plot: E: N:

Camera Type: Coordinates of Photo Point: E: N:

Photo Direction: Camera Height: Camera Angle: Photo Numbers:

File Location:

III. HABITAT ASSESSMENT IN SAMPLING AREA - Assess habitat covariates within species-specific sampling area (typically 10-m radius circle).

% Cover of Bare Ground: % Cover of Rock: % Cover of Litter: % Cover of Water: % Cover of Vegetation:

Total % Cover:

SANDAG 2012 Vegetation Alliance/Association:

Cover Classes (1-6): Cryptogamic Crust Cover: Thatch Cover:

Average Thatch Depth (cm): Thatch Depth Max (cm):

Dead Standing Biomass? Dead Standing Biomass Species:

Dead Standing Biomass Cover Class (1-6): Average Height of Dead Standing Biomass (cm):

Mammal Species Activity (categ. 1-4) Feral Pig Activity: Ground Squirrel Activity: Gopher Activity:

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ROMI80_3DENC001_1

2019 | Page 2 of 3

IV. ASSOCIATED SPECIES

Scientific name - common name	Native/Nonnative	Annual/Perennial	Plant Type	Cover
Ambrosia chenopodiifolia - San Diego bur ragweed	Native	Perennial	Shrub	1
Apiastrum angustifolium - mock parsley	Native	Annual	Herb	0.2
Artemisia californica - coastal sagebrush	Native	Perennial	Shrub	15
Baccharis sarothroides - desertbroom	Native	Perennial	Shrub	0.2
Bahiopsis laciniata - torhleaf goldeneye	Native	Perennial	Shrub	9
Brassica nigra - black mustard	Nonnative	Annual	Herb	0.2
Bromus hordeaceus - soft brome	Nonnative	Annual	Grass	0.2
Bromus madritensis - compact brome	Nonnative	Annual	Grass	1
Centaurea melitensis - Maltese star-thistle	Nonnative	Annual	Herb	0.2
Crassula connata - sand pygmyweed	Native	Annual	Herb	1
Cylindropuntia prolifera - coastal cholla	Native	Perennial	Shrub	0.2
Daucus pusillus - American wild carrot	Native	Annual	Herb	0.2
Deinandra conjugens - Otay tarplant	Native	Annual	Herb	0.2
Deinandra fasciculata - clustered tarweed	Native	Annual	Herb	3
Encelia californica - California brittlebush	Native	Perennial	Shrub	15
Erigeron canadensis - Canada horseweed	Native	Annual	Herb	0.2
Eriogonum fasciculatum - Eastern Mojave buckwheat	Native	Perennial	Shrub	0.2
Festuca myuros - rattail fescue	Nonnative	Annual	Grass	10
Heterotheca grandiflora - telegraphweed	Native	Annual	Herb	0.2
Logfia gallica - narrowleaf cottonrose	Nonnative	Annual	Herb	0.2
Lysimachia arvensis - Scarlet pimpernel	Nonnative	Annual	Herb	1
Matricaria discoidea - pineapple weed	Native	Annual	Herb	0.2
Medicago polymorpha - burclover	Nonnative	Annual	Herb	0.2
Mellilotus indica - annual yellow sweetclover	Nonnative	Annual	Herb	0.2
Oncosiphon piluliferum - stinknet	Nonnative	Annual	Herb	0.2
Peritoma arborea - bladderpod spiderflower	Native	Perennial	Shrub	0.2
Rhus integrifolia - lemonade berry	Native	Perennial	Shrub	8
Rosa minutifolia - small-leaved rose	Native	Perennial	Shrub	1
Schismus barbatus - common Mediterranean grass	Nonnative	Annual	Grass	0.2
Simmondsia chinensis - jojoba	Native	Perennial	Shrub	5
Sonchus asper - spiny sowthistle	Nonnative	Annual	Herb	0.2

CITY OF SAN DIEGO MSCP - RARE PLANT MONITORING DATA

ROMI80_3DENC001_1

2019 | Page 3 of 3

V. THREATS ASSESSMENT IN MAXIMUM EXTENT - Assess threats within the occurrence's maximum extent (cumulative extent over years of monitoring) plus 10-m surrounding buffer.

Surround_LandUse:

Disturbances (Rank each as 1-6):

Nonnative Forbs: <input type="text" value="3"/>	Feral Pig Activity: <input type="text" value="1"/>	Altered Hydrology: <input type="text" value="1"/>
Nonnative Grass: <input type="text" value="4"/>	Trampling: <input type="text" value="1"/>	Erosion: <input type="text" value="1"/>
Nonnative Woody Plants: <input type="text" value="1"/>	Vandalism: <input type="text" value="1"/>	Urban Runoff: <input type="text" value="1"/>
Competitive Native Plants: <input type="text" value="1"/>	Current Grazing: <input type="text" value="1"/>	Slope Movement: <input type="text" value="1"/>
Dumping/Trash: <input type="text" value="1"/>	Historic Grazing: <input type="text" value="no"/>	Soil Compaction: <input type="text" value="1"/>
Encampments: <input type="text" value="1"/>	Historic Agriculture: <input type="text" value="no"/>	Fuel Modification Zone/ Fire Break: <input type="text" value="1"/>

Road Construction/Maintenance: if present, describe:

Vegetation Clearing: if present, describe:

Brush Management: if present, describe:

ORV Activity: if present, describe:

Evidence of Recent Fire: Year Burned?

Trails: if trails are present, are they authorized?

Type of Trail Use:

Hiking: Biking: Equestrian: Dog: Service Vehicles: Other:

Illegal Trail Use:

Other Disturbance: if present, describe:

VI. MANAGEMENT RECOMMENDATIONS

Continue preserve stewardship

VII. MANAGEMENT ACTIONS IN LAST YEAR

Preserve stewardship

VIII. CNDDDB SPECIES DETECTED (list any plant or animal species to add to the CNDDDB)

None

NOTES:

***Rosa minutifolia* (Baja Rose)**
Dennery Ranch

MSP Occurrence ID: ROMI80_3DENC001 - 1



Panorama from Southern edge of population, facing South, Southeast, East.
Panorama location is 6321424.15 1791627.98 NAD83 State Plane California Zone 6 (feet)
Photos merged using ArcSoft Panorama Maker 4.

Rosa minutifolia - Dennery Ranch

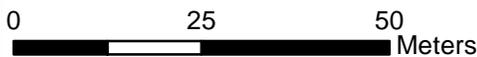


Area 2019: 1,087.27 sq. m.

 Photopoint

 Rosa minutifolia

Pop. Area 2000 - 2019
Max Area: 1,087.27 sq. m.
Min Area: 3.10 sq. m.



Source: San GIS & City of San Diego Parks & Rec
Map Created By: Jessie Lane 2019



Every reasonable effort has been made to assure the accuracy of this map. However, neither the SanGIS participants nor San Diego Data Processing Corporation assume any liability arising from its use.

THIS MAP IS PROVIDED WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

PROPRIETARY INFORMATION: The use of this information is pursuant to sublicense agreement only. Any resale or relicense of this information requires a separate sublicense agreement.

This map contains information which has been reproduced with permission granted by Thomas Bros. Maps.

Acknowledgments

The following staff assisted in the preparation of this report:

Mark Berninger, Senior Planner

Sara Allen, Biologist III

Jason Allen, Biologist II

Diana Brand Ramirez, Management Intern

Jessie Lane, Management Intern

Paula Birdwell, Management Intern

Ninfa Negrete, Biological Consultant (Rocks Biological)

This page is intentionally left blank.



APPENDIX A

**CITY OF SAN DIEGO RARE PLANT MONITORING:
2019 MONITORING DATES AND STAFF**

**City of San Diego MSCP Plant Monitoring:
Priorities, Sites and Survey Dates**

Species	Risk Group (SDSU '06)	Risk Group (Ogden '96)	Site	MSP Occurrence ID	Survey Date	Staff Initials	Methodology
<i>Acanthomintha ilicifolia</i> (San Diego Thorn-mint)	First	Second	Blk Mtn Park West	ACIL_6BLMO032	9-Apr	SA, DB, NN SM	GPS, Photo, Habitat Assessment
			Dennerly Canyon East	ACIL_3DREA005	12-Apr	SA, NN	GPS, Photo, Habitat Assessment
			Mission Trails Regional Park	ACIL_4MTRP021	10-Apr	MB, SA, NN	GPS, Photo, Habitat Assessment
			Otay Lakes	ACIL_3OTLA012	4-Apr	MB, SA, NN	GPS, Photo, Habitat Assessment
			Penasquitos Canyon Obs. 1, 2, 3	ACIL_6LPCA039 - 1 ACIL_6LPCA039 - 2 ACIL_6LPCA039 - 3	9-Apr	SA, SM, NN DB	GPS, Photo, Habitat Assessment
			Sabre Springs/Poway Obs. 1, 2, 3	ACIL_4SASP025 - 1 ACIL_4SASP025 - 2 ACIL_4SASP025 - 3	4-Apr	SA, MB, DB JL	GPS, Photo, Habitat Assessment
<i>Acmispion prostratus</i> (Nuttall's lotus)	First	First	Dune Triangle (Site 5)	ACPR_1DUTR005 - 1	28-May	SA, DB, JL SM	GPS, Photo, Habitat Assessment
			Hospitality Point (Site 2)	ACPR_1HOPO002 - 2	28-May	SA, DB, JL SM	GPS, Photo, Habitat Assessment
			Mariner's Point (Site 4)	ACPR_1MAPO004 - 4	N/A	N/A	N/A
			No Man's Land (Site 1)	ACPR_1NMLA001 - 1	5-May	SA, DB, JL SM	GPS, Photo, Habitat Assessment
			Rip Rap (Site 3)	ACPR_1RRSO003 - 3	30-May	SA, MB, JL	GPS, Photo, Habitat Assessment
			South Shores (Site 6)	ACPR_1SOSH006 - 6	28-May	SA, DB, JL, SM	GPS, Photo, Habitat Assessment
<i>Ambrosia pumila</i> (San Diego Ambrosia)	First	Second	Mission Trails Regional Park	AMPU_4KULA005	25-Apr	SA, MB, DB	GPS, Photo, Habitat Assessment
<i>Bloomeria clevelandii</i> (San Diego Goldenstar)	Second	Second	East Elliott	BLCL_4EAEL014 - 1 BLCL_4EAEL014 - 2 BLCL_4EAEL014 - 3	16-Apr	SA, MB, DB JL, NN	GPS, Photo, Habitat Assessment
			East Elliott	BLCL_4EAEL014 - 5	17-Apr	SA, NN	GPS, Photo, Habitat Assessment
			Lopez Ridge	BLCL_6LORI021	24-Apr	SA, NN, JA JF	GPS, Photo, Habitat Assessment
			Marron Valley Obs. 1, 2, 3, 4	BLCL_3MAVA005 - 1 BLCL_3MAVA005 - 2 BLCL_3MAVA005 - 3 BLCL_3MAVA005 - 4	18-Apr	SA, NN, JA JF, MB, JL	GPS, Photo, Habitat Assessment
			Mission Trails Regional Park	BLCL_4MTRP023	4-Apr	SA, MV, NN	GPS, Photo, Habitat Assessment
			Otay Lakes Obs. 1, 2	BLCL_3OTLA006 - 1 BLCL_3OTLA006 - 2	23-Apr	SA, DB, JL, MB	GPS, Photo, Habitat Assessment
<i>Brodiaea filifolia</i> (Thread-leaved Brodiaea)	Fourth	None	Black Mountain	BRFI_6BMRA002	3-May	MB, SA, JA	GPS, Photo, Habitat Assessment
<i>Brodiaea orcuttii</i> (Orcutt's Brodiaea)	Third	Second	Carroll Canyon	BROR_6CACA015	30-Apr	SA, DB, JL, NN	GPS, Photo, Habitat Assessment
			Lopez Ridge	BROR_6LORI018	15-May	SA, JL, NN	GPS, Photo, Habitat Assessment

**City of San Diego MSCP Plant Monitoring:
Priorities, Sites and Survey Dates**

Species	Risk Group (SDSU '06)	Risk Group (Ogden '96)	Site	MSP Occurrence ID	Survey Date	Staff Initials	Methodology
<i>Brodiaea orcuttii</i> (Orcutt's Brodiaea)	Third	Second	Nobel Drive	BROR_2NODR002	2-May	SA, SM	GPS, Photo, Habitat Assessment
			Oak Creek (MTRP)	BROR_4OACR012	5-May	SA,JL,NN	GPS, Photo, Habitat Assessment
<i>Chloropyron maritimum</i> ssp. <i>maritimum</i> (Salt-marsh Bird's Beak)	Second	First	Dog Beach	COMAM3_1DOBE007	30-May	MB,SA,JL, DB	GPS, Photo, Habitat Assessment
<i>Cylindropuntia californica</i> (Snake Cholla)	Second	Third	Spring Canyon	CYCA_3GOME003	8-May	SA,MB,NN	GPS, Photo, Habitat Assessment
			Balboa Golf Course	CYCA_2BPGC001	19-Jun	JL,DB,NN	GPS, Photo, Habitat Assessment
<i>Deinandra conjugens</i> (Otay Tarplant)	First	First	Dennery Ranch	DECO13_3DERA020	7-Sep	SA	GPS, Photo, Habitat Assessment
			Dennery Ranch East	DECO13_3DREA021	20-May	SA, DB, JL	GPS, Photo, Habitat Assessment
			Proctor Valley	DECO13_3PRVA013	24-May	SA,DB	GPS, Photo, Habitat Assessment
<i>Dicranostegia orcuttiana</i> (Orcutt's Bird's Beak)	First	First	Otay River Valley	COOR7_3ORVA001	5-May	SA, SM,DB JL	GPS, Photo, Habitat Assessment
			Dennery Ranch East	COOR7_3DREA007	23-May	SA, DB	GPS, Photo, Habitat Assessment
<i>Dudleya brevifolia</i> (Short Leaf Dudleya)	First	First	Carmel Mountain	DUBLB2_6CMPR001 - 1 DUBLB2_6CMPR001 - 2 DUBLB2_6CMPR001 - 3	7-May	SA,MB,JA,JL DB, SM	GPS, Photo, Habitat Assessment
			Crest Canyon North Obs. 1	DUBLB2_7CRCA003 - 1	7-May	SA,MB,JA,JL DB,SM	GPS, Photo, Habitat Assessment
			Crest Canyon South Obs. 2	DUBLB2_7CRCA003 - 2	7-May	SA,JA,JL,MB, DB,SM	GPS, Photo, Habitat Assessment
<i>Dudleya variegata</i> (Variegated Dudleya)	Second	First	Blk Mtn Park East	DUVA_6BMRA020	20-May	SA,DB,JL	GPS, Photo, Habitat Assessment
			East Elliott - Creek East Elliott - Hilltop	DUVA_4EAEL012 - 1 DUVA_4EAEL012 - 2	31-May	SA,NN	GPS, Photo, Habitat Assessment
			Goat Mesa/ Spring Canyon	DUVA_3GOME003	8-May	MB,SA,NN	GPS, Photo, Habitat Assessment
			Marron Valley	DUVA_3MAVA004	26-Apr	MB,DB	GPS, Photo, Habitat Assessment
			Mercy Road	DUVA_4MERO014	18-Apr	MB,DB	GPS, Photo, Habitat Assessment
			Mission Trails Regional Park Obs. 1, 2, 3	DUVA_4MTRP015 - 1 DUVA_4MTRP015 - 2 DUVA_4MTRP015 - 3	31-May	SA, NN	GPS, Photo, Habitat Assessment
			Navajo/Mission Gorge	DUVA_4NAVA016	14-May	SA,NN	GPS, Photo, Habitat Assessment
			Otay Lakes	DUVA_3OTLA005	23-Apr	SA,DB	GPS, Photo, Habitat Assessment
			Santa Luz	DUVA_6SALU024	20-May	SA,DB,JL	GPS, Photo, Habitat Assessment

City of San Diego MSCP Plant Monitoring: Priorities, Sites and Survey Dates

Species	Risk Group (SDSU '06)	Risk Group (Ogden '96)	Site	MSP Occurrence ID	Survey Date	Staff Initials	Methodology
<i>Erysimum amphilum</i> (Coast Wallflower)	Fourth	None	Crest Canyon	ERAM4_7CRCA002	7-Mar	SA,DB,JL NN	GPS, Photo, Habitat Assessment
			Gonzales Canyon	ERAM4_6GOCA003	7-Mar	SA,DB,JL,NN	GPS, Photo, Habitat Assessment
			North City West OS/Overlook Park	ERAM4_6DEMA001	12-Mar	SA,MB,DB, JL	GPS, Photo, Habitat Assessment
<i>Monardella stoneana</i> (Jennifer's Monardella)	Second	First	Marron Valley	MOST_3MAVA002	21-Jun	SA, MB, DB NN	GPS, Photo, Habitat Assessment
			Otay Lakes	MOST_3OTLA005	17-Jun	DB,JL,NN	GPS, Photo, Habitat Assessment
<i>Monardella viminea</i> (Willow Monardella)			Lopez Canyon Obs. 1, 2, 3	MOLIV_6LOCA004 - 1 MOLIV_6LOCA004 - 2 MOLIV_6LOCA004 - 3	04-Jun	SA,DB,JL,SM	GPS, Photo, Habitat Assessment
			Sycamore Canyon	MOLIV_4SYCA001	14-Jun	SA,DB,JL,NN	GPS, Photo, Habitat Assessment
			Flanders Canyon	MOLIV_6FLCA007	4-Jun	SA, SM,JL,DB	GPS, Photo, Habitat Assessment
<i>Rosa minutifolia</i> (Baja Rose)	First	Third	Dennery Ranch	ROMI80_3DENC001	23-May	SA, SM,JL,DB	GPS, Photo, Habitat Assessment

Survey Staff

DB = Diana Brand-Ramirez, Management Intern

JL = Jessie Lane, Management Intern

NN = Ninfa Negrete (Rocks Biological)

JF= Jane Fajardo (ESD)

MB = Mark Berninger, Senior Planner

SA = Sara Allen, Biologist III

JA = Jason Allen, Biologist II

SM= Sarah McCutcheon (SDMMP)