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ISLAND SPECIALISTS: SHARED FLORA OF THE ALTA AND BAJA CALIFORNIA PACIFIC ISLANDS

Sarah E. Ratay¹, Sula E. Vanderplank², and Benjamin T. Wilder³

ABSTRACT.—The floristic connection between the mediterranean region of Baja California and the Pacific islands of Alta and Baja California provides insight into the history and origin of the California Floristic Province. We present updated species lists for all California Floristic Province islands and demonstrate the disjunct distributions of 26 taxa between the Baja California and the California Channel Islands. These 26 plant taxa are found among the 16 Pacific islands without occurring on the intervening mainland of Alta California. Separate species lists for each island group (8 California Channel Islands and 8 Baja California Islands) were compiled. These lists were compared to the mainland California flora to identify species that occur on the California Islands and either the Baja California Pacific Islands or the mediterranean region of the Baja California Peninsula, but not the mainland of Alta California. This first compilation of the flora of the Baja California Islands and nomenclatural updates for the Channel Islands provide a platform for future research and conservation planning.

RESUMEN.—El grado de conexión florística entre la región mediterránea de Baja California y las Islas del Pacífico de Alta y Baja California proporciona un entendimiento de la historia y el origen de la Provincia Florística de California. Presentamos listados actualizados de especies de todas las islas de la Provincia Florística de California y mostramos la distribución aislada de veintiséis taxones entre la Baja California y las Islas del Canal de California. Identificamos aquellas especies de plantas que se pueden encontrar dentro de las dieciséis islas del Pacífico, pero no se encuentran en la península de Alta California. Con este objetivo, recopilamos listados separados de las especies que habitan en cada grupo de islas (las ocho Islas del Canal de California y las ocho islas de Baja California). Estos listados se compararon con la flora existente en la península de California con el fin de identificar aquellas especies que se encuentran en las islas de California, y tanto en las Islas del Pacífico de Baja California como en la región mediterránea de la Península de Baja California, pero *no* en la península de Alta California. La primera recopilación de flora de las Islas de Baja California y actualizaciones nomenclaturales en las Islas del Canal, proporcionan una plataforma para futuras investigaciones y planes de conservación.

The islands of the California Floristic Province (CFP) are an important component of one of the world's great biodiversity hotspots (Myers et al. 2000). The CFP has commonly been referred to as an environmental island due to its regionally unique mediterranean-type climate, isolation (via oceanic and orographic boundaries), and corresponding globally significant levels of endemism. The plant community has had ample time to evolve since the emergence of wet winters and dry summers at least 5–10 Mya (Axelrod 1973) and perhaps earlier (Ackerly 2009, Keeley et al. 2011). The remarkable diversity and endemism of the CFP has been attributed to relative climatic stability during glacial-interglacial transitions of the Pleistocene (Lancaster and Kay 2012, Sniderman et al. 2013). The antiquity and distinctiveness of the California flora are

well-recognized attributes that are accentuated on the islands of the Californias.

The degree of floristic similarity of 16 offshore islands, and their apparent role as refugia for species once present on the mainland, has been a persistent biogeographical puzzle. The CFP includes 16 islands from the adjacent coast of Alta and Baja California and extends south to the 28th parallel, including the CFP vegetation found on Cedros and Guadalupe Islands (Raven and Axelrod 1978, Moran 1996, Oberbauer 2002a). The CFP has an increasing gradient of aridity from north to south, but vegetation distributions are heavily influenced by fog presence; this fog provides additional moisture and reduces radiant loadings, significantly changing conditions for plants (Dawson 1998, Fischer et al. 2008, Vanderplank 2013). Physical data suggest that ocean currents have

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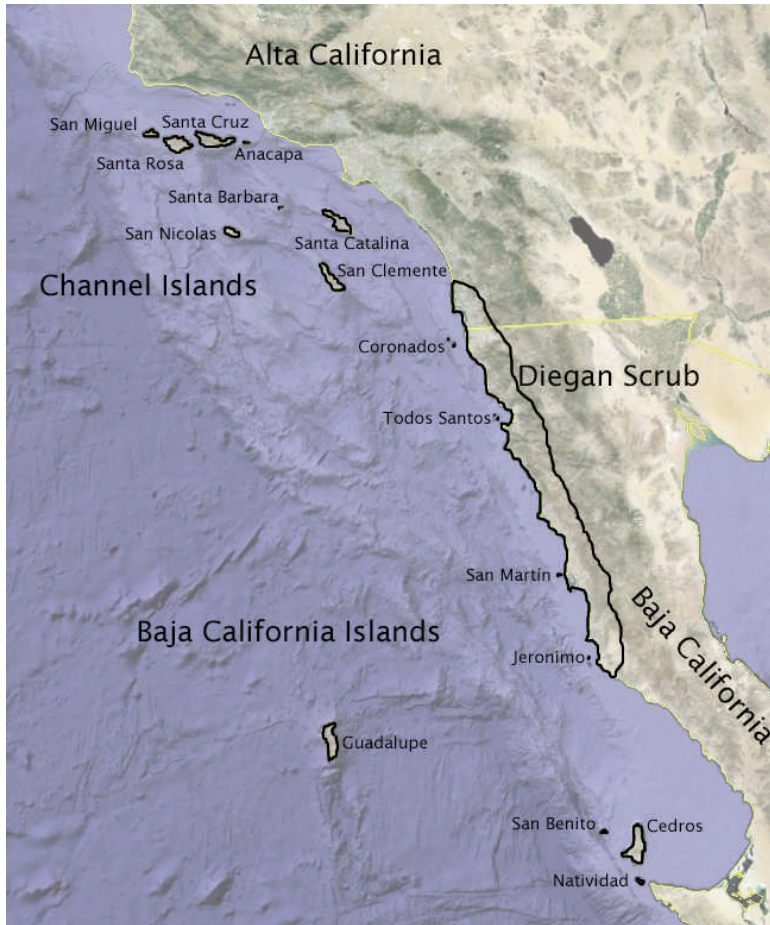


Fig. 1. California Channel and Baja California Pacific Islands with Diegan Scrub as defined by Axelrod (1978). Map by B.T. Wilder, adapted from Google Earth™ imagery.

been stable for millions of years (Jacobs et al. 2004), which indicates the presence of fog during the development of the CFP.

Within the large number of plant species on the CFP islands and the mainland of Alta and Baja California is the occurrence of disjunct Baja California taxa on the California Channel Islands. These species are seen today only on the CFP islands and a distinct portion of the California mainland termed the Diegan Scrub, the San Diego region southward into coastal northwestern Baja California (Fig. 1; Axelrod 1978). However, the number and identity of this group of disjunct species has remained unknown.

To identify the species that define this pattern, we present (1) the first compiled checklist of the 8 CFP Baja California Islands, (2)

nomenclatural updates to the flora of the 8 California Channel Islands, and (3) the plants that occur on the California Channel Islands and in the Diegan Scrub but *not* the rest of mainland California, hereafter referred to as “exemplar taxa.”

METHODS

Development of Checklists

We assembled all existing species checklists for the 2 island groups (Alta California and Baja California) into 2 lists, then compared those lists with the flora of the California Floristic Province for both mainland Alta and Baja California to generate the list of exemplar taxa. The nomenclatural updates presented here are based on our best understanding of the

island floras at the date of publication and follow the models of the sources indicated below for the 2 lists. Species now thought to be extirpated from the islands are denoted by an ampersand (&). Unvouchered taxa (including reports, photo vouchers, and personal communications) are indicated by a question mark (?). Nonnative species are indicated by an asterisk (*). When a subspecies was not recorded for all the islands and some ambiguity remains, the taxon is recorded at the species level only. Exotic species that were planted or are not naturalized (e.g., *Nerium oleander*) were deleted from checklists.

Baja California Islands Checklist

The most recent species lists for each of the 8 Baja California Islands (Appendix 1; Coronados, Todos Santos, San Martín, Jeronimo, Guadalupe, San Benito, Cedros, and Natividad) were compiled from the following data sources:

- Coronados—Oberbauer 2002b
- Todos Santos—Junak and Philbrick 1994a
- San Martín—Junak and Philbrick 1994b
- Guadalupe—Moran 1996, Rebman 2006, Rebman et al. 2007
- San Benito—Junak and Philbrick 2002b, Rebman 2007a
- Cedros—Oberbauer 1987, Rebman 2007b
- Natividad—Junak and Philbrick 2002a

The list of Jeronimo island flora, consisting of 8 taxa, was provided via personal communication from Steve Junak. We verified mainland Baja California flora distributions with the unpublished data of Jon Rebman and Bart O'Brien (personal communication 2013). Several taxa were added to the checklists based on recent collections, herbarium specimens recently encountered, and recent reports by Sula Vanderplank, Jon Rebman, and Steve Junak; these taxa are indicated by footnotes. The taxonomy for this checklist follows the Checklist of Baja California Plants in preparation by Jon Rebman.

California Channel Islands Checklist

The updated flora of the 8 California Channel Islands (Appendix 2; San Clemente, San Nicolas, Santa Catalina, Santa Barbara, Santa Rosa, Santa Cruz, Anacapa, and San Miguel) is based on the master checklist compiled by Gary Wallace (1985). We included published updates to individual island floras found in the

National Park Service checklist from Junak et al. (1997) for San Miguel, Santa Rosa, Santa Cruz, Anacapa, and Santa Barbara islands. For San Clemente Island we included updates from Ross et al. (1996) and for San Nicholas Island updates from Junak (2008). Additional taxa and island records are included based on recent collections on Santa Catalina Island by Sarah Ratay, observations and collections on San Clemente Island by Emily Howe (Soil Ecology and Restoration Group, SDSU), and herbarium specimens found in the Consortium of California Herbaria (CCH 2014), which are listed in footnotes. The nomenclatural revision of this checklist is consistent with taxonomy of the new Jepson Manual (Baldwin et al. 2012) through the use of the dynamic concordance tool provided on the Jepson e-flora website (Jepson Flora Project 2013). This checklist was developed to identify distribution patterns in the flora, and though the nomenclature has been updated, we have not confirmed identifications of questionable herbarium specimens, nor have we diligently pursued the lowest taxonomic rank beyond the published sources. We are also aware of additional updates to the flora of many of the Channel Islands in process by Steve Junak, including publication of the flora of Catalina Island; Junak's updates are not included here.

Exemplar Taxa

The identification of exemplar taxa was generated through a comparison of the 2 newly generated island checklists (Appendixes 1, 2) with the Jepson Manual (Baldwin et al. 2012) and the inventory of rare and endemic plants of CFP Baja California (O'Brien et al. 2014). A large number of species from CFP Baja California extend just slightly into southern California and are considered near-endemic to Baja California (O'Brien et al. 2014). As such, we include the near-endemic species of CFP Baja California as 'absent' in the mainland of Alta California (with the exception of *Crossosoma californicum*, which occurs on the Palos Verde Peninsula, and *Euphorbia misera*, which occurs in the South Coast region of California and beyond; Baldwin et al. 2012). These few species are consistent with the concept of Diegan Scrub as proposed by Axelrod (1978). Diegan Scrub is named for its occurrence in southern San Diego County and south into Baja California. It is a coastal scrub, rich in

TABLE 1. The 26 exemplar taxa as they occur on 8 Baja California Pacific Islands and the 8 Channel California Islands.^a CRPR column provides the California Rare Plant List ranking, and the BC column provides the State of Baja California

| Family | Exemplar taxa | Habit | NAT | CED | BEN | GUA | JER | MAR |
|--------------------------|--|-----------|----------|----------|----------|-----------|----------|----------|
| Apiaceae | <i>Lomatium insulare</i> | Herb | | | | GUA | | |
| Asteraceae | <i>Hazardia cana</i> | Shrub | | | | GUA | | |
| Asteraceae | <i>Senecio lyonii</i> | Shrub | | | BEN | | | MAR |
| Boraginaceae | <i>Phacelia floribunda</i> | Herb | | | | GUA | | |
| Cactaceae | <i>Bergerocactus emoryi</i> | Succulent | | | | | | MAR |
| Convolvulaceae | <i>Calystegia macrostegia</i> subsp. <i>macrostegia</i> | Vine | | | | GUA | | MAR |
| Crossosomataceae | <i>Crossosoma californicum</i> | Shrub | | | | GUA | | |
| Euphorbiaceae | <i>Euphorbia misera</i> | Shrub | NAT | CED | BEN | GUA | | MAR |
| Fabaceae | <i>Acmispon argophyllus</i> subsp. <i>argenteus</i> | Shrub | | | | GUA | | |
| Fabaceae | <i>Lupinus guadalupensis</i> | Herb | | | | GUA | | |
| Fabaceae | <i>Trifolium palmeri</i> | Herb | | | | GUA | | |
| Fagaceae | <i>Quercus tomentella</i> | Tree | | | | GUA | | |
| Grossulariaceae | <i>Ribes viburnifolium</i> | Shrub | | CED | | | | |
| Lamiaceae | <i>Salvia brandegeei</i> | Shrub | | | | | | |
| Papaveraceae | <i>Eschscholzia ramosa</i> | Herb | NAT | CED | BEN | GUA | | MAR |
| Phmyraceae | <i>Mimulus latifolius</i> | Herb | | | | GUA | | |
| Plantaginaceae | <i>Gambelia speciosa</i> | Shrub | | | | GUA | | |
| Poaceae | <i>Dissanthelium californicum</i> | Herb | | | | GUA | | |
| Polemoniaceae | <i>Gilia nevini</i> | Herb | | | | GUA | | |
| Polemoniaceae | <i>Leptosiphon pygmaeus</i> subsp. <i>pygmaeus</i> | Herb | | | | GUA | | |
| Rhamnaceae | <i>Ceanothus arboreus</i> | Shrub | | | | GUA | | |
| Rhamnaceae | <i>Rhamnus pirifolia</i> | Shrub | | | | GUA | | |
| Rosaceae | <i>Prunus ilicifolia</i> subsp. <i>lyonii</i> | Tree | | | | | | |
| Saxifragaceae | <i>Jepsonia malvifolia</i> | Herb | | | | GUA | | |
| Scrophulariaceae | <i>Scrophularia villosa</i> | Shrub | | | | GUA | | |
| Solanaceae | <i>Solanum wallacei</i> | Shrub | | | | GUA | | |
| NUMBER OF SPECIES | | | 2 | 3 | 3 | 21 | 0 | 5 |

^aNatividad [NAT], Cedros [CED], San Benito [BEN], Guadalupe [GUA], Jeronimo [JER], San Martín [MAR], Todos Santos [TOS], Coronados [COR], San Clemente

succulents, that includes many endemic and near-endemic species from CFP Baja; it also includes the coastal succulent scrub and coastal sage scrub ecoregions (González-Abraham et al. 2010).

RESULTS

The California Pacific Islands in total contain 1239 unique taxa. The California Islands separately contain 976 taxa and the Baja California Islands 535 taxa. Twenty-six of these taxa have a disjunct occurrence between the Baja California Pacific Islands and the California Channel Islands, absent from Alta California outside the Diegan Scrub (Table 1). These exemplar taxa represent 16 families and 26 unique genera. No one growth form predominates; of the 26 taxa, there are 12 shrubs, 10 herbaceous annuals, 2 trees, 1 vine, and 1 xerophytic succulent (Table 1). Fabaceae is the largest family with 3 species on the exemplar taxa list.

These 26 taxa fall into 6 biogeographic sub-patterns:

- (1) multiple California Channel Islands and Guadalupe Island, 13 taxa
- (2) Guadalupe Island–San Clemente Island only, 4 taxa (*Hazardia cana*, *Leptosiphon pygmaeus* ssp. *pygmaeus*, *Lupinus guadalupensis*, *Phacelia floribunda*)
- (3) Diegan Scrub and the Channel Islands only, 2 taxa (*Prunus ilicifolia* ssp. *lyonii* and *Salvia brandegeei*)
- (4) widespread, 1 taxon (*Eschscholzia ramosa*) occurs on 14 of 16 islands
- (5) certain Channel and Baja California Islands and Diegan Scrub, 4 taxa (*Bergerocactus emoryi*, *Crossosoma californicum*, *Euphorbia misera*, *Ribes viburnifolium*)
- (6) certain Channel and Baja California Islands, 2 taxa (*Calystegia macrostegia* ssp. *macrostegia* and *Senecio lyonii*)

DISCUSSION

The complex biogeography of the California Floristic Province can be explained in part

Islands are listed left to right by increasing latitude. The Mainland column indicates continental occurrences. The protected rankings.

| TOS | COR | Mainland | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG | # ISL | CRPR | BC |
|----------|----------|-----------|-----------|----------|-----------|----------|-----------|-----------|----------|----------|-------|-----------|-----------|
| | | No | CLE | NIC | | | | | | | 3 | 1B.2 | 1b |
| | | No | CLE | | | | | | | | 2 | 1B.2 | 1b |
| | | Baja only | CLE | | CAT | | | | | | 4 | | 2a |
| | | No | CLE | | | | | | | | 2 | 1B.2 | 1b |
| TOS | COR | Baja & CA | CLE | | CAT | | | | | | 5 | 2.2 | 4 |
| | | No | | | CAT | | ROS | CRU | ANA | MIG | 7 | | 2a |
| | | CA only | CLE | | CAT | | | | | | 3 | 1B.2 | 1b |
| TOS | COR | Baja & CA | CLE | | CAT | | | CRU | | | 10 | 2.2 | |
| | | No | CLE | NIC | CAT | | | | | | 4 | | 2a |
| | | No | CLE | | | | | | | | 2 | 1B.2 | 1b |
| | | No | CLE | NIC | CAT | BAR | | | ANA | | 5 | 4.2 | 2a |
| | | No | CLE | | CAT | | ROS | CRU | ANA | | 6 | 4.2 | 2a |
| | | Baja & CA | | | CAT | | | | | | 2 | 1B.2 | 4 |
| | | Baja only | | | | | ROS | | | | 1 | 1B.2 | 1b |
| TOS | COR | No | CLE | NIC | CAT | BAR | ROS | CRU | | | 13 | 4.3 | 2a |
| | | No | | | CAT | | | CRU | | | 3 | 1A | 1b |
| | | No | CLE | | CAT | BAR | | | | | 4 | 1B.2 | 1b |
| | | No | CLE | | CAT | | | | | | 3 | 1B.2 | 1a |
| | | No | CLE | NIC | CAT | BAR | ROS | CRU | ANA | | 8 | 4.3 | 2a |
| | | No | CLE | | | | | | | | 2 | 1B.2 | 1b |
| | | No | | | CAT | | ROS | CRU | | | 4 | | 2a |
| | | No | CLE | | CAT | | ROS | CRU | | MIG | 6 | 4.2 | 2a |
| | | Baja only | CLE | | CAT | | ROS | CRU | ANA | | 5 | | |
| | | No | CLE | NIC | CAT | | ROS | CRU | | | 6 | 4.2 | 2a |
| | | No | CLE | | CAT | | | | | | 3 | 1B.2 | 1b |
| | | No | | | CAT | | ROS | CRU | | | 4 | 1B.1 | 1b |
| 3 | 3 | | 20 | 6 | 20 | 4 | 10 | 11 | 5 | 2 | | 21 | 24 |

[CLE], San Nicolas [NIC], Santa Catalina [CAT], Santa Barbara [BAR], Santa Rosa [ROS], Santa Cruz [CRU], Anacapa [ANA], and San Miguel [MIG].

by analyzing unusual floristic patterns seen on the California Pacific Islands. The 26 taxa shared by the Baja California and Channel Islands indicate a clear connection between these isolated and disjunct regions. What precludes these taxa from occurring on the Alta California mainland, and what does this suggest for the past extent of the CFP? Did these taxa evolve locally and then migrate, or does this pattern instead reflect a distant legacy?

Three current hypotheses attempt to explain the presence of these disjunct populations on the California Pacific Islands: (1) these species have the ability to disperse long distances yet for some reason have failed to establish on the California mainland; (2) these species were historically more widespread, connected by former geologic linkages, and have been unable to persist on the Alta California mainland, remaining in refugia on the islands and in Baja California; or (3) the Channel Islands originally occurred farther south near San Diego (Atwater 1998) and as they

moved north, fog-moderated climates retained species native to that region.

A number of the exemplar taxa have distributions on the Channel Islands and farther south in Baja California, suggestive of the refugium hypothesis (i.e., these species were once more widespread). Epling and Lewis (1942) proposed that the diverse Diegan Scrub has many taxa derived from Miocene vegetation that came from the north Mexican plateau. Axelrod (1978) states that Diegan Scrub was more restricted in the Pleistocene and expanded in the Holocene as arid-adapted taxa moved northward into the southern Channel Islands. Many CFP species are found in disjunct occurrences, scattered across Arizona and Mexico, not unlike the presence of these 26 species on the islands (Valiente-Banuet et al. 1998, Bhaskar et al. 2007). Small-scale topographic niches and facilitation by other species often support these occurrences. Axelrod (1978) also points out that the most important conditions for Diegan Scrub vegetation

appear to be the absence of frost and the presence of a degree of summer moisture (in the form of fog). The cold California current and dense fog banks suggest that similarities in climate may help to explain the similarities in the floras (Fischer et al. 2008).

On the other hand, a number of the exemplar taxa are perhaps better explained as having evolved on the islands. This is especially true of many island *Lotus* species (Acmispon; McGlaughlin et al. 2011, McGlaughlin personal communication), *Eschscholzia ramosa* (Still and Potter 2013), and *Crossosoma californicum* (Wallace and Helenurm 2009), among others (Baldwin, 2007). For this pattern, we hypothesize local evolution and subsequent dispersal to similar niches on the CFP Baja Islands.

Guadalupe Island poses a particularly interesting study system. As the most isolated island, located roughly 270 km offshore, Guadalupe is a true oceanic island never connected to the Baja California Peninsula. Understanding the colonization of Guadalupe may contribute to understanding the dispersal patterns that we see today. Of 26 exemplar taxa, 21 of them occur on Guadalupe. Floristic similarities to the Channel Islands flora (at least 400 km north) may be due to the California current moving species from the California islands southward. Guadalupe Island has been above water for millions of years, and its current flora could represent the accumulation of species from the possible sources over this time.

In addition to a better understanding of the origin and evolution of the CFP, these species lists allow for improved conservation planning. Twenty-one of the 26 species are listed by the California Rare Plant Ranking (CNPS 2013) yet currently have no protection with the Mexican government. Twenty-five of the 26 species are listed in the rare plant ranking for Baja California (O'Brien et al. in press). These rankings are utilized in conservation planning in California and would be useful for land planning in Baja California. These combined islands species lists provide important information about the level of invasive species in the regions. Of the 535 taxa on the Baja California Islands, roughly 14% (74) are introduced species (excluding planted species, which were not included in our analyses). In comparison, of the 976 species on the California Channel Islands, roughly 28% (278) are introduced species. Presumably, the lower

proportion of invasive species on the Baja California Islands is due to less human use and fewer impacts to date.

The exemplar taxa identified by this process can now serve as the focal point of research to better understand the region's historical biogeography. Such research can incorporate phylogenetic relationships and their importance in community assembly (Webb et al. 2008). Functional trait analyses would help determine if these taxonomically diverse species share inherent traits that explain their disjunct distributions. Comparative phylogeographic studies of these shared taxa would test the specific hypothesis discussed above, among others, and offer a glimpse into the past. Additionally, the knowledge of patterns and modes of dispersal would provide valuable natural history information. Further genetic work to resolve the origin of these island specialist species would help to elucidate questions of timing, and definitively separate neo- and paleo-endemics in the exemplar list.

Conservation activity in Baja California has recently expanded, yet knowledge of plant distributions and ecology remains limited. We hope that these updated checklists of the California Pacific Islands will facilitate species status and distribution updates on both sides of the border, and foster well-informed conservation decisions that promote expanded science and management for the transborder ecoregion.

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LITERATURE CITED

- ACKERLY, D.D. 2009. Evolution, origin and age of lineages in the Californian and Mediterranean floras. *Journal of Biogeography* 36:1221–1233.
- ATWATER, T. 1998. Plate tectonic history of Southern California with emphasis on the Western Transverse Ranges and Santa Rosa Island. Pages 1–8 in P.W. Weigand, editor, *Contributions to the geology of the Northern Channel Islands, Southern California*. American Association of Petroleum Geologists, Pacific Section, MP 45.
- AXELROD, D.I. 1973. History of the mediterranean ecosystem in California. Pages 225–305 in F. di Castri and H.A. Mooney, editors, *Mediterranean type ecosystems*. Springer-Verlag, Berlin.
- _____. 1978. The origin of coastal sage vegetation, Alta and Baja California. *American Journal of Botany* 65:1117–1131.
- BALDWIN, B.G. 2007. Adaptive radiation of shrubby tarweeds (*Deinandra*) in the California Islands parallels diversification of the Hawaiian silversword alliance (Compositae–Madiinae). *American Journal of Botany* 94:237–248.
- BALDWIN, B.G., D.H. GOLDMAN, D.J. KEIL, R. PATTERSON, AND T.J. ROSATTI. 2012. *The Jepson manual: vascular plants of California*. 2nd edition. University of California Press, Berkeley, CA.
- BHASKAR, R., A. VALIENTE-BANUET, AND D.D. ACKERLY. 2007. Evolution of hydraulic traits in closely related species pairs from mediterranean and nonmediterranean environments of North America. *New Phytologist* 176:718–726.
- [CNPS] CALIFORNIA NATIVE PLANT SOCIETY. 2013. Inventory of rare and endangered plants. California Native Plant Society, Sacramento, CA; [accessed 8 April 2013]. Available from: <http://www.rareplants.cnps.org>
- [CCH] CONSORTIUM OF CALIFORNIA HERBARIA. 2014. Data provided by participants of CCH. [Accessed 24 April 2014]. Available from: <http://ucjeps.berkeley.edu/consortium/>
- DAWSON, T.E. 1998. Fog in the California Redwood Forest: ecosystem inputs and use by plants. *Oecologia* 117: 476–485.
- EPLING, C., AND H. LEWIS. 1942. The centers of distribution of the chaparral and coastal sage associations. *American Midland Naturalist* 27:445–462.
- FISCHER, D.T., C.J. STILL, AND A.P. WILLIAMS. 2008. Significance of summer fog and overcast for drought stress and ecological functioning of coastal California endemic plant species. *Journal of Biogeography* 36: 783–799.
- GONZÁLEZ-ABRAHAM, C.E., P.P. GARCILLÁN, E. EZCURRA, ET AL. 2010. Ecorregiones de la Península de Baja California: una síntesis. *Boletín de la Sociedad Botánica de México* 87:69–82.
- JACOBS, D.K., T.A. HANEY, AND K.D. LOUIE. 2004. Genes, diversity, and geologic process on the Pacific Coast. *Annual Review of Earth and Planetary Sciences* 32: 601–652.
- JEPSON FLORA PROJECT, EDITORS. 2013. Jepson eFlora [online]. Regents of the University of California, Berkeley, CA; [accessed 24 April 2014]. Available from: <http://ucjeps.berkeley.edu/IJM.html>
- JUNAK, S. 2008. A flora of San Nicolas Island, California. Santa Barbara Botanic Garden, Santa Barbara, CA.
- JUNAK, S., AND R. PHILBRICK. 1994a. The vascular plants of Todos Santos Island, Baja California, Mexico. Pages 407–428 in W. Halvorson and G. Maender, editors, *Proceedings of the Fourth California Islands Symposium: update on the state of resources*. Santa Barbara Museum of Natural History, Santa Barbara, CA.
- _____. 1994b. The flowering plants of San Martin Island, Baja California, Mexico. Pages 429–447 in W. Halvorsen and G. Maender, editors, *Proceedings of the Fourth California Islands Symposium: update on the state of resources*. Santa Barbara Museum of Natural History, Santa Barbara, CA.
- _____. 2002a. Flowering plants of Natividad Island, Baja California, México. Pages 224–234 in H.W. Chaney, K.L. Mitchel, and D.R. Browne, editors, *Proceedings of the Fifth California Islands Symposium: 29 March to 1 April 1999*. Santa Barbara Museum of Natural History, Santa Barbara, CA.
- _____. 2002b. Flowering plants of the San Benito Islands, Baja California, Mexico. Pages 235–246 in H.W. Chaney, K.L. Mitchel, and D.R. Browne, editors, *Proceedings of the Fifth California Islands Symposium: 29 March to 1 April 1999*. Santa Barbara Museum of Natural History, Santa Barbara, CA.
- JUNAK, S., R. PHILBRICK, S. CHANEY, AND R. CLARK. 1997. A checklist of vascular plants of Channel Islands National Park. 2nd edition. Southwest Parks and Monuments Association, Tucson, AZ.
- KEELEY, J.E., W.J. BOND, R.A. BRADSTOCK, J.G. PAUSAS, AND P.W. RUNDEL. 2011. *Fire in mediterranean ecosystems*. Cambridge University Press, Cambridge.
- LANCASTER, L.T., AND K.M. KAY. 2012. Origin and diversification of the California flora: re-examining classic hypotheses with molecular phylogenies. *Evolution* 67:1041–1054.
- MCGLAUGHLIN, M.E., L. RILEY, L.E. WALLACE, AND K. HELENURM. 2011. Isolation of microsatellite loci from endangered members of *Lotus* (Fabaceae) subgenus *Syrmatium*. *Conservation Genetics Resources* 3:117–121.
- MORAN, R.V. 1996. The flora of Guadalupe Island, Mexico. *Memoirs of the California Academy of Science* 19: 1–190.
- MYERS, N., R.A. MITTERMEIER, C.G. MITTERMEIER, G.A.B. DA-FONSECA, AND J. KENT. 2000. Biodiversity hotspots for conservation priorities. *Nature* 403:853–858.
- OSBERBAUER, T.A. 1987. Floristic analysis of vegetation communities on Isla de Cedros, Baja California, Mexico. Pages 115–131 in F.G. Hochberg, editor, *Third California Islands Symposium: recent advances in research on the California Islands*. Santa Barbara Museum of Natural History, Santa Barbara, CA.
- _____. 2002a. Analysis of vascular plant species diversity of the Pacific Coast islands of Alta and Baja California. Pages 201–211 in H.W. Chaney, K.L. Mitchel, and D.R. Browne, editors, *Proceedings of the Fifth California Islands Symposium: 29 March to 1 April 1999*. Santa Barbara Museum of Natural History, Santa Barbara, CA.
- _____. 2002b. Vegetation and flora of Islas Los Coronados, Baja California, México. Pages 212–223 in H.W.

- Chaney, K.L. Mitchel, and D.R. Browne, editors. Proceedings of the Fifth California Islands Symposium: 29 March to 1 April 1999. Santa Barbara Museum of Natural History, Santa Barbara, CA.
- O'BRIEN, B., J. DELGADILLO-RODRÍGUEZ, S.A. JUNAK, T.A. OBERBAUER, J.P. REBMAN, H. RIEMANN, AND S.E. VANDERPLANK. In press. The rare, endangered and endemic plants of the California Floristic Province portion of Baja California, Mexico. *Aliso*.
- RAVEN, P.H., AND D.I. AXELROD. 1978. Origin and relationships of the California flora. *University of California Publications in Botany* 72:1–134.
- REBMAN, J.P. 2006. The flora of Guadalupe Island, Mexico. [Accessed 26 April 2013]. Available from: <http://bajaflora.org/floras/GuadalupeEndemics1.htm>
- _____. 2007a. The flora of San Benitos Island, Mexico. [Accessed 26 April 2013]. Available from: <http://bajaflora.org/Floras/SanBenitosIsland.htm>
- _____. 2007b. The flora of Cedros Island, Mexico. [Accessed 26 April 2013]. Available from: <http://bajaflora.org/Floras/CedrosIsland.htm>
- REBMAN, J.P., T.A. OBERBAUER, AND J.L. LEÓN DE LA LUZ. 2007. La flora de Isla Guadalupe y sus islotes adyacentes, Baja California, México. [Accessed 26 April 2013]. Available from: <http://www2.ine.gob.mx/publicaciones/libros/477/cap5.html>
- ROSS, T.S., S. BOYD, AND S. JUNAK. 1996. Additions to the vascular flora of San Clemente Island, Los Angeles County, California, with notes on clarifications and deletions. *Aliso* 15(1):27–40.
- SNIDERMAN, J.M.K., G.J. JORDAN, AND R.M. COWLING. 2013. Fossil evidence for a hyperdiverse sclerophyll flora under a non-Mediterranean-type climate. *PNAS* 110:3423–3428.
- STILL, S.M., AND D. POTTER. 2013. California poppy conundrums: insights into relationships within tribe Eschscholtzieae (Papaveraceae). *Systematic Botany* 38:104–117.
- VALIENTE-BANUET, A., N. FLORES-HERNÁNDEZ, M. VERDÚ, AND P. DÁVILA. 1998. The chaparral vegetation of Mexico under nonmediterranean climate: the convergence and Madrean–Tethyan hypotheses reconsidered. *American Journal of Botany* 85:1398–1408.
- VANDERPLANK, S. 2013. Endemism in an ecotone: from chaparral to desert in Baja California, Mexico. *In*: C. Hobbom, editor, *Vascular plant endemism*. Springer-Verlag, Dresden.
- WALLACE, G.D. 1985. Vascular plants of the Channel Islands of southern California and Guadalupe Island, Baja California, México. *Contributions in Science* 365, Natural History Museum of Los Angeles County.
- WALLACE, L.E., AND K. HELENURM. 2009. Has herbivory negatively impacted genetic variability in the flora of the California Channel Islands? Insights from *Crossosoma californicum* (Crossosomataceae). *International Journal of Plant Sciences* 170:311–322.
- WEBB, C.O., D.D. ACKERLY, AND S.W. KEMBEL. 2008. Phylocom: software for the analysis of phylogenetic community structure and trait evolution. *Bioinformatics* 24:2098–2100.

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Appendix 1 on page 169.

Appendix 2 on page 188.

APPENDIX 1. Plant species checklist for the 8 Baja California islands (Cedros [CED], Coronados [COR], Jeronimo [JER], Guadalupe [GUA], Natividad [NAT], San Benito [BEN], San Martín [MAR], and Todos Santos [TOS]). An ampersand (&) indicates an extirpated species; a question mark (?) indicates an unvouchered taxon; and an asterisk (*) indicates a nonnative species.

| Family/species | ssp./var. and infraname | COR | TOS | MAR | JER | GUA | BEN | GED | NAT |
|---|---|-----|-----|-----|-----|-----|-----|------|-----|
| FERNS | | | | | | | | | |
| Dryopteridaceae | | | | | | | | | |
| <i>Polystichum minimum</i> (Kaulf.) C. Presl | | | | | | GUA | | | |
| Polypodiaceae | | | | | | | | | |
| <i>Polypodium californicum</i> Kaulf. | | COR | TOS | | | GUA | | | |
| <i>Polypodium scouleri</i> Hook. & Grev. | | | | | | GUA | | | |
| Pteridaceae | | | | | | | | | |
| <i>Adiantum capillus-veneris</i> L. | | | | | | | | GED | |
| <i>Cheilanthes brandegeei</i> D.C. Eaton | | | | | | | | GED | |
| Pteridiaceae | | | | | | | | | |
| <i>Cheilanthes neuberryi</i> Domin | | | | | | GUA | | | |
| <i>Notholaena californica</i> D.C. Eaton | ssp. <i>californica</i> | | | | | GUA | | GED | |
| <i>Notholaena californica</i> D.C. Eaton | ssp. <i>leucophylla</i> Windham | | | | | | | GED | |
| <i>Pellaea andromedifolia</i> (Kaulf.) Fee | | COR | | | | | | GED | |
| <i>Pellaea mucronata</i> D.C. Eaton | var. <i>mucronata</i> | | | | | GUA | | | |
| <i>Pentagramma triangularis</i> (Kaulf.) Yatskiévych et al. | ssp. <i>triangularis</i> | COR | | | | GUA | | GED | |
| <i>Pentagramma triangularis</i> (Kaulf.) Yatskiévych et al. | ssp. <i>maxonii</i> (Weath.) Yatsk., Windham & E. Wollenw. | | | | | GUA | | GED? | |
| <i>Pentagramma triangularis</i> (Kaulf.) Yatskiévych et al. | ssp. <i>viscosa</i> (D.C. Eaton) Yatsk., Windham, & E. Wollenw. | | | | | GUA | | | |
| <i>Pentagramma triangularis</i> (Kaulf.) Yatskiévych et al. | ssp. <i>senipallida</i> (J.T. Howell) Yatsk., Windham & E. Wollenw. | | | | | GUA | | | |
| GYMNOSPERMS | | | | | | | | | |
| Cupressaceae | | | | | | | | | |
| <i>Hesperocyparis guadalupensis</i> (S. Watson) Bartel ¹ | | | | | | GUA | | | |
| <i>Juniperus californica</i> Carrière | | | | | | GUA | | GED | |
| Ephedraceae | | | | | | | | | |
| <i>Ephedra aspera</i> S. Watson | | | | | | | | GED | |
| Pinaceae | | | | | | | | | |
| <i>Pinus radiata</i> D. Don | var. <i>binata</i> (Engelm.) Lemmon | | | | | GUA | | | |
| <i>Pinus radiata</i> D. Don | var. <i>cedrosensis</i> (J.T. Howell) Axelrod | | | | | | | GED | |
| MONOCOTS | | | | | | | | | |
| Arecaceae | | | | | | | | | |
| <i>Brahea edulis</i> H. Wendl. ex S. Watson | | | | | | GUA | | | |

¹Synonym: *Cupressus guadalupensis* S. Watson

APPENDIX I. Continued

| Family/species | ssp./var. and infraname | COR | TOS | MAR | JER | GUA | BEN | CED | NAT |
|---|-------------------------------|-----|-----|-----|-----|-----|-----|------|-----|
| Agavaceae | | | | | | | | | |
| <i>Agave bastianiana</i> Greene | | | | | | | | | |
| <i>Agave shawii</i> Englem. | | | | | | | | | |
| <i>Yucca valida</i> Brandegec | | | TOS | | | | BEN | CED | NAT |
| Cyperaceae | | | | | | | | CED | |
| <i>Carex spissa</i> L. H. Bailey | | | | | | | | CED? | |
| <i>Eleocharis geniculata</i> (L.) Roemer & Schultes | | | | | | | | CED | |
| <i>Schoenoplectus californicus</i> (C.A. Mey) Sofak | | | | | | | | CED? | |
| Juncaceae | | | | | | | | | |
| <i>Juncus acutus</i> L. ² | ssp. <i>leopoldii</i> | | | | | | | CED | |
| <i>Juncus bufonius</i> L. ³ | var. <i>bufonius</i> | | | | | GUA | | | |
| <i>Juncus bufonius</i> L. ⁴ | var. <i>congestus</i> Wahlenb | | | | | GUA | | | |
| Liliaceae | | | | | | | | | |
| <i>Calochortus splendens</i> Dougl. | | COR | | | | | | | |
| Orchidaceae | | | | | | | | | |
| <i>Piperita cooperi</i> (S. Watson) Rydb | | COR | TOS | | | | | | |
| Poaceae | | | | | | | | | |
| <i>Agrostis pallens</i> Trin. | | COR | | | | | | | |
| <i>Aristida adscensionis</i> L. | | COR | | | | | | | |
| <i>Arundo donax</i> L. [*] | | | | | | GUA | | CED | |
| <i>Avena barbata</i> Brot. [*] | | | | | | | | CED | |
| <i>Avena fatua</i> L. [*] | | COR | TOS | | | GUA | | CED | |
| <i>Bromus berteroaenus</i> Colla | | COR | TOS | MAR | | GUA | | CED | |
| <i>Bromus carinatus</i> Hook. & Arn. | | COR | TOS | MAR | | GUA | | CED | |
| <i>Bromus diandrus</i> Roth. [*] | | COR | TOS | MAR | | GUA | | CED | |
| <i>Bromus hordeaceus</i> L. [*] | | COR | TOS | MAR | | GUA | | CED | |
| <i>Bromus madritensis</i> L. [*] | | COR | TOS | MAR | | GUA | | CED | |
| <i>Bromus tectorum</i> L. [*] | | COR | TOS | MAR | | GUA | | CED | |
| <i>Cynodon dactylon</i> (L.) Pers. [*] | | COR | | | | | | CED? | |
| <i>Distichlis spicata</i> (L.) Greene | | COR | | MAR | | | | CED | |
| <i>Distichlis littoralis</i> (Engelm.) H.L. Bell & Columbus ⁵ | | | | MAR | | | | | |
| <i>Elymus condensatus</i> J. Presl ⁶ | | COR | TOS | | | | | | NAT |
| <i>Eragrostis pectinacea</i> (Michx.) Nees | | | | | | | | | |
| <i>Festuca bromioides</i> L. ^{7*} | var. <i>pectinacea</i> | | | | | GUA | | | |

²Report confirmed, herbarium specimen @ SD³New record; herbarium specimen @ RSA, SD⁴New record; herbarium specimen @ RSA, SD⁵Synonym: *Monanthochloe littoralis* Engelm.⁶Synonym: *Leymus condensatus* (J. Presl) A. Löve⁷Synonym: *Vulpia bromioides* (L.) Gray

APPENDIX I. Continued

| Family/species | ssp./var. and infraname | COR | TOS | MAR | JER | GUA | BEN | GED | NAT |
|--|---------------------------------------|-----|-------------------|-----|-----|-----|-----|------|-----|
| <i>Festuca microstachys</i> Nutt. ⁸ | | | | | | | | | |
| <i>Festuca myuros</i> L. ^{9*} | var. <i>pauciflora</i> Scribn. | | | MAR | | GUA | | GED | |
| <i>Festuca octoflora</i> Walt. ¹⁰ | var. <i>octoflora</i> | COR | TOS | MAR | | GUA | | GED | |
| <i>Hordeum murinum</i> L. [*] | ssp. <i>glaucum</i> (Steud.) Tzvelev. | COR | TOS | MAR | | GUA | | GED | |
| <i>Hordeum murinum</i> L. [*] | ssp. <i>leporinum</i> (Link) Arcang. | COR | TOS | MAR | | GUA | | GED | |
| <i>Lamarckia aurea</i> (L.) Moench [*] | | COR | TOS | MAR | | GUA | | GED | |
| <i>Melica frutescens</i> Scribn. | | | | | | | | | |
| <i>Melica imperfecta</i> Trin. | | COR | TOS | MAR | | GUA | | GED | |
| <i>Muhlenbergia microsperma</i> (DC.) Kunth | | COR | TOS | MAR | | GUA | | GED | |
| <i>Phalaris caroliniana</i> Walt. | | | | | | | | | |
| <i>Phalaris minor</i> Retz. [*] | | | TOS | | | GUA | | GED | NAT |
| <i>Pytochaetium pringlei</i> (Beal) Parodi | | | | | | | | | |
| <i>Poa annua</i> L. [*] | | | | | | GUA | | GED | |
| <i>Poa secunda</i> J.S. Presl | | | TOS ¹¹ | | | GUA | | GED | |
| <i>Poa thomasi</i> Refulio ¹² | ssp. <i>secunda</i> | | | | | GUA | | | |
| <i>Polygogon viridis</i> (Gouan) Breistr. ^{13*} | | | | | | | | GED | |
| <i>Polygogon monspeliensis</i> * (L.) Desf. | | | TOS | | | GUA | | GED | |
| <i>Schismus barbatus</i> (L.) Thell. [*] | | | | | | GUA | | GED | |
| <i>Sorghum bicolor</i> (L.) Moench [*] | | | | | | | | GED | |
| <i>Stipa speciosum</i> Trin. & Rupr. ¹⁴ | | | | | | | | GED | |
| <i>Stipa lepidota</i> A. Hitchc. ¹⁵ | | | TOS | | | GUA | | GED? | |
| <i>Stipa diegoensis</i> Swallen | | | | | | | | | |
| <i>Stipa pulchra</i> Hitchc. | | | | | | | | | |
| <i>Triticum aestivum</i> L. [*] | | COR | | MAR | | GUA | | GED? | |
| <i>Zea mays</i> L. [*] | | | | | | | | | NAT |
| Themidaceae | | | | | | | | | |
| <i>Dichelostemma capitatum</i> Alph. Wood | | | | | | | | | |
| <i>Triteleta guadalupensis</i> L.W. Lenz | | | | | | | | | |
| <i>Triteleopsis palmieri</i> (S. Watson) Hoover | | COR | TOS | MAR | | GUA | BEN | GED | |
| Typhaceae | | | | | | | | | |
| <i>Typha latifolia</i> L. | | | | | | | | GED? | |
| Zosteraceae | | | | | | | | | |
| <i>Phyllospadix scouleri</i> Hook. | | COR | | MAR | JER | | | GED | NAT |

⁸Synonym: *Vulpia microstachys* (Nutt.) Munro⁹Synonym: *Vulpia myuros* (L.) C.C. Good¹⁰Synonym: *Vulpia octoflora* (Walter) Rydb. var. *octoflora* and V. o. var. *hirtella* (Piper) Henrard¹¹New record; herbarium specimen @ SD (Thorne 53921)¹²Synonym: *Stenochloa californica* Nutt.¹³Synonym: *Agrostis semiverticillata* (Forssk.) C. Chr.¹⁴Synonym: *Achnatherum speciosum* (Trin. & Rupr.) Barkworth¹⁵Synonym: *Nassella lepidota* (Hitchc.) Barkworth

APPENDIX I. Continued

| Family/species | ssp./var. and infraname | COR | TOS | MAR | JER | GUA | BEN | CED | NAT |
|--|-------------------------|-----|-----|------|-----|-----|-----|------|-----|
| <i>Phyllospadix torreyi</i> S. Watson | | | TOS | MAR | JER | GUA | BEN | CED | NAT |
| <i>Zostera marina</i> L. | | | TOS | MAR | JER | GUA | BEN | CED | NAT |
| BASAL DICOTS | | | | | | | | | |
| Saururaceae | | | | | | | | | |
| <i>Anemopsis californica</i> (Nutt.) H. & A. | | | | | | | | CED? | |
| EUDICOTS | | | | | | | | | |
| Aizoaceae | | | | | | | | | |
| <i>Carpobrotus chilensis</i> (Molina) N.E. Br.* | | COR | TOS | MAR | JER | GUA | BEN | CED | NAT |
| <i>Mesembryanthemum crystallinum</i> L.* | | COR | TOS | MAR | JER | GUA | BEN | CED | NAT |
| <i>Mesembryanthemum nodiflorum</i> L.* | | COR | TOS | MAR | JER | GUA | BEN | CED? | NAT |
| Anacardiaceae | | | | | | | | | |
| <i>Malosma laurina</i> (Nutt. in T. & G.) Nutt. ex Abrams | | | TOS | | | GUA | | CED | |
| <i>Pachycormus discolor</i> (Benth.) Cov. | | | TOS | | | GUA | | CED | NAT |
| <i>Rhus integrifolia</i> (Nutt.) Brewer & S. Watson | | | TOS | | | GUA | | CED | |
| <i>Rhus integrifolia</i> × <i>lentii</i> | | | | | | | | CED | |
| <i>Rhus lentii</i> Kell. | | | | | | | | CED | |
| Apiaceae | | | | | | | | | |
| <i>Cortandrum sativum</i> L.* | | | | | | | | CED? | |
| <i>Foeniculum vulgare</i> Mill.* | | | | | | | | CED | |
| <i>Apiastrum angustifolium</i> Nutt. in Torrey & A. Gray | | COR | TOS | | | | | CED | |
| <i>Bowlesia incana</i> Ruiz & Pav. | | | TOS | | | GUA | | CED? | |
| <i>Daucus pusillus</i> Michaux | | COR | TOS | | | GUA | | CED | |
| <i>Lomatium insulare</i> (Eastw.) Munz. | | | | | | GUA | | CED | |
| <i>Yabea microcarpa</i> (Hook. & Arn.) Koso-Pol. ¹⁶ | | | | | | GUA | | CED | |
| Apocynaceae | | | | | | | | | |
| <i>Asclepias subulata</i> Decne. in A. DC. | | | | | | GUA | | CED | |
| <i>Nerium oleander</i> L.* | | | | | | | | | |
| Araliaceae | | | | | | | | | |
| <i>Hydrocotyle umbellata</i> ¹⁷ | | | | | | | | CED | |
| Asteraceae | | | | | | | | | |
| <i>Agoseris heterophylla</i> (Nutt.) Greene | | | | | | GUA | | | |
| <i>Anaauria rotundifolia</i> Benth. | | | | | | | | | |
| <i>Amblyopappus pusillus</i> Hook. & Arn. | | COR | TOS | MAR | MAR | GUA | BEN | CED | NAT |
| <i>Ambrosia camphorata</i> (Greene) Payne | | | | MAR? | | GUA | | CED | |
| <i>Ambrosia chamissonis</i> (Less.) Greene | | | | MAR | | | | CED? | |
| <i>Ambrosia chenopodiifolia</i> (Benth.) Payne | | | TOS | | | | | CED | NAT |
| <i>Ambrosia magdalenae</i> (Brandege) Payne | | | | | | | | CED | |

¹⁶New record; herbarium specimen @ RSA, SD¹⁷New record; herbarium specimen @ SD (166694, Amadeo Bea 1568, 22 Feb 1988)

APPENDIX I. Continued

| Family/species | ssp./var. and infraname | COR | TOS | MAR | JER | GUA | BEN | GED | NAT |
|--|--------------------------|-------------------|-----|-----|-----|-----|-----|------|-----|
| <i>Artemisia californica</i> Less. | | | | | | | | | |
| <i>Baccharis sarothroides</i> A. Gray | | COR | TOS | | | GUA | | GED | |
| <i>Baeropsis guadalupensis</i> J.T. Howell | | COR | | | | | | GED | |
| <i>Bahopsis laciniata</i> A. Gray ¹⁸ | | | TOS | | | GUA | | | |
| <i>Bebbia juncea</i> (Benth.) Greene | var. <i>juncea</i> | | | | | | | GED | NAT |
| <i>Brickellia microphylla</i> (Nutt.) A. Gray | | | | | | | | GED? | |
| <i>Centaurea melitensis</i> L.* | | | TOS | | | GUA | | GED | |
| <i>Chaenactis glabriuscula</i> DC. ¹⁹ | | COR | | | | | | | |
| <i>Chaenactis lacera</i> Greene ²⁰ | var. <i>glabriuscula</i> | | | | | | | | NAT |
| <i>Coreocarpus involutus</i> Greene | | | | | | | | | NAT |
| <i>Deinandra fasciculata</i> (DC.) Greene | | | TOS | | | | | GED | |
| <i>Deinandra frutescens</i> (A. Gray) B.G. Baldwin | | | | | | GUA | | | |
| <i>Deinandra greeneana</i> (Rose) B.G. Baldwin | | | | | | GUA | | | |
| <i>Deinandra palmeri</i> (Rose) B.G. Baldwin | | | | | | GUA | | | |
| <i>Deinandra palmeri</i> × <i>D. greeneana</i> | | | | | | GUA | | | |
| <i>Deinandra peninsularis</i> (Moran) | | | TOS | | | | | | |
| B.G. Baldwin ²¹ | | | | | | | | | |
| <i>Deinandra strecksii</i> (A. Gray) B.G. Baldwin | | | | | | | BEN | | |
| <i>Encelia asperifolia</i> (S.F. Blake) Clark & Kyhos | | | | | | | BEN | | |
| <i>Encelia californica</i> Nutt. | | COR ²² | TOS | MAR | | | | GED | |
| <i>Encelia palmeri</i> Vasey & Rose | | | | | | | | | NAT |
| <i>Encelia stenophylla</i> Greene | | | | | | | | GED | |
| <i>Ericameria brachylepis</i> (A. Gray) Hall | | | | | | | | GED | |
| <i>Erigeron sumatrensis</i> Retz. ^{23*} | | | | | | GUA | | | |
| <i>Eriophyllum confertiflorum</i> (DC.) A. Gray | | | | | | | | GED | |
| <i>Eriophyllum lanatum</i> (Pursh) J. Forbes | | COR | | | | | | | |
| <i>Glebionis coronarium</i> (L.) Cass. ex Spach ^{24*} | | | TOS | | | GUA | | | |
| <i>Greenella ramulosa</i> Greene | | | | | | | | GED? | |
| <i>Gutierrezia sarothrae</i> (Pursh) Britt. & Rusby | | | | | | | | GED | |
| <i>Hazardia berberidis</i> (A. Gray) Greene | | COR | TOS | | | | | | |
| <i>Hazardia cana</i> (A. Gray) Greene | | | | | | GUA | | | |
| <i>Hazardia orcuttii</i> (A. Gray) Greene ²⁵ | | COR | | | | | | | |
| <i>Hypochoeris glabra</i> L.* | | | TOS | | | GUA | | GED? | |

¹⁸Synonym: *Viguiera laciniata* A. Gray¹⁹New record; herbarium specimen @ SD²⁰New record; herbarium specimen @ SD²¹Synonym: *Hemizonia greeneana* Rose ssp. *peninsularis* (Moran) B.L. Turner²²New record; herbarium specimens @ SD²³Synonym: *Conyza floribunda* Kunth²⁴Synonym: *Chrysanthemum coronarium* L.²⁵New record; herbarium specimen @ SD (5248, Ralph Summer, s.n. 1920; specimen recently identified)

APPENDIX I. Continued

| Family/species | ssp./var. and infraname | COR | TOS | MAR | JER | GUA | BEN | GED | NAT |
|--|-------------------------|-----|-----|-----|-----|-------------------|-----|------|-----|
| <i>Isooma menziesii</i> (Hook. & Arn.) G.L. Nesom | ssp. <i>menziesii</i> | | TOS | | | | | GED | |
| <i>Iva hayesiana</i> A. Gray | | | | | | | | GED | |
| <i>Lasthenia coronaria</i> (Nutt.) Ornduff | | COR | TOS | | | GUA | | | |
| <i>Lasthenia gracilis</i> (DC.) Greene | | COR | TOS | | | GUA | | GED? | |
| <i>Lajtia platyglossa</i> (Fisch. & Mey.) A. Gray | | | | | | GUA | | | |
| <i>Leptosyme gigantea</i> Kellogg ²⁶ | | | | | | GUA | | | |
| <i>Leptosyme maritima</i> (Nutt.) A. Gray ²⁷ | | COR | TOS | MAR | | | | GED? | |
| <i>Logfia arizonica</i> (A. Gray) Holub ²⁸ | | | | | | GUA | | GED | |
| <i>Logfia flaginoides</i> (Hook. & Arn.) Morefield ²⁹ | | | TOS | | | GUA | | GED | |
| <i>Malacothrix clevelandii</i> A. Gray | | | | | | GUA | | | |
| <i>Malacothrix foliosa</i> A. Gray | | COR | | | | | | | |
| <i>Malacothrix insularis</i> Greene | | COR | | | | | | | |
| <i>Malacothrix similis</i> Davis & Raven | | COR | TOS | | | | | GED | |
| <i>Matricaria occidentalis</i> Greene ^{30*} | | | | | | GUA | | | |
| <i>Micropus californicus</i> Fisch. & C.A. Mey. | | | | | | GUA | | | |
| <i>Perityle californica</i> Benth. | | | | | | | | | |
| <i>Perityle emoryi</i> Torrey | | | | | | | | | |
| <i>Perityle incana</i> A. Gray | | COR | TOS | MAR | | GUA | BEN | GED | NAT |
| <i>Pluchea odorata</i> (L.) Cass. | var. <i>odorata</i> | | | | | GUA | | GED | |
| <i>Porophyllum gracile</i> Benth. | | | | | | | | GED | |
| <i>Pseudognaphalium beneolens</i> Davidson | | | TOS | | | GUA ³¹ | | | |
| <i>Pseudognaphalium biolettii</i> Anderberg | | | TOS | MAR | | GUA | | GED | |
| <i>Pseudognaphalium luteoalbum</i> (L.) Hilliard & B.L. Burt | | COR | | | | GUA ³² | | | |
| <i>Pseudognaphalium microcephalum</i> Nutt. | | COR | | | | | | | |
| <i>Pseudognaphalium ramosissimum</i> Nutt. | | COR | | | | | | | |
| <i>Pseudognaphalium</i> sp. nov. ³³ | | | | | | | | | |
| <i>Pseudognaphalium stramineum</i> (Kunth) Anderberg | | | | | | GUA | | GED | |
| <i>Rafinesquia californica</i> Nutt. | | | | | | | | | |
| <i>Senecio aphanactis</i> Greene | | COR | TOS | MAR | | | | GED | |
| <i>Senecio crotosensis</i> Greene | | | | | | | BEN | GED | |

²⁶Synonym: *Coreopsis gigantea* (Kellogg) H.M. Hall²⁷Synonym: *Coreopsis maritima* (Nutt.) Hook. f.²⁸Synonym: *Filago arizonica* A. Gray²⁹Synonym: *Filago arizonica* A. Gray³⁰Synonym: *Filago californica* Nutt.³¹New record; herbarium specimen @ RSA, SD³²New record; herbarium specimen @ RSA, SD³³New record; herbarium specimen @ RSA, SD (description pending)

APPENDIX I. Continued

| Family/species | ssp./var. and infraname | COR | TOS | MAR | JER | GUA | BEN | CED | NAT |
|---|---|-----|-----|-----|-----|-----|-------|------|-----|
| <i>Senecio lignonii</i> A. Gray | | | | MAR | | | BEN | | |
| <i>Senecio palmieri</i> A. Gray | | | | | | GUA | | | |
| <i>Senecio sylvaticus</i> L.* | | COR | TOS | MAR | | GUA | | CED? | NAT |
| <i>Sonchus oleraceus</i> L.* | | COR | TOS | MAR | | GUA | BEN | CED | NAT |
| <i>Sonchus tenerrimus</i> L.* | | | | | | GUA | | | |
| <i>Stephanoseris heterocarpa</i> (Nutt.) Chambers | | COR | TOS | | | GUA | | | |
| <i>Stephanomeria diegensis</i> Gottlieb | | | | | | GUA | | | |
| <i>Stephanomeria guadalupensis</i> Brandegee | | | | | | GUA | | | |
| <i>Trixis californica</i> Kell. | var. <i>californica</i> | COR | TOS | MAR | | GUA | BEN & | CED | |
| <i>Uropappus lindleyi</i> (DC.) Nutt. | | | TOS | | | | | CED | |
| <i>Verbesina dissita</i> A. Gray | | | | | | | | | |
| <i>Verbesina hastata</i> Kell. | | | | | | | | CED | |
| <i>Viguiera lanata</i> (Kell) A. Gray | | | | | | | BEN & | CED | NAT |
| <i>Xylothamia diffusa</i> (Benth.) Nesom | | | | | | | | CED | |
| Borragiaceae | | | | | | | | | |
| <i>Amisackia inepta</i> J.F. Macbr. | | | | | | | | | |
| <i>Amisackia menziesii</i> (Lehm.) Nels. & Macbr. | | | TOS | MAR | | GUA | | CED | |
| <i>Cryptantha barbigeri</i> | var. <i>barbigeri</i> (A. Gray) Greene | | TOS | | | | | CED | |
| <i>Cryptantha cleveandii</i> Greene | | | TOS | | | GUA | | | |
| <i>Cryptantha foliosa</i> Reiche | | | | | | | | | |
| <i>Cryptantha graji</i> (V. & R.) Macr. | var. <i>cryptochaeta</i> I.M. Johnston | | | | | | | CED | |
| <i>Cryptantha intermedia</i> (A. Gray) Greene | | COR | TOS | MAR | | | | | |
| <i>Cryptantha maritima</i> (Greene) | var. <i>cedrosensis</i> (Greene) Jtn. | | | | | | | CED | |
| <i>Cryptantha maritima</i> (Greene) | var. <i>maritima</i> Greene | COR | | | | GUA | BEN | CED | NAT |
| <i>Cryptantha patula</i> Greene | | | | | | | BEN | | |
| <i>Emmenanthe penduliflora</i> Benth. | | | | | | GUA | | | |
| <i>Eucrypta chrysanthemifolia</i> (Benth.) Greene | | | | | | GUA | | CED? | |
| <i>Eucrypta chrysanthemifolia</i> (Benth.) Greene | var. <i>bipinnatifida</i> (Torr.) Constance | | | | | GUA | BEN | | |
| <i>Harpagonella palmieri</i> A. Gray | var. <i>chrysanthemifolia</i> | COR | TOS | | | GUA | | | |
| <i>Heliotropium curassavicum</i> L. | | | | | | | | | |
| <i>Johnstonella angelica</i> (I.M. Johnston) Hasenstab & M.G. Simpson ³⁴ | | | | MAR | | | | CED | |
| <i>Pectocarya linearis</i> DC | | | | | | GUA | | CED? | |
| <i>Pectocarya recurvata</i> I.M. Johnston. | ssp. <i>ferocula</i> I.M. Johnston. | | | | | GUA | | CED | |
| <i>Phacelia cedrosensis</i> Rose | | | | | | | | CED | NAT |
| <i>Phacelia cicutaria</i> Greene | | | | | | | | | |
| <i>Phacelia crenulata</i> Torr. | | | | | | | | | |
| <i>Phacelia distans</i> Benth. | | | | | | | | | |
| <i>Phacelia floribunda</i> Greene | | | | | | | | | |
| | var. <i>hispida</i> (A. Gray) J. Howell | | TOS | | | | | | |
| | | COR | TOS | | | | | | |
| | | | | | | GUA | | | |

³⁴Synonym: *Cryptantha angelica* I. M. Johnston; herbarium specimen @ SD (Moran 25430)

APPENDIX I. Continued

| Family/species | ssp./var. and infraname | COR | TOS | MAR | JER | GUA | BEN | CED | NAT |
|--|--|-----|-----|------|-----|-------------------|------|------|-----|
| <i>Phacelia hirtuosa</i> A. Gray | | | TOS | MAR | | | | | |
| <i>Phacelia ixodes</i> Kell. | | COR | TOS | MAR | | | BEN | CED | NAT |
| <i>Phacelia parryi</i> Torr. | | | | MAR | | | | | |
| <i>Phacelia phyllomanica</i> A. Gray | | | | | | GUA | | | |
| <i>Pholistoma auritum</i> (Lindl.) Lilja | | COR | TOS | | | | | | |
| <i>Pholistoma racemosum</i> (Nutt.) Const. | | COR | TOS | MAR | | GUA | | CED | NAT |
| <i>Plagiobothrys acanthocarpus</i> (Piper) I.M. Johnston. | | | | | | GUA | | | |
| <i>Plagiobothrys collinus</i> (Philbr.) I.M. Johnston. | var. <i>californicus</i> | | | | | GUA | | | |
| <i>Plagiobothrys collinus</i> (Philbr.) I.M. Johnston. | var. <i>gracilis</i> Jtn. | | | | | GUA ³⁵ | | CED | |
| Brassicaceae | | | | | | | | | |
| <i>Athyrium pusillus</i> (Hook.) Greene | | | | | | | | CED? | |
| <i>Brassica nigra</i> (L.) W.D.J. Koch* | | | | | | GUA | | CED | |
| <i>Brassica rapa</i> L.* | | | | | | | | CED | |
| <i>Brassica tournefortii</i> Gouan* | | | | | | | | CED | |
| <i>Cakile maritima</i> Scop.* | | | TOS | MAR | | | BEN | CED | NAT |
| <i>Capsella bursa-pastoris</i> (L.) Medik.* | | | | | | GUA | | CED | |
| <i>Caulanthus heterophyllus</i> Payson | var. <i>heterophyllus</i> | | | | | | | CED | NAT |
| <i>Caulanthus lasiophyllus</i> (Hook. & Arn.) Payson ³⁶ | | | TOS | | | GUA | | CED | NAT |
| <i>Caulanthus pinnata</i> (Walt.) Britt. | var. <i>brachycarpa</i> (Richardson) Detling | | | | | | | CED | |
| <i>Descurainia pinnata</i> | ssp. <i>glabra</i> (Woot. & Standl.) Dedl. | COR | | | | | | CED | |
| <i>Descurainia pinnata</i> (Cockerell) Detling | ssp. <i>halictorum</i> (Cockerell) Detling | | | MAR | | | | CED | |
| <i>Descurainia pinnata</i> (Cockerell) Detling | ssp. <i>menziesii</i> (DC.) Detling | | TOS | | | GUA | | CED | |
| <i>Draba cuneifolia</i> S. Watson | var. <i>integrifolia</i> | | | | | | | CED | |
| <i>Eruca vesicaria</i> (L.) Cav. ³⁷ | ssp. <i>sativa</i> | | | | | | | CED | |
| <i>Erysimum moranii</i> Rollins | | | | | | GUA | | | |
| <i>Hornungia procumbens</i> (L.) Hayek ^{38*} | | | | | | GUA | | | |
| <i>Lepidium lasiocarpum</i> Nutt. | var. <i>latifolium</i> | | | MAR? | | GUA | BEN? | | NAT |
| <i>Lepidium nitidum</i> Torrey & A. Gray | | | TOS | | | GUA | | | |
| <i>Lepidium oblongum</i> Small | var. <i>insulare</i> C.L. Hitchc. | | TOS | MAR | | GUA | BEN | CED | NAT |
| <i>Raphanus sativus</i> L.* | | | | | | GUA | | | |
| <i>Silene angulorum</i> (S. Watson) Greene | | | TOS | | | GUA | | CED | |
| <i>Sisymbrium irio</i> L.* | | COR | TOS | | | GUA | | CED | NAT |
| <i>Sisymbrium orientale</i> L.* | | | TOS | | | GUA | | CED | |
| <i>Thysanocarpus erectus</i> S. Watson | | | | | | GUA | | CED | |
| <i>Thysanocarpus laciniatus</i> Nuttall | | | | | | | | CED | |

³⁵New record; herbarium specimen @ RSA, SD³⁶Synonym: *Gaillonia lasiophylla* (Hook. & Arn.) Greene³⁷New record; herbarium specimen @ SD (John Brown, s.n., April 4 1983)³⁸Synonym: *Hutchinsia procumbens* (L.) Desv.

APPENDIX I. Continued

| Family/species | ssp./var. and infraname | COR | TOS | MAR | JER | GUA | BEN | GED | NAT |
|---|--|-----|-----|------------------------|-----|-----|------|------|------|
| Cactaceae | | | | | | | | | |
| <i>Bergencactus emoryi</i> (Engelm.) Br. & R. | | | | | | | | | |
| <i>Cochemiea ponda</i> Walton | | COR | TOS | MAR | | | | GED | NAT |
| <i>Cylindropuntia alcahes</i> (F.A.C. Weber) F.M. Knuth | var. <i>alcahes</i> | | | | | | | GED | |
| <i>Cylindropuntia cholla</i> (F.A.C. Weber) F.M. Knuth | | | | | | | | NAT | |
| <i>Cylindropuntia prolifera</i> (Engelm.) F.M. Knuth | | COR | TOS | MAR? | | GUA | | GED? | |
| <i>Cylindropuntia</i> sp. nova ³⁹ | | | | | | | | GED | NAT? |
| <i>Echinocereus maritimus</i> (M.E. Jones) K. Schum. | var. <i>maritimus</i> | | | MAR | | | BEN | GED? | NAT |
| <i>Ferocactus chrysacanthus</i> (Orcutt) Britt. & Rose | | | | | | | | GED | |
| <i>Ferocactus foidii</i> (Orcutt) Britt. & Rose | var. <i>grandiflorus</i> G.E. Linds. | | | MAR | | | | GED | NAT |
| <i>Lophocereus schottii</i> (Engelm.) Br. & R. | var. <i>schottii</i> | | | MAR ⁴⁰ | | | BEN | GED | |
| <i>Mammillaria blossfeldiana</i> Boedeker | var. <i>shurtiana</i> Gates | | | | | GUA | | GED | |
| <i>Mammillaria dioica</i> M.K. Brandegee | | COR | TOS | MAR | | | | GED | |
| <i>Mammillaria goodridgei</i> Scheer | var. <i>rectispina</i> E.Y. Dawson | | | | | | | GED | |
| <i>Mammillaria goodridgei</i> Scheer | var. <i>goodridgei</i> | | | | | | | GED | NAT |
| <i>Mammillaria hutchinsoniana</i> (Gates) Boed. | | | | | | | | GED | |
| <i>Mammillaria louisae</i> G.E. Linds | | | | MAR ⁴¹ | | | | GED | |
| <i>Mammillaria neopalmari</i> R.T. Craig | | | | | | | BEN? | | |
| <i>Mrytillocactus cochal</i> (Orcutt) Britt. & Rose | | | | | | | | | |
| <i>Opuntia ficus-indica</i> (L.) Miller | | | TOS | MAR | | | | | |
| <i>Opuntia littoralis</i> (Engelm.) Cockerell | | COR | TOS | MAR ⁴² aff. | | | | GED? | |
| <i>Opuntia oricola</i> Philbrick | | COR | TOS | MAR ⁴³ | | | | GED? | NAT |
| <i>Pachycereus pringlei</i> (S. Watson) Britton & Rose | | | | | | | | GED | |
| <i>Stenocereus gummosus</i> (Engelm.) A.C. | | | | MAR | | | | GED | |
| Gibson & K.E. Horak | | | | | | | | | |
| Cappanulaceae | | | | | | | | | |
| <i>Githopsis diffusa</i> A. Gray | var. <i>guadalupeensis</i> (Morin) Lammers | | | | | GUA | | | |
| <i>Triodanis biflora</i> (Ruiz & Pav.) Greene | | | | | | GUA | | | |
| Cannabaceae | | | | | | | | | |
| <i>Celtis laevigata</i> ⁴⁴ | var. <i>reticulata</i> (Torr.) Benson | | | | | | | GED? | |
| Capparidaceae | | | | | | | | | |
| <i>Peritoma arborea</i> (Nutt.) Iltis ⁴⁵ | var. <i>angustata</i> (Parish) Iltis | | | | | | | GED | |
| <i>Peritoma arborea</i> (Nutt.) Iltis ⁴⁶ | var. <i>globosa</i> (Coville) Iltis | COR | | | | | | | |

³⁹New record; pers. comm. Jon Rehman, SD (includes *Cylindropuntia californensis* Rehman)⁴⁰New record; herbarium specimen @ RSA, SD⁴¹Re-identification, changed from *M. hutchinsoniana*⁴²New record; herbarium specimen @ RSA⁴³New record; herbarium specimen @ RSA⁴⁴Synonym; *Celtis douglasii* Planch.⁴⁵Synonym; *Isomeris arborea* Nutt. ssp. *angustata* Parish⁴⁶New record; herbarium specimen @ SD Rehman 6230

APPENDIX I. Continued

| Family/species | ssp./var. and infraname | COR | TOS | MAR | JER | GUA | BEN | CED | NAT |
|--|--|-----|-----|------------------------|-----|-----|-----|------|------------|
| Caprifoliaceae | | | | | | | | | |
| <i>Lonicera hispidula</i> Dougl. ⁴⁷ | | | | | | GUA | | | |
| <i>Lonicera subspicata</i> Hook. & Arn. | var. <i>denudata</i> Rehder | | | | | | | CED | |
| Caryophyllaceae | | | | | | | | | |
| <i>Achyroxychia cooperi</i> Torrey & A. Gray | | | | | | | | | CED |
| <i>Cerastium glomeratum</i> Thuill.* | | | | | | GUA | | | |
| <i>Drymaria holosteoides</i> Benth. | var. <i>holosteoides</i> | | | | | | | CED | |
| <i>Herniaria hirsuta</i> L. | var. <i>cinerea</i> (DC.) Coutinho | | TOS | | | GUA | | | |
| <i>Polycarpon depressum</i> Nutt. | | | TOS | | | GUA | | | |
| <i>Silene antirrhina</i> L. | | | TOS | | | GUA | | | |
| <i>Silene gallica</i> L.* | | COR | | | | GUA | | CED? | |
| <i>Silene laciniata</i> Cav. ⁴⁸ | | COR | | | | GUA | | | |
| <i>Spergularia bocconii</i> (Scheele) Merino* | | | | | | GUA | | | |
| <i>Spergularia macrotheca</i> | (Hornem. ex Cham. & Schltdl.) Heynh. ⁴⁹ | | | | | GUA | | | |
| <i>Spergularia macrotheca</i> | var. <i>laciniata</i> | | | | | GUA | | | |
| <i>Spergularia macrotheca</i> | var. <i>talinum</i> (Greene) Jepps. | | | | | GUA | | | |
| <i>Spergularia marina</i> J. & K. Presl | (Hornem. ex Cham. & Schltdl.) Heynh. | | | | | GUA | | | |
| <i>Spergularia villosa</i> (Pers.) Camb.* | | COR | | MAR ⁵⁰ | | GUA | | | |
| <i>Stellaria media</i> (L.) Vill.* | | COR | | | | | | | |
| <i>Stellaria pallida</i> (Dumort.) Crép* | | COR | | | | | | | |
| <i>Stellaria nitens</i> Nutt. | | | | | | GUA | | | CED |
| <i>Allenrolfeca occidentalis</i> (S. Watson) Kuntze | | | | | | | | | |
| Chenopodiaceae | | | | | | | | | |
| <i>Aphanisma blitoides</i> Nutt. | | COR | TOS | MAR | | GUA | BEN | CED | NAT |
| <i>Arthrocnemum subterminale</i> (Pursh) Standl. ⁵¹ | | | | MAR | | | | | |
| <i>Atriplex barclayana</i> (Benth.) Dietr. | | | | | | GUA | BEN | CED? | NAT |
| <i>Atriplex californica</i> Moq. | | COR | TOS | | | GUA | | CED | |
| <i>Atriplex canescens</i> (Pursh) Nutt. | | COR | | | | | | | |
| <i>Atriplex coulteri</i> (Moq.) D. Dietr. | ssp. <i>canescens</i> | | | | | | BEN | CED? | NAT? |
| <i>Atriplex julacea</i> S. Watson | | | TOS | MAR | | | | CED | NAT |
| <i>Atriplex leucophylla</i> (Moq. in DC.) D. Dietr. | | COR | | MAR | | | | CED | NAT |
| <i>Atriplex pacifica</i> Nels. | | COR | | MAR | | | | CED | NAT |
| <i>Atriplex semibaccata</i> R. Br.* | | COR | TOS | MAR | | GUA | | CED | |
| <i>Atriplex serenana</i> A. Nelson ex Abrams | var. <i>dauidsonii</i> (Standl.) Munz | COR | | MAR ⁵² aff. | | | | | NAT × aff. |

⁴⁷Synonymy: *Lonicera hispidula* (Lindl.) Douglas ex Torr. & A. Gray var. *racillans* A. Gray

⁴⁸Synonymy: *Silene laciniata* Cav. ssp. *major* C.L. Hitch. & Maguire

⁴⁹New record; herbarium specimen @ RSA, SD

⁵⁰New record; herbarium specimen @ RSA, SBBC

⁵¹Synonymy: *Salicornia subterminalis* Parish

⁵²New record; herbarium specimen @ RSA, potentially new species

APPENDIX I. Continued

| Family/species | ssp./var. and infraname | COR | TOS | MAR | JER | GUA | BEN | CED | NAT |
|---|-------------------------|-------------------|-----|-----|-------------------|-----|------|------|-----|
| <i>Atriplex suberecta</i> Verdoorn | | COR ⁵³ | | | | GUA | | | |
| <i>Atriplex watsonii</i> A. Nelson | | | | MAR | | | | | |
| <i>Chenopodium album</i> L. | | | | | | | | CED? | |
| <i>Chenopodium californicum</i> (S. Watson) S. Watson | | COR | TOS | | | | | | |
| <i>Chenopodium flabellifolium</i> Standl. | | | | MAR | | | | | |
| <i>Chenopodium murale</i> L.* | | COR | TOS | MAR | JER | GUA | BEN | CED | NAT |
| <i>Salicornia pacifica</i> Standl. ⁵⁴ | | | | MAR | | | | | |
| <i>Salsola australis</i> R.Br.* | | COR | TOS | | | | | CED | |
| <i>Suaeda nigra</i> (Rafinesque) J.F. Macbride | | | | | | | BEN | | NAT |
| <i>Suaeda taxifolia</i> (Standl.) Standl. | | COR | | MAR | JER ⁵⁵ | GUA | BEN | CED | |
| Convolvulaceae | | | | | | | | | |
| <i>Calystegia macrostegia</i> (Greene) Brummitt | | | TOS | | | | | | |
| <i>Calystegia macrostegia</i> (Greene) Brummitt | ssp. <i>intermedia</i> | COR ⁵⁶ | | MAR | | GUA | | | |
| <i>Calystegia macrostegia</i> (Greene) Brummitt | ssp. <i>macrostegia</i> | | | MAR | | GUA | | | |
| <i>Cuscuta californica</i> Hook. & Arn. | | | | MAR | | | | | NAT |
| <i>Cuscuta corymbosa</i> Ruiz & Pavon | | | | | | GUA | | | |
| <i>Cuscuta salina</i> Engelm. ⁵⁷ | | | | | | | BEN | | |
| <i>Dichondra occidentalis</i> House | ssp. <i>salina</i> | COR | TOS | | | | | | |
| Crassulaceae | | | | | | | | | |
| <i>Crassula connata</i> (Ruiz Lopez & Pavon) | | COR | TOS | MAR | | GUA | BEN? | CED | |
| A. Berger | | | | | | | | | |
| <i>Dudleya acuminata</i> Rose | | | | | | | | CED | |
| <i>Dudleya albiflora</i> Rose | | | | | | | BEN? | CED | NAT |
| <i>Dudleya anomala</i> (Davidson) Moran | | COR | TOS | | | | | | |
| <i>Dudleya anthonyi</i> Rose | | | | MAR | | | | | |
| <i>Dudleya anthonyi</i> × <i>D. cultrata</i> Rose | | | | MAR | | | | | |
| <i>Dudleya attenuata</i> (S. Watson) Moran | | COR | TOS | | | | | | |
| <i>Dudleya brittonii</i> D.A. Johans. | | | TOS | | | | | | |
| <i>Dudleya candida</i> Britton | | COR | | | | | | | |
| <i>Dudleya cedrosensis</i> Moran | | | | | | | | CED | |
| <i>Dudleya cultrata</i> Rose | | | | MAR | | | | | |
| <i>Dudleya guadalupensis</i> Moran | | | | | | GUA | | | |
| <i>Dudleya ingens</i> Rose | | | | | | | | | |
| <i>Dudleya lanceolata</i> (Nutt.) Britton & Rose | | | | | | | | CED? | aff |
| <i>Dudleya linearis</i> (Greene) Britt. & Rose | | COR | | | | | | | |
| <i>Dudleya pachyphyllum</i> Moran & Benedict | | | | | | | BEN? | | CED |

⁵³New record; pers. comm. Jon Rehman

⁵⁴Synonym: *Salicornia virginica* L.

⁵⁵New record; herbarium specimen @ SD

⁵⁶New record; pers. comm. Jon Rehman

⁵⁷New record; herbarium specimen @ RSA, SD Moran 20315

APPENDIX I. Continued

| Family/species | ssp./var. and infraname | COR | TOS | MAR | JER | GUA | BEN | CED | NAT |
|---|---|------|-----|-----|-----|-----|-----|------|-----|
| <i>Dudleya virens</i> (Rose) Moran | | | | | | | | | |
| <i>Dudleya × semiteres</i> (Rose) Moran | | COR | TOS | | | GUA | | | |
| Crossosomataceae | | | | | | | | | |
| <i>Crossosoma californicum</i> Nutt. | | | | | | GUA | | | |
| Cucurbitaceae | | | | | | | | | |
| <i>Echinopepon minimum</i> (Kell.) S. Watson | var. <i>minimum</i> | | | | | | | CED | NAT |
| <i>Marah guadalupensis</i> Greene | | | | | | GUA | | | |
| <i>Marah macrocarpus</i> (Greene) Greene | | COR | TOS | MAR | | | | CED | |
| Ericaceae | | | | | | | | | |
| <i>Arctostaphylos</i> sp. | | | | | | GUA | | | |
| <i>Xylococcus bicolor</i> Nutt. | | | | | | | | CED | |
| Euphorbiaceae | | | | | | | | | |
| <i>Acalypha californica</i> Benth. | | | | | | | | CED | |
| <i>Andrachne ciliato-glandulosa</i> (Millsp.) Croizat | | | | | | | | CED | |
| <i>Euphorbia albomarginata</i> Torr. & A. Gray* | | | | | | | | CED? | |
| <i>Euphorbia bartolomaei</i> Greene | | | | | | | | CED | NAT |
| <i>Euphorbia crenulata</i> Engelm. | | | TOS | | | | | | |
| <i>Euphorbia misera</i> Benth. | | COR | TOS | MAR | | GUA | BEN | CED | NAT |
| <i>Euphorbia polycarpa</i> Benth. | | | | MAR | | | | CED | NAT |
| <i>Euphorbia pondii</i> Millsp. ⁵⁸ | | | | | | GUA | | | |
| Fabaceae | | | | | | | | | |
| <i>Acmispon argophyllus</i> (A. Gray) Brouillet ⁵⁹ | ssp. <i>argenteus</i> (Dunkle) | | | | | GUA | | CED | |
| <i>Acmispon flexuosus</i> (Greene) Brouillet ⁶⁰ | | | | | | | | | |
| <i>Acmispon glaber</i> (Vogel) Brouillet ⁶¹ | | COR? | | | | | | | |
| <i>Acmispon grandiflorus</i> (Benth.) Brouillet ⁶² | var. <i>grandiflorus</i> | | | | | GUA | | | |
| <i>Acmispon maritimus</i> (Nutt.) D.D. Sokoloff ⁶³ | ssp. <i>brevitextillus</i> (Ottley) Brouillet | | | | | | BEN | CED | NAT |
| <i>Acmispon nudatus</i> (Greene) Brouillet ⁶⁴ | | | | | | | | CED | |
| <i>Acmispon rigidus</i> (Benth.) Brouillet ⁶⁵ | | | | | | | | CED | |
| <i>Acmispon strigosus</i> (Nutt.) Brouillet ⁶⁶ | | | TOS | MAR | | | | CED | |
| <i>Astragalus</i> aff. <i>gambelianus</i> E. Sheld. | | | | | | | | | NAT |
| <i>Astragalus fastidius</i> (Kell.) M.E. Jones | | | | | | | | CED | |
| <i>Astragalus insularis</i> Kell. | var. <i>insularis</i> | | | | | | | CED | |

⁵⁸Synonymy: *Chamaesyce pondii* (Millsp.) Millsp.⁵⁹Synonymy & per Jon Rehnman may be recognized as: *Lotus argophyllus* (A. Gray) Greene ssp. *ornithopus* (Greene) P.H. Raven⁶⁰Synonymy: *Lotus cedrosensis* Greene⁶¹Synonymy: *Lotus scoparius* (Torr. & A. Gray) Ottley⁶²Synonymy: *Lotus grandiflorus* (Benth.) Greene⁶³Synonymy: *Lotus subsignosus* Greene ssp. *brevitextillus* Ottley⁶⁴Synonymy: *Lotus nudatus* (Greene) Greene⁶⁵Synonymy: *Lotus rigidus* (Benth.) Greene⁶⁶Synonymy: *Lotus strigosus* (Nutt.) Greene

APPENDIX I. Continued

| Family/species | ssp./var. and infraname | COR | TOS | MAR | JER | GUA | BEN | CED | NAT |
|--|--|-------------------|-----|-----|-----|--------------------|------|------|-----|
| <i>Astragalus magdalenae</i> Greene | var. <i>magdalenae</i> | | | | | | | | NAT |
| <i>Astragalus nuttallianus</i> DC. | var. <i>cedrosensis</i> M.E. Jones | | | | | | | CED | NAT |
| <i>Astragalus trichopodus</i> A. Gray | var. <i>lonchus</i> (M.E. Jones) Barneby | COR | TOS | | | | | CED? | |
| <i>Dalea mollis</i> Benth. | | | | | | | | | NAT |
| <i>Ebenopsis confinis</i> (Standl.) Britton & Rose ⁶⁷ | | | | | | | | | |
| <i>Errazurizia benthamii</i> (Brandege) I.M. Johnst. | | | | | | | BEN? | CED | |
| <i>Lapinus concinnus</i> Agardh. | ssp. <i>concinus</i> | | | | | GUA | | CED | |
| <i>Lapinus guadalupensis</i> Greene | | | | | | GUA | | | |
| <i>Lapinus niveus</i> S. Watson | | | | | | | | | |
| <i>Lapinus sparsiflorus</i> Benth. | var. <i>pondii</i> (Greene) C. P. Smith | | | MAR | | | | CED | |
| <i>Lapinus succulentus</i> Dougl. | | COR | TOS | | | | | | |
| <i>Lapinus truncatus</i> Hook. & Arn. | | | | | | | | | |
| <i>Medicago polymorpha</i> L.* | | COR | | | | GUA | | | |
| <i>Melilotus indicus</i> (L.) All.* | | | | | | GUA | BEN | CED | |
| <i>Phaseolus filiformis</i> Benth. | | | | | | | BEN? | CED | NAT |
| <i>Syrmatium watsonii</i> (Vasey & Rose) Brand ⁶⁸ | | | | | | | | | |
| <i>Trifolium depauperatum</i> Desv. | var. <i>truncatum</i> (Greene) Martin ex Isely | | TOS | MAR | | GUA, ⁶⁹ | | | |
| <i>Trifolium gracilentum</i> Torr. & A. Gray | | COR ⁷⁰ | TOS | | | GUA | | | |
| <i>Trifolium microcephalum</i> Pursh | | | | | | GUA | | | |
| <i>Trifolium palmeri</i> S. Watson | | | | | | GUA | | | |
| <i>Trifolium willdenovii</i> Sprengel | | COR | TOS | | | | | | |
| <i>Viola hassletii</i> S. Watson | | | TOS | | | | | | |
| <i>Viola ludoviciana</i> Nutt. | ssp. <i>ludoviciana</i> | | | | | GUA | | | |
| <i>Vachellia farnesiana</i> (L.) Wight & Arn. ^{71*} | var. <i>minuta</i> (M.E. Jones) Seigler & Elbinger | | | | | | | CED | |
| <i>Quercus cedrosensis</i> C.H. Müll. | | | | | | | | CED | |
| <i>Quercus tomentella</i> Engelm. | | | | | | GUA | | | |
| Frankeniaceae | | | | | | | | | |
| <i>Frankenia palmeri</i> S. Watson | | | | | | | | | |
| <i>Frankenia salina</i> (Molina) I.M. Johnst. | | | TOS | | | GUA | BEN | CED | NAT |
| Garryaceae | | | | | | | | | |
| <i>Garrya veitchii</i> Kell. | | | | | | | | CED | |
| Gentianeaceae | | | | | | | | | |
| <i>Zeltnera ventusta</i> (A. Gray) G. Mans. ⁷² | | | | | | | | CED | |

⁶⁷Synonym: *Pithecellobium confine* Standl.⁶⁸Synonym: *Lotus watsonii* (Vasey & Rose) Greene⁶⁹New record; pers. comm. Jon Rehman⁷⁰New record; herbarium specimen @ SD⁷¹New record; pers. comm. Jon Rehman, photovoucher @ SD; synonym: *Acacia farnesiana* var. *minuta*⁷²Synonym: *Centaurium venustum* (A. Gray) B.L. Rob.

APPENDIX I. Continued

| Family/species | ssp./var. and infraname | COR | TOS | MAR | JER | GUA | BEN | CED | NAT |
|--|-----------------------------|-----|------|-----|-----|-----|------|------|------|
| Geraniaceae | | | | | | | | | |
| <i>Erodium botrys</i> (Cav.) Bertol.* | | COR | | | | | | | |
| <i>Erodium brachycarpum</i> (Godr.) Thell.* | | | | | | GUA | | | |
| <i>Erodium cicutarium</i> (L.) L'Her. ex Ait.* | | COR | TOS | MAR | | GUA | | CED? | |
| <i>Erodium moschatum</i> (L.) L'Her. ex Ait.* | | COR | TOS | MAR | | GUA | BEN? | CED? | |
| <i>Erodium texanum</i> A. Gray | | | TOS | | | | | | NAT |
| <i>Pelargonium × hortorum</i> L. H. Bailey* | | | | | | | | | |
| Grossulariaceae | | | | | | | | | |
| <i>Ribes tortuosum</i> Benth. | | | TOS | | | | | CED | |
| <i>Ribes viburnifolium</i> A. Gray | | | TOS | | | | | CED | |
| Lamiaceae | | | | | | | | | |
| <i>Clinopodium palmeri</i> (A. Gray) Kuntze ⁷³ | | | | | | GUA | | | |
| <i>Marrubium vulgare</i> L.* | | | TOS | | | | | | |
| <i>Monardella thymifolia</i> Greene | | | | | | | | CED | |
| <i>Pogogyne tenuiflora</i> A. Gray | | | | | | GUA | | | |
| <i>Salvia cedrosensis</i> Greene | | | | | | | | CED | |
| <i>Salvia columbariae</i> Benth. | | | | | | | | CED | |
| <i>Teucrium glandulosum</i> Kell. | | | | | | | | CED | |
| Loasaceae | | | | | | | | | |
| <i>Eucnide cordata</i> Kell. | | | | | | | | CED | |
| <i>Mentzelia adhaerens</i> Bentham | | | | | | | | CED | |
| <i>Mentzelia hirsutissima</i> S. Watson | | | | | | | BEN | CED? | NAT |
| <i>Mentzelia micrantha</i> (Hook. & Arn.) Torr. & A. Gray | var. <i>nesiotes</i> | | | | | GUA | | | |
| <i>Petalonyx linearis</i> Greene | | | | | | | BEN | CED | |
| Malvaceae | | | | | | | | | |
| <i>Abutilon californicum</i> Benth. | | | | | | | | CED? | NAT? |
| <i>Eremalche exilis</i> (A. Gray) Greene | | | TOS | | | | BEN? | | NAT |
| <i>Malva assurgentiflora</i> (Kellogg) M.F. Ray ^{74*} | | | TOS | | | | | | |
| <i>Malva lindsayi</i> (Moran) M.F. Ray ⁷⁵ | ssp. <i>assurgentiflora</i> | | | | | GUA | | | |
| <i>Malva pacifica</i> M.F. Ray ⁷⁶ | | | | | JER | | BEN | CED? | NAT |
| <i>Malva parviflora</i> L.* | | | | | | GUA | BEN? | CED? | NAT |
| <i>Malva occidentalis</i> (S. Watson) M.F. Ray ⁷⁷ | | COR | TOS? | MAR | | GUA | | CED? | |
| <i>Sphaeralcea fulva</i> Greene | | COR | | | | GUA | | | |
| <i>Sphaeralcea palmeri</i> Jeps. | | | | | | GUA | | CED | NAT |
| <i>Sphaeralcea sulphurea</i> S. Watson | | | | | | GUA | | | |

⁷³Synonym: *Satureja palmeri* (A. Gray) Briq.⁷⁴Synonym: *Lacatera lindsayi* Moran⁷⁵Synonym: *Lacatera occidentalis* S. Watson⁷⁶Synonym: *Lacatera venosa* S. Watson⁷⁷Synonym: *Lacatera assurgentiflora* Kellogg

APPENDIX I. Continued

| Family/species | ssp./var. and infraname | COR | TOS | MAR | JER | GUA | BEN | GED | NAT |
|---|---|-----|-----|-----|-----|-----|------|------|-----|
| Montiaceae | | | | | | | | | |
| <i>Calandrinia ciliata</i> (Ruiz Lopez & Pavon) DC. | | | | | | | | | |
| <i>Cistanthe guadalupensis</i> (Dudley) | | | TOS | MAR | | GUA | | | |
| Carolin ex Hershk. | | | | | | GUA | | | |
| <i>Cistanthe maritima</i> (Nutt.) ⁷⁸ | | COR | TOS | MAR | | GUA | BEN | GED | NAT |
| Carolin ex Hershkovitz | | | | | | | | | |
| <i>Claytonia parviflora</i> Dougl. ex Hook. ⁷⁹ | ssp. <i>parviflora</i> | | | | | GUA | | | |
| <i>Claytonia perfoliata</i> Willd. & Chambers | ssp. <i>mexicana</i> (Rydberg) Miller (Chambers) | COR | TOS | MAR | | GUA | | GED | |
| <i>Claytonia spatulata</i> Douglas | | | | | | | | GED? | |
| Myrsinaceae | | | | | | | | | |
| <i>Anagallis arvensis</i> L.* | | | | | | GUA | | | |
| Nyctaginaceae | | | | | | | | | |
| <i>Abronia maritima</i> Nutt. ex S. Watson | | | | MAR | | | | GED? | NAT |
| <i>Mirabilis laevis</i> (Benth.) Curran | var. <i>crassifolia</i> (Choisy) Spellenb. | COR | TOS | MAR | | GUA | BEN? | GED? | NAT |
| Oleaceae | | | | | | | | | |
| <i>Hesperaloe palmeri</i> A. Gray | | | | | | GUA | | | |
| Onagraceae | | | | | | | | | |
| <i>Camissoniopsis cheiranthifolia</i> (Hornem. ex Spreng.) W.L. Wagner & Hoch ⁸⁰ | ssp. <i>suffruticosa</i> (S. Watson) W.L. Wagner & Hoch | | | MAR | | | | | |
| <i>Camissoniopsis guadalupensis</i> (S. Watson) W.L. Wagner & Hoch ⁸¹ | ssp. <i>guadalupensis</i> | | | | | GUA | | | |
| <i>Camissoniopsis robusta</i> (P.H. Raven) W.L. Wagner & Hoch ⁸² | | | | | | GUA | | | |
| <i>Chylisma cardiophylla</i> (Torr.) Small ⁸³ | ssp. <i>cedrosensis</i> (Greene) W.L. Wagner & Hoch | | | | | | | GED | |
| <i>Eriolobus californica</i> Nutt. ex Torr. & A. Gray ⁸⁴ | | | TOS | MAR | | | | | |
| <i>Eriolobus crassifolius</i> (Greene) W.L. Wagner & Hoch ⁸⁵ | | | | | | | | GED? | NAT |
| <i>Epilobium foliosum</i> (Torr. & A. Gray) Suksdorf | | | | | | GUA | | | |
| <i>Xylougra arborea</i> (Kell.) Domm.-Smith & Rose | ssp. <i>arborea</i> | | | | | | | GED | |
| <i>Xylougra arborea</i> (Kell.) Domm.-Smith & Rose | ssp. <i>weigginii</i> | | | | | | | GED | |
| Orobanchaceae | | | | | | | | | |
| <i>Castilleja attenuata</i> (A. Gray) Chuang & Heckard | | | | | | GUA | | | |

⁷⁸Synonymy: *Calandrinia maritima* Nutt.⁷⁹New record; herbarium specimen @ RSA, SD⁸⁰Synonymy: *Camissonia cheiranthifolia* (Hornem. ex Spreng.) Raim. ssp. *suffruticosa* (S. Watson) P.H. Raven⁸¹Synonymy: *Camissonia guadalupensis* S. Watson) P.H. Raven ssp. *guadalupensis*⁸²Synonymy: *Camissonia robusta* P.H. Raven⁸³Synonymy: *Camissonia cardiophylla* (Torr.) P.H. Raven ssp. *cedrosensis* (Greene) P.H. Raven⁸⁴Synonymy: *Camissonia californica* (Nutt. ex Torr. & A. Gray) P.H. Raven⁸⁵Synonymy: *Camissonia crassifolia* (Greene) P.H. Raven

APPENDIX I. Continued

| Family/species | ssp./var. and infraname | COR | TOS | MAR | JER | GUA | BEN | GED | NAT |
|--|--|-----|------|-----|-----|-----|------|------|-----|
| <i>Castilleja exserta</i> (A. Heller) Chuang & Heckard | ssp. <i>exserta</i> | | TOS | | | GUA | | | |
| <i>Castilleja fruticosa</i> Moran | | | | | | GUA | | | |
| <i>Castilleja guadalupensis</i> Brandegee | | | | | | GUA | | | |
| <i>Castilleja subinclusa</i> Greene | ssp. <i>subinclusa</i> | | TOS | | | | | | |
| Papaveraceae | | | | | | | | | |
| <i>Eschscholzia californica</i> Cham. | | COR | TOS | | | GUA | | | |
| <i>Eschscholzia elegans</i> Greene. | | | | | | GUA | | | |
| <i>Eschscholzia palmeri</i> Rose | | | | | | GUA | | | |
| <i>Eschscholzia ramosa</i> Greene | | COR | TOS | MAR | | GUA | BEN | GED | NAT |
| <i>Platystemon californicus</i> Benth. | | | | | | GUA | | | |
| <i>Papaver heterophyllum</i> A. Gray, ⁸⁶ | | COR | TOS | MAR | | | | | |
| Phrymaceae | | | | | | | | | |
| <i>Diplacus × australis</i> (McMinn ex Munz) Tulig ⁸⁷ | | | TOS? | | | | | GED | |
| <i>Diplacus brandegeei</i> (Pennell) G.L. Nesom ⁸⁸ | | | | | | GUA | | | |
| <i>Erythranthe cardinalis</i> ⁸⁹ | | | | | | | | GED | |
| Plantaginaceae | | | | | | | | | |
| <i>Antirrhinum nuttallianum</i> Benth. | | | | | | GUA | | GED | |
| <i>Antirrhinum watsonii</i> Vasey & Rose | ssp. <i>subsessile</i> (A. Gray) D.M. Thomps. | COR | TOS | MAR | | GUA | BEN | GED | NAT |
| <i>Collinsia heterophylla</i> Buist. | var. <i>heterophylla</i> | COR | | | | | | GED | |
| <i>Gambelia juncea</i> (Benth.) D.A. Sutton ⁹⁰ | | | | | | GUA | | GED? | |
| <i>Gambelia speciosa</i> Nutt. ⁹¹ | | | | | | GUA | | GED? | |
| <i>Nuttallanthus texanus</i> (Scheele) D.A. Sutton ⁹² | | COR | TOS | | | | | GED | |
| <i>Penstemon cedrosensis</i> Kell. | | | | | | GUA | BEN? | GED? | NAT |
| <i>Plantago ovata</i> Forssk. | ssp. <i>insularis</i> | | | | | GUA | | | |
| Polemoniaceae | | | | | | | | | |
| <i>Allophylum giliioides</i> (Benth.) A. & V. Grant | | | | | | GUA | | | |
| <i>Gilia angelensis</i> V.E. Grant | | | | | | | | | |
| <i>Gilia capitata</i> Sims | ssp. <i>abrotanifolia</i> (Nutt. ex Greene) V.E. Grant | COR | TOS | | | | | | |
| <i>Gilia nevadensis</i> A. Gray | | | | | | GUA | | | |
| <i>Leptosiphon pygmaeus</i> (Brand) J.T. Howell ⁹³ | ssp. <i>pygmaeus</i> | | | | | GUA | | | |
| <i>Linanthus dianthiflorus</i> (Benth.) Greene | | COR | | | | | | | |

⁸⁶Synonymy: *Stylomecon heterophylla* (Benth.) G. Taylor⁸⁷Synonymy: *Minidius aurantiacus* Curtis var. *aurantiacus*⁸⁸Synonymy: *Minidius latifolius* A. Gray, *Diplacus latifolius* (A. Gray) G.L. Nesom (Douglas ex Benth.) Spach⁸⁹Synonymy: *Minidius cardinalis* Douglas ex Benth.⁹⁰Synonymy: *Galvezia juncea* (Benth.) Ball⁹¹Synonymy: *Galvezia speciosa* (Nutt.) A. Gray⁹²Synonymy: *Linaria texana* Scheele and *Linaria canadensis* (L.) Dum. Cours.⁹³Synonymy: *Linanthus pygmaeus* (Brand) J.T. Howell ssp. *pygmaeus*

APPENDIX I. Continued

| Family/species | ssp./var. and infraname | COR | TOS | MAR | JER | GUA | BEN | CEJ | NAT |
|---|--|-----|-----|-----|-----|-----|-----|------|------|
| <i>Linanthus uncialis</i> (Brandege) Moran | | | | | | | | CEJ? | |
| <i>Linanthus veitchii</i> (C. Parry) J.M. Porter & L.A. Johnson | <i>Microsteris gracilis</i> (Hook.) Greene | | | | | | | CEJ | CEJ? |
| Polygonaceae | | | | | | | | CEJ? | |
| <i>Eriogonum fasciculatum</i> Benth. | | COR | TOS | | | | | CEJ | |
| <i>Eriogonum grande</i> Greene | var. <i>testudinum</i> Reveal | | TOS | | | | | CEJ | |
| <i>Eriogonum intricatum</i> Benth. | | | | | | | | CEJ | |
| <i>Eriogonum molle</i> Greene | | | | | | | | CEJ | NAT |
| <i>Eriogonum pondii</i> Greene Torrey ex Benth. | | | | | | GUA | | CEJ | NAT |
| <i>Eriogonum zapatoense</i> Moran | | | | | | | | CEJ | |
| <i>Eriogonum virgatum</i> | var. <i>taxifolium</i> (Greene) Parish | | | | | | | CEJ | |
| <i>Harfordia macroptera</i> (Benth.) Greene & Parry | var. <i>fruticosa</i> (Greene) Reveal | | | | | | | CEJ | |
| <i>Lastarriata coriacea</i> (Goodman) Hoover ⁹⁴ | | | | | | | | CEJ? | |
| <i>Pterostegia drymaroides</i> F. & M. | | COR | TOS | MAR | | GUA | | CEJ | |
| Portulacaceae | | | | | | | | CEJ | |
| <i>Portulaca oleracea</i> L.* | | | | | | | | CEJ | NAT |
| Primulaceae | | | | | | | | CEJ | |
| <i>Dodecatheon cleveandii</i> Greene | ssp. <i>insulare</i> (H.J. Thoms.) Reveal | | | | | GUA | | CEJ | |
| Ranunculaceae | | | | | | | | CEJ | |
| <i>Clematis pauciflora</i> Nutt. | | COR | TOS | | | | | CEJ? | |
| <i>Delphinium cardinale</i> Hook. | | | | | | | | CEJ? | |
| <i>Delphinium parryi</i> A. Gray | | COR | TOS | | | | | CEJ? | |
| <i>Mjosurus minimus</i> L. | | | | | | GUA | | CEJ? | |
| <i>Ranunculus hebecarpus</i> H. & A. | | | | | | GUA | | CEJ? | |
| Resedaceae | | | | | | | | CEJ | |
| <i>Oligomeris limifolia</i> (Vahl.) Macbr. | | COR | TOS | | | GUA | BEN | CEJ | NAT |
| Rhamnaceae | | | | | | | | CEJ | |
| <i>Ceanothus arborescens</i> Greene | | | | | | GUA | | CEJ | |
| <i>Ceanothus crassifolius</i> Torr. | | | | | | GUA | | CEJ | |
| <i>Ceanothus cuneatus</i> (Hook.) Nutt. | | | | | | GUA | | CEJ | |
| <i>Ceanothus perplexans</i> Trel. ⁹⁵ | | | | | | GUA | | CEJ | |
| <i>Ceanothus verrucosus</i> Nutt. | | | | | | GUA | | CEJ? | |
| <i>Rhamnus insula</i> Kellogg | | | | | | GUA | | CEJ? | |
| <i>Rhamnus pirifolia</i> Greene | | | | | | GUA | | CEJ? | |
| <i>Ziziphus parryi</i> Torr. | ssp. <i>microphylla</i> | | | | | | | CEJ? | |
| Rosaceae | | | | | | | | CEJ? | |
| <i>Adenostoma fasciculatum</i> Hook. & Arn. | var. <i>obtusifolium</i> S. Wats. | | | | | | | CEJ? | |

⁹⁴Synonym: *Chorizanthe corticea* Goodman⁹⁵New record; herbarium specimen @ RSA, SD, SBBC; synonym: *Ceanothus greggii* A. Gray var. *perplexans* (Trel.) Jeps.

APPENDIX I. Continued

| Family/species | ssp./var. and infraname | COR | TOS | MAR | JER | GUA | BEN | GED | NAT |
|--|---|-------------------|-----|-----|-----|-----|------|------|-----|
| <i>Aphanes occidentalis</i> Rydberg | | | | | | | | | |
| <i>Heteromeles arbutifolia</i> (Lindl.) M. Roem. | | COR | TOS | | | GUA | | GED? | |
| Rubiaceae | | | | | | | | | |
| <i>Galium angulosum</i> A. Gray | | | | | | GUA | | | |
| <i>Galium angustifolium</i> Nutt. | ssp. <i>angustifolium</i> | COR | | | | | | | |
| <i>Galium aparine</i> L. | | COR ⁹⁶ | | MAR | | GUA | | GED? | |
| <i>Galium coronadoense</i> Dempster | | COR | | | | | | | |
| <i>Galium stellatum</i> Kellogg | var. <i>eremiticum</i> Hilend & J. Howell | | | | | | | GED | |
| Rutaceae | | | | | | | | | |
| <i>Ruta chalepensis</i> L. | | | | | | GUA | | | |
| Sapindaceae | | | | | | | | | |
| <i>Aesculus parryi</i> A. Gray | | COR | | | | | | | |
| Saxifragaceae | | | | | | | | | |
| <i>Jepsonia multifolia</i> (Greene) Small | | | | | | GUA | | | |
| Saxifragaceae | | | | | | | | | |
| <i>Jepsonia parryi</i> (Torr.) Small. | | COR | | | | | | | |
| Scrophulariaceae | | | | | | | | | |
| <i>Myoporum laetum</i> Forst. f. Ngato.* | | COR | | | | | | | |
| <i>Scrophularia villosa</i> Pennell | | | | | | GUA | | | |
| Simmondsiaceae | | | | | | | | | |
| <i>Simmondsia chinensis</i> (Link) C. Schneider | | | | | | GUA | | GED | NAT |
| Solanaceae | | | | | | | | | |
| <i>Datura discolor</i> Bernh. | | | | | | | | | NAT |
| <i>Datura wrightii</i> Regel | | | | MAR | | | BEN? | | |
| <i>Lycium andersonii</i> A. Gray | | | | MAR | | | | GED? | |
| <i>Lycium brevipes</i> Benth. | var. <i>brevipes</i> | | TOS | MAR | JER | | | GED? | NAT |
| <i>Lycium californicum</i> Nutt. | | COR | TOS | MAR | | GUA | BEN? | GED? | NAT |
| <i>Lycium exsertum</i> A. Gray | | | | MAR | | | BEN | | |
| <i>Lycium fremontii</i> A. Gray | | | | | | GUA | | GED? | |
| <i>Lycopersicon esculentum</i> L.* | | COR | TOS | | | | | | |
| <i>Nicotiana attenuata</i> Torr. | | | | | | GUA | | | |
| <i>Nicotiana clevelandii</i> A. Gray | | COR | TOS | MAR | | | | GED | NAT |
| <i>Nicotiana glauca</i> Grah.* | | | | | | GUA | | | |
| <i>Physalis crassifolia</i> Benth. | var. <i>crassifolia</i> | | TOS | | | | | GED | |
| <i>Solanum americanum</i> Miller* | | | TOS | MAR | | GUA | | GED | |
| <i>Solanum douglasii</i> Dunal | | | | | | GUA | | | |
| <i>Solanum hindistanum</i> Benth. | | | | | | | | | |
| <i>Solanum nodiflorum</i> Jacq.* | | COR | | | | | | | GED |

⁹⁶New record; herbarium specimen @ SD.

APPENDIX I. Continued

| Family/species | ssp./var. and infraname | COR | TOS | MAR | JER | GUA | BEN | CED | NAT |
|---|-------------------------|------------|------------|------------|----------|------------|-----------|------------|-----------|
| <i>Solanum palmieri</i> Vasey & Rose | | | TOS | MAR | | | | | |
| <i>Solanum wallacei</i> (A. Gray) Parish | ssp. <i>clokeji</i> | | | | | GUA | | | |
| Tamaricaceae | | | | | | | | CED | |
| <i>Tamarix ramosissima</i> Ledeb.* | | | | | | | | | |
| Urticaceae | | | | | | | | | |
| <i>Hesperocnide tenella</i> Torrey | | | TOS | MAR | | GUA | | | |
| <i>Parietaria hespera</i> B.D. Hinton | | COR | TOS | | | GUA | | CED? | |
| <i>Urtica urens</i> L.* | | COR | | | | | | | |
| Verbenaceae | | | | | | | | | |
| <i>Glandularia lilacina</i> (Greene) Umber. ⁹⁷ | | | | | | | | CED | |
| Viscaceae | | | | | | | | | |
| <i>Phoradendron densum</i> Torr. ex Trel. | | | | | | GUA | | | |
| Zygophyllaceae | | | | | | | | | |
| <i>Fagonia laevis</i> Standl. | | | | | | | | CED | NAT |
| <i>Viscainoa geniculata</i> (Kellogg) Greene | var. <i>geniculata</i> | | | | | | | CED | |
| NUMBER OF SPECIES | | 129 | 145 | 107 | 8 | 232 | 57 | 266 | 79 |

⁹⁷Synonym: *Verbena lilacina* Greene

APPENDIX 2. Plant species checklist for the 8 California Channel Islands (Anacapa [ANA], San Clemente [CLE], San Miguel [MIG], San Nicolas [NIC], Santa Barbara [BAR], Santa Catalina [CAT], Santa Cruz [CRU], and Santa Rosa [ROS]). An ampersand (&) indicates an extirpated species; a question mark (?) indicates an unvouchered taxon; and an asterisk (*) indicates a nonnative species.

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|---|---|-------------------|-----|------------------|-----|-----|-----|-----|-----|
| FERNS | | | | | | | | | |
| Azollaceae | | | | | | | | | |
| <i>Azolla filiculoides</i> Lam. | | | | CAT | | | | | |
| Blechnaceae | | | | | | | | | |
| <i>Woodwardia fimbriata</i> Sm. | | CLE? ¹ | | CAT ² | | ROS | CRU | | |
| Demnstaedtiaceae | | | | | | | | | |
| <i>Pteridium aquilinum</i> (L.) Kuhn | var. <i>pubescens</i> Underw. | | | CAT | | ROS | CRU | | |
| Dryopteridaceae | | | | | | | | | |
| <i>Dryopteris arguta</i> (Kaulf.) Maxon | | CLE | | CAT | | ROS | CRU | ANA | MIG |
| <i>Polystichum munifolium</i> (Kaulf.) C. Presl | | | | | | ROS | CRU | | |
| Equisetaceae | | | | | | | | | |
| <i>Equisetum hyemale</i> L. | | | | | | ROS | CRU | | |
| | ssp. <i>affine</i> (Engelm.) Calder & Roy L. Taylor | | | | | ROS | CRU | | |
| <i>Equisetum laevigatum</i> A. Braun | | | | | | ROS | CRU | | |
| <i>Equisetum telmateia</i> Ehrh. | ssp. <i>braunii</i> (J. Milde) Hauke | | | CAT | | ROS | CRU | | |
| Polypodiaceae | | | | | | | | | |
| <i>Polypodium californicum</i> Kaulf. | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | |
| <i>Polypodium scolopendri</i> Hook. & Grev. | | | | | | ROS | CRU | | |
| Pteridaceae | | | | | | | | | |
| <i>Adiantum aleuticum</i> (Rupr.) C.A. Paris | | | | | | ROS | CRU | ANA | |
| <i>Adiantum capillus-veneris</i> L. | | | | CAT | | ROS | CRU | ANA | |
| <i>Adiantum jordanii</i> Müll. Hal. | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Aspidotis californica</i> (Hook.) Copel. | | | | CAT | | ROS | CRU | | |
| <i>Cheilanthes cleveandii</i> D.C. Eaton | | | | | | ROS | CRU | | |
| <i>Cheilanthes cooperae</i> D.C. Eaton | | | | | | ROS | CRU | | |
| <i>Cheilanthes neuberryi</i> (D.C. Eaton) Domin | | CLE | | | | | CRU | | |
| <i>Pellaea andromedifolia</i> (Kaulf.) Fée | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Pellaea mucronata</i> (D.C. Eaton) | var. <i>mucronata</i> | CLE? ³ | | CAT | | ROS | CRU | | |
| D.C. Eaton | | | | | | ROS | CRU | ANA | MIG |
| <i>Pentagramma triangularis</i> (Kaulf.) Yatsk., Windham, & E. Wollenw. | ssp. <i>triangularis</i> | CLE | NIC | CAT | | ROS | CRU | ANA | |
| <i>Pentagramma triangularis</i> (Kaulf.) Yatsk., Windham, & E. Wollenw. | ssp. <i>ciscosa</i> (D.C. Eaton) Yatsk. et al. | CLE | | CAT | | ROS | CRU | | |
| Windham, & E. Wollenw. | | | | | | ROS | CRU | | |
| Selaginellaceae | | | | | | | | | |
| <i>Selaginella bigelovii</i> Underw. | | CLE | | CAT | | ROS | CRU | ANA | |

¹Pers. com. E. Howe

²S. Ratay collection

³Pers. com. E. Howe

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|---|---|------------------|-----|-----|-----|-----|-----|-----|-----|
| Woodsiaceae | | | | | | | | | |
| <i>Athyrium filix-femina</i> (L.) Roth | | | | | | ROS | CRU | | |
| <i>Cystopteris fragilis</i> (L.) Bernh. | var. <i>cyclosorum</i> Rupr. | | | | | | CRU | | |
| GYMNOSPERMS | | | | | | | | | |
| Cupressaceae | | | | | | | | | |
| <i>Hesperocyparis macrocarpa</i> (Hartw.) Bartel* | | | | CAT | | ROS | CRU | ANA | |
| Pinaceae | | | | | | | | | |
| <i>Pinus muricata</i> D. Don | var. <i>muricata</i> | | | | | ROS | CRU | | |
| <i>Pinus pinea</i> L.* | | | | | | | CRU | | |
| <i>Pinus radiata</i> D. Don* | | | | | | | | | MIG |
| <i>Pinus torreyana</i> Parry ex Carrière | ssp. <i>insularis</i> J.R. Haller | | | | | ROS | | | |
| MONOCOTS | | | | | | | | | |
| Agavaceae | | | | | | | | | |
| <i>Agave americana</i> L.* | | | | | | | CRU | | |
| Agavaceae | | | | | | | | | |
| <i>Chlorogalum pomeridianum</i> (DC.) Kunth | | | | CAT | | ROS | | | |
| Alliaceae | | | | | | | | | |
| <i>Allium lacunosum</i> S. Watson | var. <i>lacunosum</i> | | | | | ROS | CRU | | |
| <i>Allium praecox</i> Brandegee | | CLE | | CAT | | ROS | CRU | | MIG |
| Amaryllidaceae | | | | | | | | | |
| <i>Amaryllis belladonna</i> L.* | | | | | | | | ANA | MIG |
| <i>Narcissus tazetta</i> L.* | | | | | | | CRU | | |
| Araceae | | | | | | | | | |
| <i>Lemna minor</i> L. | | | | | | | | | MIG |
| <i>Zantedeschia aethiopica</i> (L.) Spreng.* | | | | | | | | | MIG |
| Arecaceae | | | | | | | | | |
| <i>Washingtonia filifera</i> (André) de Bary | | | | | | | CRU | | MIG |
| Asparagaceae | | | | | | | | | |
| <i>Asparagus asparagoides</i> (L.) Druce* | | | NIC | | | | | | |
| <i>Asparagus officinalis</i> L.* | | | | CAT | | | | | |
| Asphodelaceae | | | | | | | | | |
| <i>Asphodelus fistulosus</i> L.* | | CLE ⁴ | | | | | | | |
| Cyperaceae | | | | | | | | | |
| <i>Bolboschoenus maritimus</i> (L.) Palla | ssp. <i>paludosus</i> (A. Nelson) T. Koyama | | | | | | CRU | | MIG |
| <i>Carex barbarae</i> Dewey | | | | | | | CRU | | |
| <i>Carex globosa</i> Boott | | | | CAT | | ROS | CRU | | |
| <i>Carex gracilior</i> Mack. | | | | | | ROS | | | |
| <i>Carex harfordii</i> Mack. | | | | | | ROS | CRU | | |

⁴NY: T.S. Ross, 6137, 04.13.1992

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|--|--|-----|-----|------------------|-----|-----|-----|-----|-----|
| <i>Carex pansa</i> L.H. Bailey | | | | | | ROS | | | MIG |
| <i>Carex praegracilis</i> W. Boott | | | | CAT | | ROS | | | MIG |
| <i>Carex senta</i> Boott | | | | | | | CRU | | |
| <i>Carex subbracteata</i> Mack. | | | | | | ROS | CRU | | |
| <i>Carex triquetra</i> Boott | | | | CAT | | | | | |
| <i>Carex tumulicola</i> Mack. | | CLE | | | | ROS | CRU | | |
| <i>Cyperus eragrostis</i> Lam. | | | | CAT ⁵ | | | | | |
| <i>Cyperus esculentus</i> L. | | CLE | | CAT | | | CRU | | |
| <i>Cyperus involuclatus</i> Rottb.* | | | | | | | | | |
| <i>Cyperus odoratus</i> L.* | | | | CAT ⁶ | | | CRU | | |
| <i>Eleocharis macrostachya</i> Britton | | | | CAT | | ROS | | | |
| <i>Isolepis cernua</i> (Vahl) Roem. & Schult. | | CLE | NIC | | | ROS | | | MIG |
| <i>Schoenoplectus americanus</i> (Pers.) Schinz & R. Keller | | | NIC | CAT ⁷ | | ROS | | | |
| <i>Schoenoplectus californicus</i> (C.A. Mey.) Soják | | | | | | ROS | CRU | | |
| <i>Schoenoplectus pungens</i> (Vahl) Palla | | | | | | ROS | CRU | | |
| Iridaceae | | | | | | | | | |
| <i>Sisyrinchium bellum</i> S. Watson | var. <i>longispicatus</i> (Britton) S.G. Sm. | | | CAT | | ROS | CRU | | MIG |
| Juncaceae | | | | | | | | | |
| <i>Juncus acutus</i> L. | ssp. <i>leopoldii</i> (Pard.) Snogerup | | | CAT | | | | | |
| <i>Juncus balticus</i> Willd. | ssp. <i>ater</i> (Rydb.) Snogerup | | | CAT | | ROS | | | MIG |
| <i>Juncus bufonius</i> L. | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Juncus effusus</i> L. | ssp. <i>pacificus</i> (Fernald & Weigand) Piper & Beattie | | | | | ROS | | | |
| <i>Juncus mexicanus</i> Willd. | | | | CAT | | ROS | CRU | | MIG |
| <i>Juncus patens</i> E. Mey. | | | | | | ROS | CRU | | MIG |
| <i>Juncus phaeocephalus</i> Engelm. | var. <i>phaeocephalus</i> | CLE | | | | ROS | | | |
| <i>Juncus texilis</i> Buchenau | | | | CAT | | | | | |
| <i>Juncus xiphioides</i> E. Mey. | | | | CAT | | | CRU | | |
| <i>Luzula subsessilis</i> (S. Watson) Buchenau ⁵ | | | | | | ROS | CRU | | |
| Liliaceae | | | | | | | | | |
| <i>Calochortus albus</i> (Benth.) Benth. | | | | CAT | | ROS | CRU | | |
| <i>Calochortus catalinae</i> S. Watson | | | | CAT | | ROS | CRU | | |
| <i>Calochortus luteus</i> Lindl. | | | | | | | CRU | | |
| <i>Calochortus splendens</i> Benth. | | | | | | | | | |
| <i>Lilium humboldtii</i> Duch. | ssp. <i>ocellatum</i> (Kellogg) Thorne | | | CAT | | ROS | CRU | ANA | |

⁵RSA: Mark Hoefs, Steven A. Junak, Janet Takara, M. Gay, 2384, Jul 14 1995⁶SBBG: M.L. Hoefs, R.F. Thorne, 2458, Jul 26 1995⁷RSA: Mark Hoefs, R.F. Thorne, Janet Takara Jul 26 1995 2462⁸Synonym: *Luzula comosa* E. Mey.; taxonomic issues

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|--|--------------------------------------|--------------------|-----|-------------------|-----|-----|-----|-----|-----|
| Melanthiaceae | | | | | | | | | |
| <i>Toxicoscordion fremontii</i> (Torr.) Rydb. | | | | | | ROS | CRU | ANA | MIG |
| Orchidaceae | | | | | | | | | |
| <i>Epipactis gigantea</i> Hook. | | CLE? ⁹ | | CAT | | | CRU | | |
| <i>Piperia cooperi</i> (S. Watson) Rydb. | | | | CAT ¹⁰ | | ROS | CRU | | |
| <i>Piperia elongata</i> Rydb. | | | | | | ROS | CRU | | |
| <i>Piperia michaelii</i> (Greene) Rydb. | | | | | | | | | |
| Poaceae | | | | | | | | | |
| <i>Aegilops cylindrica</i> Host* | | | | | | | CRU | | |
| <i>Agrostis exarata</i> Trin. | | | | CAT | | ROS | CRU | | |
| <i>Agrostis pallens</i> Trin. | | CLE | | CAT | | ROS | CRU | ANA | |
| <i>Agrostis stolonifera</i> * L. | | | | CAT | | | | | |
| <i>Amnophila arenaria</i> (L.) Link* | | | NIC | | | | | | |
| <i>Andropogon glomeratus</i> (Walter) Britton et al. | var. <i>scabriglumis</i> C.S. Campb. | | | | | | CRU | | |
| <i>Aristida adscensionis</i> L. | | CLE | | CAT | | ROS | CRU | | |
| <i>Aristida temipes</i> Cav. | | | | | | | CRU | | |
| <i>Arundo donax</i> L.* | var. <i>gentilis</i> (Hemard) Allred | | NIC | | | ROS | CRU | | MIG |
| <i>Avena barbata</i> Link* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Avena fatua</i> L.* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Avena sativa</i> L.* | | CLE | NIC | CAT | | ROS | CRU | | |
| <i>Bothriochloa barbinoadis</i> (Lag.) Herter | | | | CAT | | | | | |
| <i>Brachypodium distachyon</i> (L.) P. Beauv.* | | CLE? ¹¹ | NIC | CAT | | | CRU | | |
| <i>Briza minor</i> L.* | | | | | | | | ANA | |
| <i>Bromus arizonicus</i> (Shear) Stebbins | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Bromus berteroaenus</i> Colla ¹² | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Bromus carinatus</i> Hook. & Arn. | | CLE? | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Bromus maritimus</i> (Piper) Hitchc. | var. <i>carinatus</i> | | | | | ROS | CRU | ANA | MIG |
| <i>Bromus catharticus</i> Vahl* | | CLE ¹³ | NIC | | | ROS | CRU | | |
| * <i>Bromus diandrus</i> Roth* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Bromus hordeaceus</i> L.* ¹⁴ | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Bromus laevipes</i> Shear* | | | | CAT | | ROS | CRU | | |
| <i>Bromus madritensis</i> L.* | | | | CAT | | ROS | CRU | | |
| <i>Bromus vulgaris</i> (Hook.) Shear ^{15*} | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Calamagrostis rubescens</i> Buckley | | | | CAT | | | | | |
| | | | | | | | CRU | | |

⁹Pers. com. E. Howe¹⁰SBBC; S.A. Jumaik Apr. 30 1998 SCa-568¹¹Pers. com. E. Howe¹²Synonym: *Bromus trisii* Desv.; Per Jepson interchange: molecular evidence needed to resolve question of nativity¹³SBBC; T.S. Ross, E. Kellogg Apr 11 1982 6122¹⁴Synonym: *Bromus nudis* L.¹⁵UCSB; Dian Hancock 03/30/1961 146

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|--|-------------------------|--------------------|-----|-------------------|-----|-----|-----|-----|-----|
| <i>Chloris virgata</i> Sw.* | | CLE ¹⁶ | | | | | | | |
| <i>Cortaderia seloana</i> (Schult. & Schult. f.) Asch. & Graebn.* | | CLE? ¹⁷ | NIC | CAT | | | CRU | | MIG |
| <i>Crypsis vaginiflora</i> (Forsk.) Opiz* | | CLE? ¹⁹ | | CAT ¹⁸ | | | | | |
| <i>Crypsis alopecuroides</i> (Piller & Mitterp.) Schrad.* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Cynodon dactylon</i> (L.) Pers.* | | CLE | | CAT | | | CRU | | |
| <i>Dactylis glomerata</i> L.* | | | | | | ROS | | | |
| <i>Danthonia californica</i> Bol. | | | | | | | | | |
| <i>Deschampsia danthonioides</i> (Trin.) Munro | | | | | | | | | |
| <i>Desmanzera rigida</i> (L.) Tutin* | | | | CAT ²⁰ | | | | | |
| <i>Digitaria sanguinalis</i> (L.) Scop.* | | | | CAT ²¹ | | | | | |
| <i>Dissantheium californicum</i> (Nutt.) Benth. | | | | CAT | | | | | |
| <i>Distichlis spicata</i> (L.) Greene | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Distichlis littoralis</i> (Engelm.) H.L. | | | | CAT | | ROS | | | |
| Bell & Columbus | | | | | | | | | |
| <i>Echinochloa crus-galli</i> (L.) P. Beauv.* | | CLE | | CAT | | | | | |
| <i>Ehrharta calycina</i> * Sm. | | CLE | | CAT | | | | | |
| <i>Ehrharta erecta</i> Lam.* | | | | CAT ²² | | | CRU | | |
| <i>Elymus glaucus</i> Buckley | | | | CAT | | ROS | CRU | | |
| <i>Elymus repens</i> (L.) Gould* | | | | | | | | | MIG |
| <i>Elymus condensatus</i> J. Presl | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Elymus pacificus</i> Gould | | | NIC | | | ROS | | | MIG |
| <i>Elymus triticoides</i> Buckley | | | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Festuca arundinacea</i> Schreb.* | | CLE | NIC | CAT | | ROS | CRU | | MIG |
| <i>Festuca perennis</i> (L.) Columbus & J.P. Sm.* | | CLE | NIC | CAT | BAR | ROS | CRU | | MIG |
| <i>Festuca temulenta</i> (L.) Columbus & J.P. Sm.* | | CLE | | CAT | | ROS | CRU | | |
| <i>Festuca bromoides</i> L.* | | CLE | | CAT | | ROS | CRU | ANA | MIG |
| <i>Festuca microstachys</i> Nutt. | | CLE | | CAT | | ROS | CRU | ANA | MIG |
| <i>Festuca myuros</i> L.* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Festuca octoflora</i> Walter | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Gastridium phleoides</i> (Nees & Meyen) C.E. Hubb.* | | CLE | | CAT | | ROS | CRU | | |
| <i>Hainardia cylindrica</i> (Willd.) Greuter* | | CLE ²³ | | CAT ²⁴ | | ROS | CRU | | MIG |

¹⁶CAS: Steven A. Jumaik 9 Nov 1990 SCI-143¹⁷Pers. com. E. Howe¹⁸RSA: Mark Hoefs, R.F. Thorne, Janet Takara, M. Cay Jul 27 1995 2491¹⁹Pers. com. E. Howe²⁰CAS: Peter H. Raven 22 May 1962 17826²¹UCD: Beecher Crumpton 05 10 1968 S322²²SSBG: S.A. Jumaik Jun 13 1998 SCa-743²³SBBG: S.A. Jumaik May 14 1985 SCI-71²⁴SBBG: S.A. Jumaik, M. L. Hoefs Jun 4 1997 SCa-421

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|---|---|-------------------|-----|-------------------|-----|-----|-----|-----|-----|
| <i>Hordeum brachyantherum</i> Nevski | ssp./var. and infraname | | NIC | CAT ²⁵ | | ROS | CRU | ANA | MIG |
| <i>Hordeum depressum</i> (Scribn. & J.G. Sm.) Rydb. | ssp. <i>californicum</i> (Covas & Stebbins) | | NIC | | | ROS | CRU | ANA | MIG |
| <i>Hordeum intercedens</i> Nevski | Bothmer et al. | | NIC | | | ROS | CRU | ANA | MIG |
| <i>Hordeum marinum</i> Huds.* | ssp. <i>gissoneanum</i> (Parl.) Thell. | CLE ²⁶ | NIC | CAT ²⁷ | BAR | ROS | CRU | ANA | MIG |
| <i>Hordeum murinum</i> L.* | ssp. <i>glaucum</i> (Steud.) Tzvelev | CLE ²⁸ | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Hordeum murinum</i> L.* | ssp. <i>leporinum</i> (Link) Arcang. | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Hordeum vulgare</i> L.* | | CLE | NIC | CAT | | ROS | CRU | | |
| <i>Koeleria macrantha</i> (Ledeb.) Schult. | | | | | | ROS | CRU | | |
| <i>Koeleria gerardii</i> (Vill.) Shimmers* | | | | | | ROS | CRU | | |
| <i>Lamarckia aurea</i> (L.) Moench* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Melica imperfecta</i> Trin. | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Muhlenbergia appressa</i> C.O. Goodd. | | CLE | | | | | | | |
| <i>Muhlenbergia microsperma</i> (DC.) Kunth | | CLE ²⁹ | | | | | | | |
| <i>Parapholis incurva</i> (L.) C.E. Hubb.* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Paspalum dilatatum</i> Poir.* | | CLE | | | | ROS | CRU | ANA | MIG |
| <i>Paspalum distichum</i> L. | | | | | | | CRU | | |
| <i>Pennisetum clandestinum</i> Chiov.* | | | NIC | | | ROS | CRU | ANA | MIG |
| <i>Pennisetum setaceum</i> (Forssk.) Chiov.* | | CLE | | | | ROS | CRU | ANA | MIG |
| <i>Phalaris aquatica</i> L.* | | | NIC | CAT | | | CRU | ANA | |
| <i>Phalaris canariensis</i> L. | | | | | | | | | |
| <i>Phalaris caroliniana</i> Walter* | | CLE | NIC | CAT | BAR | | CRU | | |
| <i>Phalaris lemmonii</i> Vasey | | CLE | | | | ROS | | | |
| <i>Phalaris minor</i> Retz.* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Phalaris paradoxae</i> * L. | | CLE | NIC | CAT ³¹ | | ROS | CRU | ANA | MIG |
| <i>Poa annua</i> L.* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Poa palustris</i> L.* | | | | | | | CRU | | |
| <i>Poa howellii</i> Vasey & Scribn. | | | | | | ROS | | | |
| <i>Poa douglasii</i> Nees | | | | | | ROS | | | |
| <i>Poa secunda</i> J. Presl | ssp. <i>secunda</i> | CLE ³² | NIC | CAT ³³ | BAR | ROS | CRU | ANA | MIG |
| <i>Polygogon viridis</i> (Gouan) Breistr.* | | | | | | ROS | CRU | ANA | MIG |
| <i>Polygogon interruptus</i> Kunth* | | CLE | | | | ROS | CRU | ANA | MIG |

25SBBG: L.W. Nuttall May 12 1920 190

26POM: F.A. Munz Apr 8 1923 6613

27SBBG: S.A. Jumaik May 3 2001 SCA-1464

28SBBG: P.H. Raven May 10 1962 17738

29CAS: E.R. Baskley 7 Dec. 1963 6327

30S: Ratay collection

31SBBG: S.A. Jumaik, M.L. Hoels Jun 5 1997 SCA-427

32UC: Peter H. Raven Apr 12 1962 17332

33UC: F.R. Fosberg Mar 20 1931 54310

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|--|-------------------------|---------------------|-----|-------------------|-----|-----|-----|-------------------|-----|
| <i>Polygogon monspeliensis</i> (L.) Desf.* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Schismus arabicus</i> Nees* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Schismus barbatus</i> (L.) Thell.* | | CLE ³⁴ | NIC | CAT ³⁵ | BAR | ROS | CRU | ANA | MIG |
| <i>Stenotaphrum secundatum</i> (Walter) Kuntze* | | | NIC | CAT | | | CRU | | |
| <i>Stipa diegoensis</i> Swallen | | | NIC | | | ROS | CRU | ANA | MIG |
| <i>Stipa ceruua</i> Stebbins & Love | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Stipa lepida</i> Hitchc. | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Stipa pulchra</i> Hitchc. | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Stipa miliacea</i> (L.) Hoover* | var. <i>miliacea</i> | CLE | NIC | CAT ³⁶ | | ROS | CRU | ANA | MIG |
| <i>Triticum aestivum</i> L.* | | CLE | NIC | | | | CRU | ANA | MIG |
| Potamogetonaceae | | | | | | | | | |
| <i>Potamogeton crispus</i> L.* | | | | CAT | | | | | |
| <i>Stuckenia pectinata</i> (L.) Börner | | CLE ^{2,37} | | CAT | | ROS | CRU | | |
| Ruppiaceae | | | | | | | | | |
| <i>Ruppia maritima</i> L. | | CLE | NIC | CAT | | ROS | CRU | | |
| Themiaceae | | | | | | | | | |
| <i>Bloomeria crocea</i> (Torr.) Coville | | | | CAT | | ROS | CRU | | |
| <i>Brodiaea jolonensis</i> Eastw. | | | | CAT | | ROS | CRU | | MIG |
| <i>Brodiaea kinkiensis</i> T.F. Niehaus | | CLE | | | | | | | |
| <i>Dichelostemma capitatum</i> (Benth.) Alph. Wood | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Friteleia clementina</i> Hoover | | CLE | | | | | CRU | | |
| <i>Friteleia hyacinthina</i> (Lindl.) Greene | | | | | | | | | |
| Typhaceae | | | | | | | | | |
| <i>Typha angustifolia</i> L. ³⁸ ? | | CLE | | | | | | | |
| <i>Typha domingensis</i> Pers. | | CLE ³⁹ | NIC | CAT | | ROS | CRU | | MIG |
| <i>Typha latifolia</i> L. | | CLE | NIC | CAT | | | CRU | | |
| Zanichelliaceae | | | | | | | | | |
| <i>Zanichellia palustris</i> L. | | | | CAT ⁴⁰ | | | CRU | | |
| Zosteraceae | | | | | | | | | |
| <i>Phyllospadix scouleri</i> Hook. | | CLE | NIC | CAT | BAR | | CRU | ANA | MIG |
| <i>Phyllospadix torreyi</i> S. Watson | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Zostera marina</i> L. | | CLE ^{2,41} | | CAT | | ROS | CRU | ANA | MIG |
| <i>Zostera pacifica</i> S. Watson | | | NIC | CAT ⁴² | | ROS | CRU | ANA ⁴³ | |

34RSA: E. Kellogg Jun 12 1962 s.n.

35SBBG: S.A. Junaak Mar 22 1998 SCA-512

36SD: Robert F. Thorne Sep 14, 1966 36643

37Pers. com. E. Howe

38Pers. com. E. Howe

39SBBG: P.H. Raven Jul 11 1962 18018

40U.C: Carl B. Wolf May 12 1932

41Pers. com. E. Howe

42RSA: R.F. Thorne Sep 16 1966 36714

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|---|-----------------------------------|----------------------|-----|-------------------|-----|-----|-----|-----|-----|
| BASAL DICOTS | | | | | | | | | |
| Saururaceae | | | | | | | | | |
| <i>Anemopsis californica</i> (Nutt.) Hook. & Arn. | | CLE | NIC | CAT | | | CRU | | |
| EUDICOTS | | | | | | | | | |
| Adoxaceae | | | | | | | | | |
| <i>Sambucus nigra</i> L. | <i>ssp. caerulea</i> (Raf.) Bolla | CLE | | CAT | | ROS | CRU | | |
| Aizoaceae | | | | | | | | | |
| <i>Carpobrotus chilensis</i> (Molina) N.E. Br.* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Carpobrotus edulis</i> * (L.) N.E. Br. | | CLE ⁴⁴ | NIC | CAT ⁴⁵ | | ROS | CRU | ANA | |
| <i>Delosperma litorale</i> * (Kensit) L. Bolus | | CLE ⁴⁶ | NIC | | | | | ANA | |
| <i>Malephora crocea</i> * (Jacq.) Schwantes | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Mesembryanthemum crystallinum</i> L.* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Mesembryanthemum nodiflorum</i> L.* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Sesuvium verrucosum</i> Raf. | | CLE | | | | | | | |
| <i>Tetragonia tetragonioides</i> (Pall.) Kuntze* | | | NIC | | | ROS | CRU | ANA | MIG |
| Amaranthaceae | | | | | | | | | |
| <i>Amaranthus albus</i> L.* | | | | CAT | | ROS | CRU | ANA | |
| <i>Amaranthus blitoides</i> S. Watson | | | | | | ROS | CRU | | |
| <i>Amaranthus deflexus</i> L.* | | | | CAT | | | CRU | | |
| <i>Amaranthus powellii</i> S. Watson | | | | | | | CRU | ANA | |
| <i>Malosma laurina</i> (Nutt.) Abrams | | CLE | | CAT | | | | | |
| <i>Rhus integrifolia</i> (Nutt.) Rothr. | | CLE | | CAT | | ROS | CRU | ANA | MIG |
| <i>Rhus ovata</i> S. Watson | | CLE ^{47,48} | | CAT | | | CRU | | |
| <i>Schinus molle</i> L.* | | CLE | NIC | CAT | | ROS | CRU | | |
| <i>Toxicodendron diversilobum</i> (Torr. & A. Gray) Greene | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| Apiaceae | | | | | | | | | |
| <i>Apiastrum angustifolium</i> Nutt. | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Apium graveolens</i> L.* | | CLE | NIC | | BAR | ROS | CRU | | |
| <i>Berula erecta</i> (Huds.) Coville | | | NIC | | | | CRU | | MIG |
| <i>Bowlesia inaequalis</i> Ruiz & Pav. | | CLE | | CAT | | ROS | CRU | | |
| <i>Conium maculatum</i> L.* | | | NIC | CAT | | | CRU | | |
| <i>Daucus carota</i> L.* | | | NIC | | | | | | |
| <i>Daucus pusillus</i> Michx. | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Foeniculum vulgare</i> Mill.* | | CLE | NIC | CAT | | ROS | CRU | | MIG |
| <i>Lomatium carifolium</i> (Hook. & Arn.) J.M. Coult. & Rose | | | | | | ROS | CRU | | MIG |

43RSA; M.B. Dunkle Aug 20 1940 7671

44RSA; PH. Raven Jul 12 1962 18045

45POM; FR. Fishberg, 4732, Apr 29 1931

46SBBG; S.A. Jumaik Aug 26 1997 SCI-936

47Pers. com. E. Howe

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|---|-------------------------------------|---------------------|-----|-------------------|-----|-----|-----|-----|-----|
| <i>Lomatium insulare</i> (Eastw.) Munz | | CLE | NIC | | | | | | |
| <i>Sanicula arguta</i> J.M. Coult. & Rose | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Sanicula crassicaulis</i> DC. | | CLE ^{2,48} | | CAT | | ROS | CRU | | |
| <i>Sanicula hoffmannii</i> (Munz) R.H. Shan & Constance | | | | | | ROS | CRU | | |
| <i>Torilis arvensis</i> (Huds.) Link* | | | | | | | CRU | | |
| <i>Torilis nodosa</i> (L.) Gaertn.* | | | NIC | CAT | | ROS | CRU | | MIG |
| <i>Yabea microcarpa</i> (Hook. & Arn.) Koso-Pol. | | CLE ⁴⁹ | | CAT ⁵⁰ | | | CRU | | |
| Apocynaceae | | | | | | | | | |
| <i>Asclepias fascicularis</i> Decne. | | | | CAT | | ROS | CRU | | |
| <i>Funastrum cynanchoides</i> (Decne.) Schltr. | | | | CAT | | | | | |
| <i>Vinca major</i> L.* | var. <i>hartwegii</i> (Vail) Krings | | | CAT | | | CRU | | |
| Asteraceae | | | | | | | | | |
| <i>Achillea millefolium</i> L. | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Achyrochaena mollis</i> Schauer | | CLE | | CAT ⁵¹ | | ROS | CRU | | |
| <i>Acurtia microcephala</i> DC. | | | | CAT | | ROS | CRU | | |
| <i>Agoseris apargioides</i> (Less.) Greene | | | | | | ROS | | | |
| <i>Agoseris grandiflora</i> (Nutt.) Greene | | | | | | ROS | CRU | | MIG |
| <i>Agoseris heterophylla</i> (Nutt.) Greene | | | | | | ROS | | | |
| <i>Ambligopappus pusillus</i> Hook. & Arn. | | | | | | ROS | CRU | ANA | MIG |
| <i>Ambrosia chamissonis</i> (Less.) Greene | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Ambrosia psilostachya</i> DC. | | CLE | NIC | CAT | | ROS | CRU | | MIG |
| <i>Anthemis cotula</i> L.* | | | | | | ROS | CRU | | |
| <i>Arctium minus</i> (Hill) Bernh.* | | | | | | ROS | | | |
| <i>Argyranthemum frutescens</i> (L.) Sch. Bip.* | | | | | | ROS | | | |
| <i>Artemisia californica</i> Less. | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Artemisia douglasiana</i> Besser | | | | CAT | | ROS | CRU | | |
| <i>Artemisia dracunculata</i> L. | | | | CAT | | | | | |
| <i>Artemisia nesiotica</i> P.H. Raven | | CLE | NIC | | BAR | | | | |
| <i>Baccharis glutinosa</i> Pers. ⁵² | | CLE | | CAT | | ROS | CRU | | MIG |
| <i>Baccharis salicina</i> Torr. & A. Gray | | CLE ⁵³ | | CAT | BAR | | | | |
| <i>Baccharis pilularis</i> DC. | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Baccharis plummerae</i> A. Gray | ssp. <i>plummerae</i> | | | | | | CRU | ANA | ANA |

⁴⁸Pers. com. E. Howe⁴⁹POM: PA. Munz Apr 9 1923:6652⁵⁰UCD: Robert F. Thorne 04 28 1966 36224⁵¹CAS: Tim Ross, J. Takara, Stacey Otte 24 April 1993 6946⁵²Synonym: *Baccharis douglasii* DC.⁵³DS: Ira L. Wiggins Feb. 22, 1949 11961

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|--|---|----------------------|-----|-------------------|-------------------|-----|-----|-----|-----|
| <i>Baccharis salicifolia</i> (Ruiz & Pav.) Pers. | | | | | | | | | |
| <i>Baccharis sarothroides</i> A. Gray | | CLE ⁵⁴ | NIC | CAT ⁵⁵ | | ROS | CRU | ANA | MIG |
| <i>Bahopsis laciniata</i> (A. Gray) E. E. Schilling & Panero ⁵⁶ ? | | CLE | | CAT | | | | | |
| <i>Blennosperma nanum</i> (Hook.) S.F. Blake | var. <i>nanum</i> | | | | | | CRU | | |
| <i>Brockelia californica</i> (Torr. & A. Gray) A. Gray | | CLE ⁵⁷ | NIC | CAT | | | CRU | ANA | |
| <i>Calceuthla officinalis</i> L.* | | | | | | | | | |
| <i>Carduus pycnocephalus</i> L.* | | | | CAT ⁵⁸ | | ROS | | | MIG |
| <i>Centaurea melitensis</i> L.* | | CLE | NIC | CAT | BAR ⁵⁹ | ROS | CRU | ANA | MIG |
| <i>Centaurea solstitialis</i> L.* | | | NIC | CAT | | | CRU | | |
| <i>Centaurea benedicta</i> (L.) L.* | | | | | | | CRU | | |
| <i>Centromadia pungens</i> (Hook. & Arn.) Greene | | | | CAT ⁶⁰ | | | | | |
| <i>Centromadia fitchii</i> (A. Gray) Greene | | | | | | ROS | CRU | | |
| <i>Chaenactis glabruscula</i> | var. <i>lanosa</i> (DC.) H.M. Hall | | | | | | | | |
| <i>Cichorium intybus</i> L.* | | | | | | | CRU | | |
| <i>Cirsium brevistylum</i> Cronquist | | | | | | | CRU | | |
| <i>Cirsium occidentale</i> (Nutt.) Jeps. | var. <i>californicum</i> (A. Gray) D.J. Keil & C.E. Fumer | | | CAT ⁶¹ | | ROS | CRU | | |
| <i>Cirsium occidentale</i> (Nutt.) Jeps. | var. <i>coulteri</i> | CLE ⁶² | | | | | | | |
| <i>Cirsium occidentale</i> (Nutt.) Jeps. | var. <i>occidentale</i> | CLE ⁶³ | NIC | CAT ⁶⁴ | | ROS | CRU | | MIG |
| <i>Cirsium occidentale</i> (Nutt.) Jeps. | var. <i>venustum</i> (Greene) | | | | | ROS | | | |
| <i>Cirsium ochrocentrum</i> A. Gray* | | | | | | ROS | | | |
| <i>Cirsium vulgare</i> (Savi) Ten.* | | | | CAT | | ROS | CRU | | MIG |
| <i>Constancea nevini</i> (A. Gray) B.G. Baldwin | | | | CAT | BAR | | | | |
| <i>Corethrogyne filaginifolia</i> (Hook. & Arn.) Nutt. | | | | CAT ⁶⁵ | | ROS | CRU | ANA | MIG |
| <i>Cotula australis</i> (Spreng.) Hook. f.* | | | | CAT | BAR | ROS | CRU | ANA | |
| <i>Cotula coronopifolia</i> L.* | | CLE ⁶⁶ | | CAT | | ROS | CRU | ANA | MIG |
| <i>Cymara cardunculus</i> L.* | | CLE ^{67,67} | NIC | CAT | | ROS | CRU | ANA | MIG |
| | | | NIC | CAT ⁶⁸ | | | | | |

54SD: Peter H. Raven May 08, 1962 17629

55HSC: James Henrickson Jan 1973 8113

56Pers. com. E. Howe

57CAS: Steven A. Junak 2 Oct 1996 SCI- 703

58SBBG: S.A. Junak, M.L. Hoefs, R.N. Phalbrick, SCA-1532, May 18 2001

59RSA: R.F.Thorne, 37492, Apr 28 1968, suspected incorrect georeferencing

60RSA:Mark Hoefs, 309, Jun 4 1973

61SD: Robert F. Thorne, F. Everett Jun 23, 1965 35015

62SBBG: T. Ross, O. Mistretta, M. Hammit May 20 1991 5325

63UCR: Steve Boyd, T.S. Ross, Laurel Arnselth Apr 7 1990 4271

64UCR: FR. Fosberg Apr 29 1931 S-4709

65SBBG: E.R. Bladley Sep 23 1961 4740

66SBBG: S.A. Junak Feb 25 1997 SCI-724

67Pers. com. E. Howe

68SBBG: S.A. Junak, M.L. Hoefs, K. Kirkland

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|--|---|-------------------|-------------------|-------------------|-----|-----|-----|-----|------|
| <i>Deinandra clementina</i> (Brandege) B.G. Baldwin | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | |
| <i>Deinandra fasciculata</i> (DC.) Greene | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | |
| <i>Deinandra increscens</i> (D.D. Keck) B.G. Baldwin | ssp. <i>increscens</i> | | | | BAR | ROS | CRU | ANA | |
| <i>Delairea odorata</i> Lem.* | | | | | | ROS | | ANA | |
| <i>Encelia californica</i> Nutt. | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | |
| <i>Ericameria ericoides</i> (Less.) Jeps. | | | | | | ROS | CRU | ANA | |
| <i>Ericameria palmieri</i> (A. Gray) H.M. Hall | var. <i>pachylepis</i> (H.M. Hall) G.L. Nesom | | | CAT | | | | | |
| <i>Erigeron bonariensis</i> L.* | | CLE ⁶⁹ | NIC | CAT ⁷⁰ | BAR | ROS | CRU | ANA | MIG |
| <i>Erigeron canadensis</i> L. | | CLE ⁷¹ | NIC | CAT ⁷² | BAR | ROS | CRU | ANA | MIG |
| <i>Erigeron foliosus</i> Nutt. | var. <i>foliosus</i> | | | CAT | | ROS | CRU | ANA | MIG |
| <i>Erigeron glaucus</i> Ker Gawl. | | | | | | ROS | CRU | ANA | MIG |
| <i>Erigeron sanctarum</i> S. Watson | | | | | | ROS | CRU | | |
| <i>Eriophyllum confertiflorum</i> (DC.) A. Gray | var. <i>confertiflorum</i> | CLE | | CAT ⁷³ | | ROS | CRU | ANA | MIG |
| <i>Eriophyllum staechadifolium</i> Lag. | | | | | | ROS | CRU | ANA | MIG |
| <i>Erythra radulina</i> (A. Gray) G.L. Nesom | | | | | | ROS | CRU | | |
| <i>Euthamia occidentalis</i> Nutt. | | | | | | | | ANA | |
| <i>Gnaphaeta ustulata</i> (Nutt.) Holub | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Glebionis coronaria</i> (L.) Spach* ⁷⁴ | | CLE | NIC | CAT | | | CRU | | |
| <i>Gnaphalium palustre</i> Nutt. | | | | | | | CRU | | |
| <i>Grindelia camporum</i> Greene | | | | CAT | | ROS | CRU | ANA | |
| <i>Grindelia hirsutula</i> Hook. & Arn. | | | NIC ⁷⁵ | | | ROS | | | |
| <i>Grindelia stricta</i> DC. | | | | | | ROS | CRU | ANA | MIG? |
| <i>Hazardia cana</i> (A. Gray) Greene | var. <i>platyphylla</i> (Greene) M.A. Lane | CLE | | | | ROS | | | |
| <i>Hazardia detonsa</i> (Greene) Greene | | | | | | ROS | CRU | ANA | |
| <i>Hazardia squarrosa</i> (Hook. & Arn.) Greene | var. <i>grindelioides</i> (DC.) W.D. Clark | | | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Hedynotis cretica</i> (L.) Dum. Cours.* | | CLE ⁷⁶ | | | | | | | |
| <i>Helianthus puberulum</i> DC. | | | | CAT ⁷⁷ | | | | | |
| <i>Helianthus annuus</i> L.* | | CLE ⁷⁸ | NIC | CAT ⁷⁹ | | | CRU | ANA | |
| <i>Helminthotheca echioides</i> (L.) Holub* | | | NIC | CAT | | | CRU | | |
| <i>Hesperetax sparsiflora</i> (A. Gray) Greene | | CLE ⁸⁰ | | | | ROS | | | |

⁶⁹SBBC: S.A. Jumaik, SCL-681, Sep 29 1996⁷⁰POM: ER. Fosberg, 5364, Jul 10 1931⁷¹SBBC: S.A. Jumaik Oct 28 1987 SCL-981⁷²SBBC: S.A. Jumaik, K. Kirkland, M. Boshman Oct 21 1998 SCA-813⁷³RSA: Mark Hoefs, D. Probst Mar 14 1973 119⁷⁴Synonym: *Chrysanthemum coronarium* L.⁷⁵UC: R.M. Beauchamp and H.A. Wier Jun 29 1978⁷⁶CAS: Steven A. Jumaik 16 May 1996 SCL-470⁷⁷DS: A.J. McClatchie Sept. 1893 s.n.⁷⁸SBBC: H.L. Ferguson, R.M. Beauchamp Sep 15 1979 14⁷⁹POM: L.W. Nuttall, s.n., May 22 1920⁸⁰SBBC: S.A. Jumaik Mar 13 1987 SCL-784

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|--|---|-------------------|-----|-------------------|-----|-----|-----|-----|-----|
| <i>Heterotheca grandiflora</i> Nutt. | | CLE | NIC | CAT | | ROS | CRU | | MIG |
| <i>Hieracium argutum</i> Nutt. | | CLE | NIC | CAT | | ROS | CRU | | MIG |
| <i>Hypochoeris glabra</i> L.* | | CLE | | CAT | | ROS | CRU | ANA | |
| <i>Hypochoeris radicata</i> L.* | | CLE | NIC | | | | | | |
| <i>Isoetes menziesii</i> (Hook. & Arn.) G.L. Nesom | var. <i>decumbens</i> (Greene) G.L. Nesom | CLE | | CAT ⁸¹ | | | | | MIG |
| <i>Isoetes menziesii</i> (Hook. & Arn.) G.L. Nesom | var. <i>menziesii</i> | CLE ⁸² | NIC | CAT ⁸³ | | | | | MIG |
| <i>Isoetes menziesii</i> (Hook. & Arn.) G.L. Nesom | var. <i>sedoides</i> (Greene) G.L. Nesom | CLE | NIC | CAT ⁸⁴ | | ROS | CRU | ANA | MIG |
| <i>Isoetes menziesii</i> (Hook. & Arn.) G.L. Nesom | var. <i>vernonioides</i> (Nutt.) G.L. Nesom | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Jaumea carnosa</i> (Less.) A. Gray | | | | CAT | | ROS | CRU | | MIG |
| <i>Lactuca saligna</i> L.* | | | | CAT ⁸⁵ | | ROS | CRU | | MIG |
| <i>Lactuca serriola</i> L.* | | CLE ⁸⁶ | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Laennecia coulteri</i> (A. Gray) G.L. Nesom | | CLE ⁸⁷ | | CAT | BAR | | | | MIG |
| <i>Lasthenia californica</i> Lindl. | | CLE | | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Lasthenia glabrata</i> Lindl. | | | | CAT | BAR | ROS | CRU | | MIG |
| <i>Lasthenia gracilis</i> (DC.) Greene | ssp. <i>coulteri</i> (A. Gray) Ornduff | | NIC | CAT | | | | | MIG |
| <i>Lajita platyglossa</i> (Fisch. & C.A. Mey.) A. Gray | | CLE | | CAT | | ROS | CRU | | MIG |
| <i>Lepidospartum squamatum</i> (A. Gray) A. Gray | | | | CAT | | | CRU | | |
| <i>Leptosyne gigantea</i> Kellogg | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Logfia arizonica</i> (A. Gray) Holub | | CLE | | CAT | BAR | | | | |
| <i>Logfia flaginoides</i> (Hook. & Arn.) Morefield | | CLE | | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Logfia gallica</i> (L.) Coss. & Germ.* | | CLE ⁸⁸ | | CAT | | ROS | CRU | | |
| <i>Madia exigua</i> (Sm.) A. Gray | | | | CAT | | | CRU | | |
| <i>Madia gracilis</i> (Sm.) Applegate | | | | CAT | | | CRU | | |
| <i>Madia sativa</i> Molina* | | CLE | | CAT | | | CRU | | |
| <i>Malacothrix clevelandii</i> A. Gray | | | | CAT | | ROS | | | |
| <i>Malacothrix coulteri</i> Harv. & A. Gray | | | | | | ROS | CRU | | |
| <i>Malacothrix foliosa</i> A. Gray | ssp. <i>crispifolia</i> W.S. Davis | | | | | | | ANA | |
| <i>Malacothrix foliosa</i> A. Gray | ssp. <i>foliosa</i> | CLE | | | | | | | |
| <i>Malacothrix foliosa</i> A. Gray | ssp. <i>philbrickii</i> W.S. Davis | | | | BAR | | | | |
| <i>Malacothrix foliosa</i> A. Gray | ssp. <i>polycephala</i> W.S. Davis | | NIC | | | | | | |
| <i>Malacothrix incana</i> (Nutt.) Torr. & A. Gray | | CLE | NIC | | | ROS | CRU | | MIG |
| <i>Malacothrix incanora</i> Greene | | | | | | ROS | | | MIG |
| <i>Malacothrix junakii</i> W.S. Davis | | | | | | | CRU | ANA | |

⁸¹ Collections of this taxa have been made on Catalina, but there are taxonomic issues

⁸² UC: T.S. Brandegee Aug 25 1894

⁸³ SD: E.R. Blakey Sep 24, 1961 4781

⁸⁴ UC: E.R. Fosberg Apr 29 1931 S4707

⁸⁶ RSA: Steven A. Junak Jul 17 1998 SCA-777

⁸⁷ SBBG: S.A. Junak Sep 28 1996 SCL-673

⁸⁸ SBBG: S.A. Junak May 15 1985 SCL-74

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|--|---|-------------------|-----|-------------------|-------------------|-----|-----|-----|-----|
| <i>Malacothrix saxatilis</i> (Nutt.) Torr. & A. Gray | | | | | | | | | |
| <i>Malacothrix saxatilis</i> (Nutt.) Torr. & A. Gray* | var. <i>implicata</i> (Eastw.) H.M. Hall | | NIC | | | ROS | CRU | ANA | MIG |
| <i>Malacothrix similis</i> W.S. Davis & P.H. Raven | var. <i>tenuifolia</i> (Nutt.) A. Gray | CLE ⁸⁹ | NIC | CAT | | | CRU | ANA | MIG |
| <i>Malacothrix squalida</i> Greene | | | | | | | CRU | ANA | |
| <i>Matricaria occidentalis</i> Greene | | | | CAT ⁹⁰ | | | | | |
| <i>Matricaria discoides</i> DC.* | | | | CAT ⁹¹ | | ROS | CRU | ANA | |
| <i>Micropus californicus</i> Fisch. & C.A. Mey. | var. <i>californicus</i> | | | CAT ⁹² | | ROS | CRU | | |
| <i>Microseris douglasii</i> (DC.) Sch. Bip. | ssp. <i>douglasii</i> | CLE | NIC | | | ROS | CRU | | |
| <i>Microseris douglasii</i> (DC.) Sch. Bip. | ssp. <i>tenella</i> (A. Gray) | | NIC | | | ROS | CRU | | MIG |
| | K.L. Chambers | | | | | | | | |
| <i>Microseris douglasii</i> (DC.) Sch. Bip. | ssp. <i>platycarpa</i> (A. Gray) | CLE | | CAT | | | | | |
| | K.L. Chambers | | | | | | | | |
| <i>Microseris elegans</i> A. Gray | | CLE | NIC | | | | CRU | | MIG |
| <i>Munzothamnus blairii</i> (Munz & I.M. Johnston) P.H. Raven | | CLE | | | | | | | |
| <i>Pentachaeta lyonii</i> A. Gray | | | | CAT | | | | | |
| <i>Perityle emoryi</i> Torr. | | CLE | | CAT | BAR | ROS | CRU | ANA | |
| <i>Pluchea odorata</i> (L.) Cass. | | | | CAT | | | CRU | | |
| <i>Pluchea sericea</i> (Nutt.) Coville | | | | CAT | | | CRU | | |
| <i>Pseudognaphalium biolettii</i> Anderb. | | CLE | NIC | CAT | BAR ⁹³ | ROS | CRU | ANA | MIG |
| <i>Pseudognaphalium californicum</i> (DC.) Anderb. | | CLE ⁹⁴ | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Pseudognaphalium beneolens</i> (Davidson) Anderb. | | CLE | NIC | CAT | | ROS | CRU | | MIG |
| <i>Pseudognaphalium microcephalum</i> (Nutt.) Anderb. | | CLE ⁹⁵ | NIC | CAT | BAR | ROS | CRU | ANA | |
| <i>Pseudognaphalium luteoalbum</i> (L.) Hilliard & B.L. Burtt* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Pseudognaphalium ramosissimum</i> (Nutt.) Anderb. | | | | CAT | | | CRU | | |
| <i>Pseudognaphalium stramineum</i> (Kunth) Anderb. | | | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Psilocarphus brevissimus</i> Nutt. | var. <i>brevissimus</i> | CLE ⁹⁶ | | | | | | | |
| <i>Psilocarphus tenellus</i> Nutt. | | CLE | | CAT | | ROS | CRU | | |
| <i>Rafinesquia californica</i> Nutt. | | CLE | | CAT | BAR | ROS | CRU | ANA | |
| <i>Senecio glomeratus</i> Poir.* | | | | | | | CRU | | |
| <i>Senecio aphanactis</i> Greene | | | | CAT | | ROS | CRU | ANA | MIG |
| <i>Senecio flaccidus</i> Less. | | | | CAT | | | CRU | | |
| <i>Senecio lyonii</i> | var. <i>douglasii</i> (DC.) B.L. Turner & T.M. Barkley A. Gray | CLE | | CAT | | ROS | CRU | | MIG |
| | | CLE | | CAT | | | | | |

89RSA: Steven A. Junak, Mary C. Hochberg, H.L. Ferguson Jul 28 1981 scl13

90SD: Robert F. Thorne Apr 29, 1966 36278

91SBBG: R.F. Thorne Apr 29 1966 36290

92RSA: Tim Ross, Janet Takara, S. Otte Apr 24 1993 6957

93NPS Park flora checklist

94UC: Tim Ross Apr 16 1992 6207

95SDSU: R. M. Beauchamp March 19, 1967 315

96RSA: Tim Ross, Orlando Mistretta, Mike Hammitt May 18 1991 5184

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|---|---|--------------------|-----|--------------------|-------------------|-----|--------------------|-----|-----|
| <i>Senecio vulgaris</i> L.* | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Silybum maritimum</i> (L.) Gaerth.* | | CLE | NIC | CAT | BAR ⁹⁷ | ROS | CRU | ANA | MIG |
| <i>Solidago velutina</i> DC. | ssp. <i>californica</i> (Nutt.) Semple | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Sonchus asper</i> (L.) Hill* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Sonchus oleraceus</i> L.* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Sonchus tenerrimus</i> L.* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Stebbinsoseris heterocarpa</i> (Nutt.) K.L. Chambers ⁹⁸ | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Stephanomeria cichoriacea</i> A. Gray | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Stephanomeria diegensis</i> Gottlieb | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Stephanomeria exigua</i> Benth. | ssp. <i>coronaria</i> (Greene) Gottlieb | CLE | NIC | CAT ⁹⁹ | | ROS | CRU | ANA | MIG |
| <i>Stephanomeria virgata</i> Benth. | ssp. <i>virgata</i> | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Stipocline gnaphaloides</i> Nutt. | | CLE ¹⁰⁰ | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Symphytotrichum chilense</i> (Nees) G.L. Nesom | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Symphytotrichum subulatum</i> (Michx.) G.L. Nesom | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Taraxacum erythrospermum</i> Besser* | | CLE | NIC | CAT ¹⁰¹ | | ROS | CRU ¹⁰² | ANA | MIG |
| <i>Taraxacum officinale</i> F.H. Wigg.* | | CLE | NIC | CAT ¹⁰³ | | ROS | CRU | ANA | MIG |
| <i>Thelesperma megapotamicum</i> (Spreng.) Kuntze* | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Tragopogon porrifolius</i> L.* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Uropappus lindleyi</i> (DC.) Nutt. ¹⁰⁴ | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Venegasia carpesioides</i> DC. | | CLE | NIC | CAT | BAR& | ROS | CRU | ANA | MIG |
| <i>Xanthium spinosum</i> L. ¹⁰⁵ | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Xanthium strumarium</i> L. ¹⁰⁶ | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| Bataceae | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Batis maritima</i> L. | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| Berberidaceae | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Berberis pinnata</i> Lag. | ssp. <i>insularis</i> Munz | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| Boraginaceae | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Ansinckia intermedia</i> Fisch. & C.A. Mey. | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Ansinckia menziesii</i> (Lehm.) A. Nelson & J.F. Macbr. | | CLE ¹⁰⁷ | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Ansinckia spectabilis</i> Fisch. & C.A. Mey. | var. <i>spectabilis</i> | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Cryptantha intermedia</i> (A. Gray) Greene | var. <i>intermedia</i> | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |

⁹⁷SBBG: R.N. Phalbrck Mar 18 1968 B68-20
⁹⁸Synonym: *Microseris heterocarpa* (Nutt.) K.L. Chambers
⁹⁹RSA: FR. Fosberg. 4460. Apr. 3 1931
¹⁰⁰BSA: Orlando Mistretta. Apr. 5 1982 206
¹⁰¹SD: Robert F. Thorne Sep 15, 1966 36698
¹⁰²SD: Robert F. Thorne, P. Everett. 36823. Apr 18, 1967
¹⁰³SBBG: M.L. Hoels, R.F. Thorne Apr 6 1996 2665
¹⁰⁴Synonym: *Microseris linearifolia* (DC.) Sch. Bip.
¹⁰⁵Native status on islands unknown
¹⁰⁶Native status on islands unknown
¹⁰⁷UCR: J.R. Ekhoif May 16 2001 s.n.

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|--|--|--------------------|-----|--|-----|-----|--------------------|-----|-----|
| <i>Cryptantha cleveandii</i> Greene | | CLE | | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Cryptantha leiocarpa</i> (Fisch. & C.A. Mey.) Greene | | CLE | | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Cryptantha maritima</i> (Greene) Greene | | CLE | NIC | CAT ¹⁰⁸ | BAR | ROS | CRU | | MIG |
| <i>Cryptantha micromeres</i> (A. Gray) Greene | | CLE | | CAT | | ROS | CRU | | |
| <i>Cryptantha microstachys</i> (A. Gray) Greene | | CLE | | CAT | | ROS | CRU | | |
| <i>Cryptantha muricata</i> (Hook. & Arn.) A. Nelson & J.F. Macbr. | | CLE | NIC | CAT ¹⁰⁹ CAT ¹¹⁰ | | | CRU | | |
| <i>Cryptantha traskiae</i> I.M. Johnst. | | CLE | | CAT | | | CRU | | |
| <i>Cryptantha wigginii</i> I.M. Johnst. | | CLE | | CAT | | | CRU | | |
| <i>Emmenanthe penduliflora</i> Benth. | var. <i>penduliflora</i> | CLE | | CAT | | | CRU | | |
| <i>Eriodictyon traskiae</i> Eastw. | ssp. <i>traskiae</i> | CLE | | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Eucryphia chrysanthemifolia</i> (Benth.) Greene | var. <i>chrysanthemifolia</i> | CLE | | CAT | | | CRU | | |
| <i>Harpagonella palmieri</i> A. Gray | var. <i>oculatum</i> (A. Heller) | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Heliotropium curassavicum</i> L. | I.M. Johnst. ex Tidestr. | CLE ¹¹¹ | | | | | | | |
| <i>Nama stenocarpum</i> A. Gray | | | | CAT | | | | | |
| <i>Nemophila menziesii</i> Hook. & Arn. | | | NIC | | | ROS | CRU | | MIG |
| <i>Nemophila pedunculata</i> Benth. | | | NIC | | | ROS | CRU | ANA | |
| <i>Pectocarya linearis</i> (Ruiz & Pav.) DC. | ssp. <i>ferocitula</i> (I.M. Johnst.) Thorne | CLE ¹¹² | NIC | CAT | | ROS | CRU | ANA | |
| <i>Pectocarya pentacillata</i> (Hook. & Arn.) A. DC. | | | | CAT | | | CRU | | |
| <i>Phacelia cicutaria</i> Greene | var. <i>hispida</i> J.T. Howell | CLE | | CAT | | ROS | CRU | ANA | |
| <i>Phacelia hubbiji</i> (J.F. Macbr.) L.M. Garrison ¹¹³ | | | | | | ROS | CRU | | |
| <i>Phacelia distans</i> Benth. | | | | | | ROS | CRU | ANA | MIG |
| <i>Phacelia floribunda</i> Greene | | | | | | ROS | CRU | ANA | |
| <i>Phacelia grandiflora</i> (Benth.) A. Gray | | | | CAT | | ROS | CRU ¹¹⁴ | | MIG |
| <i>Phacelia insularis</i> Munz | var. <i>insularis</i> | | | CAT | | ROS | | | |
| <i>Phacelia lyonii</i> A. Gray | | CLE | | CAT | | | | | |
| <i>Phacelia ramosissima</i> Douglas ex Lehm. | | | | | | ROS | CRU | | MIG |
| <i>Phacelia viscida</i> (Lindl.) Torr. | | | | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Pholistoma auritum</i> (Lindl.) Lilja | var. <i>auritum</i> | CLE? | | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Pholistoma racemosum</i> (A. Gray) Constance | | CLE | | CAT | BAR | | CRU | | |
| <i>Plagiobothrys acanthocarpus</i> (Piper) I.M. Johnst. | | | | CAT ¹¹⁵ | | | CRU | | |
| <i>Plagiobothrys canescens</i> Benth. | | CLE | | CAT | | ROS | CRU | ANA | |

¹⁰⁸UC: T.S. Brandegee May 20 1890¹⁰⁹SD: R. Mitchell Beauchamp, M. Douglas Mar. 24. 1973: 3229¹¹⁰UC: Michael G. Simpson, Lori L. Simpson April 21 2012: 3682¹¹¹RSA: E. Kellogg Jun 28 1992: s.n.¹¹²BBG: S.A. Junak Mar 7 1987: SCI-732¹¹³Synonym: *Phacelia cicutaria* Greene var. *hubbiji* (J.F. Macbr.) J.T. Howell¹¹⁴fn Wallace 1985 but not NPS list¹¹⁵UCR: T.S. Ross Apr 22 1983: 6895

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|---|---|--------------------|-----|--------------------|-----|-----|--------------------|-----|-----|
| <i>Plagiobothrys collinus</i> (Phil.) I.M. Johnston. | | CLE | | CAT | | | CRU | ANA | MIG |
| <i>Plagiobothrys collinus</i> (Phil.) I.M. Johnston. | var. <i>gracilis</i> (I.M. Johnston.) Higgins | CLE ¹¹⁶ | | CAT ¹¹⁷ | | | CRU ¹¹⁸ | ANA | MIG |
| Brassicaceae | var. <i>californicus</i> (A. Gray) Higgins | | | | | | | | |
| <i>Athyrium pusillus</i> (Hook.) Greene | | CLE | | CAT | | | CRU | | |
| <i>Boechera hoffmannii</i> (Munz) Al-Shehbaz | | CLE | | CAT | | ROS | CRU | ANA | MIG |
| <i>Brassica nigra</i> (L.) W.D.J. Koch* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Brassica tournefortii</i> Gouan* | | CLE | NIC | CAT | | ROS | CRU | | MIG |
| <i>Brassica rapa</i> L.* | | CLE | NIC | CAT | | ROS | CRU | | MIG |
| <i>Cakile edentula</i> (Bigelow) Hook.* | | CLE | NIC | CAT | | ROS | CRU | | MIG |
| <i>Cakile maritima</i> Scop.* | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Capsella bursa-pastoris</i> (L.) Medik.* | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Cardamine californica</i> (Nutt.) Greene | | CLE | | CAT | | ROS | CRU | ANA | MIG |
| <i>Cardamine oligosperma</i> Nutt. | | CLE | | CAT | | ROS | CRU | ANA | MIG |
| <i>Caulanthus lasiophyllus</i> (Hook. & Arn.) Payson ¹¹⁹ | | CLE | | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Descurainia pinnata</i> (Walter) Britton | | CLE | | CAT | | ROS | CRU | ANA | MIG |
| <i>Dithyrea maritima</i> (Davidson) Davidson | | CLE | NIC | CAT ¹²⁰ | | | | | MIG |
| <i>Draba cuneifolia</i> Nutt. ex Torr. & A. Gray | | CLE | NIC | CAT | | | CRU | | MIG |
| <i>Erysimum amnophitum</i> A. Heller | | | | | | ROS | | | MIG |
| <i>Erysimum cheiri</i> (L.) Crantz.* | | | | CAT | | | | | |
| <i>Erysimum insulare</i> Greene | | | | | | ROS | CRU | ANA | MIG |
| <i>Hirschfeldia incana</i> (L.) Lagr.-Fossat ¹²¹ * | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Hornungia procumbens</i> (L.) Hayek | | CLE ¹²² | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Lepidium draba</i> L.* | | CLE | NIC | CAT | | ROS | CRU | | |
| <i>Lepidium lasiocarpum</i> Nutt. | | CLE | NIC | CAT | | | | | |
| <i>Lepidium latipes</i> Hook. | | CLE | | CAT | | | CRU | | |
| <i>Lepidium nitidum</i> Nutt. | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Lepidium oblongum</i> Small | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Lepidium strictum</i> (S. Watson) Rattan* | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Lepidium virginicum</i> L. ¹²⁴ * | | CLE | | CAT ¹²³ | | | | | |
| <i>Lobularia maritima</i> (L.) Desv.* | ssp. <i>menziesii</i> (DC.) Thell. | CLE | NIC | CAT | | | CRU | | MIG |
| <i>Nasturtium officinale</i> W.T. Aiton ¹²⁶ | | CLE ¹²⁵ | NIC | CAT | | | CRU | | MIG |

¹¹⁹POM: P.A. Munz Apr 10 1923 6705
¹¹⁷TRSA: R.F. Thorne, R.C. Rollins, D. Propst, R. Carolin, 36761, Mar 19 1967
¹¹⁸UC: T.S. Brandegee, Apr 1888
¹¹⁹S: synonym: *Gaultheria lasiophylla* (Hook. & Arn.) Greene
¹²⁰N: No specimens in CCH; extirpated from Catalina? per: <http://www.rareplants.cmpa.org/detail/571.html>
¹²¹S: synonym: *Brassica genticulata* (Desf.) Benth.
¹²²Pers. com. E. Howe
¹²³S:BBG: S.A. Junak, M.L. Hoeft, J. Takara Mar 28 1997 SCA-388
¹²⁴S: synonym: *Lepidium virginicum* var. *pubescens* (Greene) Thell.; *Lepidium virginicum* var. *robinsonii* (Thell.) C.L. Hitchc.
¹²⁵S:BBG: S.A. Junak, M.C. Hochberg, H. Ferguson Jul 28 1981 SCI-17
¹²⁶N: Native status on islands unknown, doubtful

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | | | | | | | | | |
|---|-------------------------|-----|--------------------|-----|-----|-----|-----|-----|--|-----|
| | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG | | |
| <i>Raphanus raphanistrum</i> L.* | CLE | | CAT | | ROS | CRU | | | | |
| <i>Raphanus sativus</i> L.* | CLE | NIC | CAT | | ROS | CRU | | | | MIG |
| <i>Sibara filifolia</i> (Greene) Greene | CLE ¹²⁷ | | CAT | | | CRU | | | | |
| <i>Sinapis arvensis</i> L. ^{125*} | CLE ^{2,129} | | CAT | | | CRU | | | | |
| <i>Sisymbrium altissimum</i> L.* | | | | | | | | | | |
| <i>Sisymbrium irio</i> L.* | CLE | NIC | CAT | | | | ANA | | | |
| <i>Sisymbrium officinale</i> (L.) Scop.* | | | CAT | | | CRU | | | | MIG |
| <i>Sisymbrium orientale</i> L.* | CLE ¹³⁰ | NIC | CAT | | | | ANA | | | |
| <i>Thysanocarpus conchuliferus</i> Greene | | | | | | CRU | | | | |
| <i>Thysanocarpus curvipes</i> Hook. | CLE ¹³¹ | | CAT | | | CRU | | | | |
| <i>Thysanocarpus laciniatus</i> Nutt. | CLE | | CAT | | ROS | CRU | | | | |
| <i>Tropidocarpum gracile</i> Hook. | CLE | | CAT | | | | | | | |
| <i>Turritis glabra</i> L. | | | | | | CRU | | | | |
| Cactaceae | | | | | | | | | | |
| <i>Bergencactus emoryi</i> (Engelm.) Britton & Rose | CLE | | CAT | | | | | | | |
| <i>Cylindropuntia prolifera</i> (Engelm.) F.M. Knuth | CLE | NIC | CAT | BAR | ROS | CRU | ANA | | | |
| <i>Opuntia ficus-indica</i> (L.) Mill.* | CLE | NIC | CAT | | | CRU | ANA | | | |
| <i>Opuntia littoralis</i> (Engelm.) Cockerell | CLE | NIC | CAT | BAR | ROS | CRU | ANA | | | MIG |
| <i>Opuntia oricola</i> Philbrick | CLE | NIC | CAT | BAR | ROS | CRU | ANA | | | MIG |
| Campanulaceae | | | | | | | | | | |
| <i>Cithopsis diffusa</i> A. Gray | | | | | | CRU | | | | |
| <i>Triodanis biflora</i> (Ruiz & Pav.) Greene | | | CAT | | ROS | CRU | | | | |
| Caprifoliaceae | | | | | | | | | | |
| <i>Lonicera hispidula</i> (Lindl.) Torr. & A. Gray | | | | | | CRU | | | | |
| <i>Lonicera interrupta</i> Benth. | CLE | | CAT | | ROS | CRU | | | | |
| <i>Lonicera subspicata</i> Hook. & Arn. | | | | | | CRU | | | | |
| <i>Symphoricarpos mollis</i> Nutt. | | | CAT | | ROS | CRU | | | | |
| Caryophyllaceae | | | | | | | | | | |
| <i>Cardionema ramosissimum</i> (Weinm.) A. Nelson & J.F. Macbr. | | | | | ROS | CRU | | | | MIG |
| <i>Cerastium glomeratum</i> Thuill.* | | | | | | | | | | |
| <i>Herniaria hirsuta</i> L.* | CLE | | CAT | | ROS | CRU | ANA | | | MIG |
| <i>Loeflingia squarrosa</i> Nutt. | CLE | NIC | CAT ¹³² | BAR | ROS | | | | | MIG |
| <i>Mniuraria douglasii</i> (Torr. & A. Gray) Mattf. | CLE | NIC | CAT | | ROS | CRU | | | | |
| <i>Polycarpon depressum</i> Nutt. | CLE | | CAT | | ROS | CRU | | | | MIG |

127RSA: Orlando Mistretta Apr 5 1992 142

128Synonym: *Brassica kabrer* (DC.) L.C. Wheeler

129Pers. comm. E. Howe

130SBBG: S.A. Junak May 29 1996 SCI-545

131UC: Tim Ross Apr 14 1992 6153

132SBBG: S.A. Junak Mar 27 1997 SCA-346

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|---|--|-----|-----|--------------------|-----|-----|-----|-----|-----|
| <i>Polycarpon tetraphyllum</i> (L.) L.* | | | | CAT | | ROS | CRU | ANA | MIG |
| <i>Sagina apetala</i> Ard. | | | NIC | | | ROS | CRU | ANA | MIG |
| <i>Sagina decumbens</i> (Elliott) Torr. & A. Gray | ssp. <i>occidentalis</i> (S. Watson) G.E. Crow | | | CAT | | ROS | CRU | ANA | MIG |
| <i>Silene antirrhina</i> L. | | CLE | | CAT | | ROS | CRU | ANA | MIG |
| <i>Silene gallica</i> L.* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Silene laciniata</i> Cav. | ssp. <i>laciniata</i> | CLE | | CAT | | ROS | CRU | ANA | MIG |
| <i>Silene coniflora</i> Oth | | | | CAT | | | CRU | | |
| <i>Spergularia arvensis</i> L.* | | | | CAT | | ROS | | | |
| <i>Spergularia bocconi</i> (Scheele) Graebn.* | | CLE | NIC | CAT | BAR | | CRU | ANA | |
| <i>Spergularia macrotheca</i> (Cham. & Schltdl.) Heynh. | ssp. <i>macrotheca</i> | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Spergularia marina</i> (L.) Besser | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | |
| <i>Spergularia villosa</i> (Pers.) Cambess.* | | CLE | | CAT | | ROS | CRU | | |
| <i>Stellaria media</i> (L.) Vill.* | | CLE | | CAT | | ROS | CRU | ANA | MIG |
| <i>Stellaria nitens</i> Nutt. | | | | CAT | | ROS | CRU | | |
| <i>Aphanisma blitoides</i> Moq. | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Arthrocnemum subterminale</i> (Parish) Standl. | | CLE | | CAT | | ROS | CRU | | MIG |
| <i>Atriplex argentea</i> Nutt. | ssp. <i>expansa</i> (S. Watson) S.L. Welsh & Reveal | CLE | NIC | CAT | | ROS | CRU | | |
| <i>Atriplex californica</i> Moq. | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Atriplex canescens</i> (Pursh) Nutt.* | var. <i>canescens</i> | | NIC | | | | | | |
| <i>Atriplex coulteri</i> (Moq.) D. Dietr. | | CLE | | CAT | | ROS | CRU | ANA | MIG |
| <i>Atriplex lentiformis</i> (Torr.) S. Watson | (S. Watson) H.M. Hall & Clem. | CLE | NIC | CAT | | | CRU | ANA | |
| <i>Atriplex leucophylla</i> (Moq.) D. Dietr. | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Atriplex pacifica</i> A. Nelson | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | |
| <i>Atriplex semibaccata</i> R. Br.* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Atriplex serenana</i> Abrams | var. <i>davidsonii</i> (Standl.) Munz | | | CAT ¹³³ | | ROS | CRU | | |
| <i>Atriplex serenana</i> Abrams | var. <i>serenana</i> | | | CAT | | | | | |
| <i>Atriplex prostrata</i> DC.* | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Atriplex watsonii</i> Abrams | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Bassia hyssopifolia</i> (Pall.) Kuntze* | | CLE | NIC | CAT | | | | | |
| <i>Beta vulgaris</i> L.* | | CLE | | CAT | | ROS | CRU | ANA | MIG |
| <i>Chenopodium berlandieri</i> Moq. | | | NIC | | | ROS | CRU | ANA | |
| <i>Chenopodium californicum</i> (S. Watson) S. Watson | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Chenopodium murale</i> L.* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Dysphania ambrosioides</i> (L.) Mosyakin & Clemants* | | CLE | NIC | CAT | | ROS | CRU | ANA | |
| <i>Dysphania multifida</i> (L.) Mosyakin & Clemants* | | CLE | | | | ROS | CRU | | MIG |
| <i>Monolepis nuttalliana</i> (Schult.) Greene | | CLE | | | BAR | ROS | CRU | | |
| <i>Salicornia depressa</i> Standl. | | | NIC | | | ROS | CRU | ANA | MIG |
| <i>Salicornia pacifica</i> Standl. | | CLE | | CAT | | ROS | CRU | ANA | MIG |

133RSA: Blanche Trask Mar 1901 s.n.

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|---|--|---------------------|-------|--------------------|-----|-----|--------------------|-----|-------|
| <i>Salsola australis</i> R. Br. ^{134*} | | CLE | NIC | CAT | | ROS | CRU | | |
| <i>Suaeda calceoliformis</i> (Hook.) Moq. | | CLE | NIC | CAT ¹³⁵ | | ROS | CRU | ANA | MIG |
| <i>Suaeda taxifolia</i> (Standl.) Standl. | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| Cistaceae | | | | | | | | | |
| <i>Helianthemum greenii</i> B.L. Rob. | | CLE | NIC | CAT | | ROS | CRU | | MIG & |
| <i>Helianthemum scoparium</i> Nutt. | | CLE? ¹³⁶ | | CAT | | ROS | CRU | | |
| Cleomeaceae | | | | | | | | | |
| <i>Peritoma arborea</i> (Nutt.) H.H. Iltis | | CLE | | CAT | | ROS | | | |
| Convolvulaceae | | | | | | | | | |
| <i>Calystegia macrostegia</i> (Greene) Brummitt | ssp. <i>amplissima</i> Brummitt | CLE | NIC | CAT | BAR | | | | |
| <i>Calystegia macrostegia</i> (Greene) Brummitt | ssp. <i>cyclostegia</i> (House) Brummitt | | | CAT | | | | | |
| <i>Calystegia macrostegia</i> (Greene) Brummitt | ssp. <i>intermedia</i> (Abrams) Brummitt | | | CAT | | ROS | CRU | ANA | MIG |
| <i>Calystegia macrostegia</i> (Greene) Brummitt | ssp. <i>macrostegia</i> | | NIC & | CAT | | | | | |
| <i>Calystegia malacophylla</i> (Greene) Munz* | ssp. <i>pedicellata</i> (Eps.) Munz | | | CAT | | ROS | CRU | | MIG |
| <i>Calystegia soldanella</i> (L.) R. Br.* | | CLE | NIC | CAT | | ROS | CRU | | MIG |
| <i>Convolvulus arvensis</i> L.* | | | NIC | CAT | | ROS | CRU | | |
| <i>Convolvulus simulans</i> L. M. Perry | | CLE | | CAT | | ROS | CRU | | |
| <i>Cressa truxillensis</i> Kunth | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Cuscuta californica</i> Hook. & Arn. | | CLE | | CAT | | ROS | CRU ¹³⁷ | | |
| <i>Cuscuta campestris</i> Yünek. | | | | CAT ¹³⁸ | | | | | |
| <i>Cuscuta occidentalis</i> Millsp. | | | | CAT | | | | | |
| <i>Cuscuta pacifica</i> Costea & M. Wright | var. <i>pacifica</i> | | | CAT | | ROS | CRU | ANA | |
| <i>Dichondra occidentalis</i> House | | | | CAT | | ROS | CRU | | MIG |
| <i>Ipomoea cairica</i> (L.) Sweet* | | | | CAT | | | | | |
| Cornaceae | | | | | | | | | |
| <i>Cornus glabrata</i> Benth. | | | | CAT | | | | | |
| Crassulaceae | | | | | | | | | |
| <i>Crassula aquatica</i> (L.) Schönl. | | | | CAT | | | | | |
| <i>Crassula connata</i> (Ruiz & Pav.) A. Berger | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Crassula ovata</i> (Mill.) Druce* | | CLE | | CAT | | | | | |
| <i>Dudleya blochmaniae</i> (Eastw.) Moran | ssp. <i>blochmaniae</i> | | | | | | CRU | | |
| <i>Dudleya blochmaniae</i> (Eastw.) Moran | ssp. <i>insularis</i> (Moran) Moran | | | | | ROS | | ANA | |
| <i>Dudleya caespitosa</i> (Haw.) Britton & Rose | | | | | | ROS | CRU | | MIG |
| <i>Dudleya candelabrum</i> Rose | | | | | | ROS | CRU | | MIG |
| <i>Dudleya greenii</i> Rose | | | | CAT | | ROS | CRU | | MIG |
| <i>Dudleya gnoma</i> S. W. McCabe | | | | | | ROS | | | |

¹³⁴Synonym: *Salsola tragus* L.¹³⁵SBBG: S.A. Juncak Oct 22 1998 SCA-823¹³⁶pers. comm. E. Howe¹³⁷SBBG: M.R. Benedict Sep 30 1969¹³⁸RSA: George B. Grant 4541

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|--|--|---------------------|--------------------|--------------------|-----|-----|-----|-----|--------------------|
| <i>Dudleya nesiotica</i> (Moran) Moran | | | | | | | CRU | | |
| <i>Dudleya traskiae</i> (Rose) Moran | | | | | BAR | | | | |
| <i>Dudleya vires</i> (Rose) Moran | ssp. <i>hassei</i> (Rose) Moran | | | CAT | | | | | |
| <i>Dudleya vires</i> (Rose) Moran | ssp. <i>insularis</i> | | NIC | CAT | | | | | |
| <i>Dudleya vires</i> (Rose) Moran | ssp. <i>virens</i> | CLE | | | | | | | |
| Crossosomataceae | | | | | | | | | |
| <i>Crossosoma californicum</i> Nutt. | | CLE | NIC | CAT | | | | | |
| Cucurbitaceae | | | | | | | | | |
| <i>Cucurbita foetidissima</i> Kunth | | | | | | | CRU | | |
| <i>Marah fabacea</i> (Naudin) Greene | | CLE ¹³⁹ | NIC ¹⁴⁰ | CAT ¹⁴¹ | | | CRU | | MIG ¹⁴² |
| <i>Marah macrocarpa</i> (Greene) Greene | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| Ericaceae | | | | | | | | | |
| <i>Arbutus menziesii</i> Pursh | | | | CAT | | | CRU | | |
| <i>Arctostaphylos catalinae</i> P.V. Wells | | | | | | ROS | | | |
| <i>Arctostaphylos confertiflora</i> Eastw. | | | | | | | CRU | | |
| <i>Arctostaphylos insularis</i> Parry | | | | | | ROS | CRU | | |
| <i>Arctostaphylos crustacea</i> Eastw. | ssp. <i>insulicola</i> (P.V. Wells) V.T. Parker et al. | | | | | ROS | CRU | | |
| <i>Arctostaphylos crustacea</i> Eastw. | ssp. <i>subcordata</i> (Eastw.) V.T. Parker et al. | | | | | ROS | CRU | | |
| <i>Arctostaphylos viridissima</i> (Eastw.) McMinn | | | | | | | CRU | | |
| <i>Comarostaphylos diversifolia</i> (Parry) Greene | ssp. <i>planifolia</i> (Jeps.) G.D. Wallace | | | CAT | | ROS | CRU | ANA | |
| <i>Vaccinium ocatum</i> Pursh | | | | | | ROS | CRU | | |
| <i>Xylococcus bicolor</i> Nutt. | | | | CAT | | | | | |
| Euphorbiaceae | | | | | | | | | |
| <i>Chamaesyce maculata</i> (L.) Small* | | CLE ¹⁴³ | | | BAR | | CRU | ANA | |
| <i>Chamaesyce serpyllifolia</i> (Pers.) Small* | | CLE | | | | | | | |
| <i>Chamaesyce serpyllifolia</i> (Pers.) Small | | | | CAT | | | | | |
| <i>Croton setigerus</i> Hook. | | CLE | | CAT | | ROS | CRU | | |
| <i>Euphorbia crenulata</i> Engelm. | | | | CAT | | | | | |
| <i>Euphorbia misera</i> Benth. | | CLE | | CAT | | | CRU | | |
| <i>Euphorbia pepplus</i> L.* | | CLE | | CAT | | ROS | CRU | | |
| <i>Euphorbia spathulata</i> Lam. | | CLE | | CAT | | | | | |
| <i>Ricinus communis</i> L.* | | CLE | NIC | CAT | | | | | |
| <i>Stillingia linearifolia</i> S. Watson | | | | CAT | | | CRU | | |
| Fabaceae | | | | | | | | | |
| <i>Acacia cyclops</i> C. Don* | | CLE? ¹⁴⁴ | | | | | | | |

139)RSA: FH. Elmore Feb 19 1939 422

140)SBBG: M.B. Dunkle Jul 26 1939 8359

141)SD: Darley F. Howe Feb 24 1968 4486

142)SBBG: M.B. Dunkle Jul 31 1939 8402

143)RSA: Steven A. Junak Nov 9 1990 SC1144

144)Pers. com. E. Howe

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|---|--|-----|-----|--------------------|-----|--------------------|-----|-----|--------------------|
| <i>Acacia decurrens</i> Willd.* | | | | CAT | | | | | |
| <i>Acacia dealbata</i> Link* | | | | CAT | | | CRU | | |
| <i>Acacia melanoxylon</i> R. Br.* | | | | CAT | | | CRU | | |
| <i>Acemisanon americanus</i> (Nutt.) Rydb. ¹⁴⁵ | var. <i>americanus</i> | | | CAT | | | CRU | | |
| <i>Acemison argophyllus</i> (A. Gray) Brouillet | var. <i>adsurgens</i> (Dumkle) | CLE | | CAT | BAR | ROS ¹⁴⁶ | CRU | | MIG ¹⁴⁷ |
| <i>Acemison argophyllus</i> (A. Gray) Brouillet | var. <i>argenteus</i> (Dumkle) | CLE | NIC | CAT | | | | | |
| <i>Acemison argophyllus</i> (A. Gray) Brouillet | var. <i>niveus</i> (Greene) | | | CAT | | | | | |
| <i>Acemison brachycarpus</i> (Benth.) D.D. Sokoloff ¹⁴⁸ | | | | CAT | | | | | |
| <i>Acemison dendroideus</i> (Greene) Brouillet | var. <i>dendroideus</i> | CLE | | CAT | | ROS | CRU | ANA | |
| <i>Acemison dendroideus</i> (Greene) Brouillet | var. <i>veitchii</i> (Greene) Brouillet | | | CAT | | | | | |
| <i>Acemison dendroideus</i> (Greene) Brouillet | var. <i>traskiae</i> (Abrams) Brouillet | CLE | | CAT | | ROS | CRU | | |
| <i>Acemison grandiflorus</i> (Benth.) Brouillet | var. <i>grandiflorus</i> | | | CAT | | | | | |
| <i>Acemison heermannii</i> (Durand & Hilg.) Brouillet | | | | CAT | | | | | |
| <i>Acemison maritimus</i> (Nutt.) D.D. Sokoloff ¹⁴⁹ | var. <i>maritimus</i> | | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Acemison micranthus</i> (Torr. & A. Gray) Brouillet ¹⁵⁰ | | CLE | | CAT | | ROS | CRU | | |
| <i>Acemison parviflorus</i> (Benth.) D.D. Sokoloff ¹⁵¹ | | | | CAT | | | | | |
| <i>Acemison strigosus</i> (Nutt.) Brouillet | | CLE | | CAT | | ROS | CRU | ANA | MIG |
| <i>Acemison vorangelianus</i> (Fisch. & C.A. Mey.) D.D. Sokoloff ¹⁵² | | | | CAT | | ROS | CRU | ANA | MIG |
| <i>Albizia lophantha</i> (Willd.) Benth.* | | | | | | | CRU | | |
| <i>Astragalus curtipes</i> A. Gray | | | | | | ROS | | | MIG |
| <i>Astragalus didymocarpus</i> Hook & Arn. | var. <i>didymocarpus</i> | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Astragalus gambelians</i> E. Sheld. | | | | CAT | | | CRU | | |
| <i>Astragalus miguelensis</i> Greene | | CLE | | | | ROS | CRU | ANA | MIG |
| <i>Astragalus nevaditii</i> A. Gray | | CLE | | | | | | | |
| <i>Astragalus traskiae</i> Eastw. | | | | | BAR | | | | |
| <i>Astragalus trichopodus</i> (Nutt.) A. Gray | var. <i>lonchus</i> (M.E. Jones) Barnely | | NIC | CAT | | ROS | CRU | | ANA |
| <i>Astragalus trichopodus</i> (Nutt.) A. Gray | var. <i>trichopodus</i> | | | CAT | | | | | |
| <i>Caesalpinia spinosa</i> (Molina) Kuntze* | | | | CAT ¹⁵³ | | | | | |
| <i>Coronilla valentina</i> L.* | | | | CAT | | | | | |
| <i>Genista linifolia</i> L.* | | | | CAT | | | | | |
| <i>Genista monspessulana</i> (L.) L.A.S. Johnson* | | | | CAT | | | | | |

¹⁴⁵Synonym: *Lotus purshianus* Clem. & E.G. Clem.¹⁴⁶CAS: L.R. Abrams, L.L. Wiggins 30 June, 1931 239¹⁴⁷DS: E.R. Blakey 3 April 1962 5081¹⁴⁸Synonym: *Lotus humistratus* Greene; Wallace listed *L. humistratus* on Cruz, but NPS Park Flora did not¹⁴⁹Synonym: *Lotus submarginatus* Greene¹⁵⁰Synonym: *Lotus hamatus* Greene¹⁵¹Synonym: *Lotus micranthus* Benth.¹⁵²Synonym: *Lotus urangeliensis* Fisch. & C.A. Mey.; *Lotus subpinnatus* Lag. misappl.¹⁵³RSA: Tim Ross Apr 23, 1993 6934

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|--|--|--------------------|--------------------|-----|-----|-----|-----|-----|-----|
| <i>Lathyrus odoratus</i> L.* | | CLE ¹⁵⁴ | | | | | | | |
| <i>Lathyrus tingitanus</i> L.* | | | | CAT | | | | | |
| <i>Lathyrus vestitus</i> Nutt. | var. <i>alefeldii</i> (T.C. White) Isley | | | CAT | | | | | |
| <i>Lathyrus vestitus</i> Nutt. | var. <i>vestitus</i> | CLE | | CAT | | ROS | CRU | ANA | |
| <i>Lotus corniculatus</i> L.* | | | | CAT | | | CRU | | |
| <i>Lupinus albus</i> Benth. | var. <i>douglasii</i> (J. Agardh) C.P. Sm. | | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Lupinus arboreus</i> Sims | | | | CAT | | ROS | CRU | ANA | MIG |
| <i>Lupinus bicolor</i> Lindl. | | | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Lupinus chamissonis</i> Eschsch. | | | | CAT | | ROS | CRU | ANA | MIG |
| <i>Lupinus concinnus</i> J. Agardh | | CLE ¹⁵⁵ | | CAT | | ROS | CRU | | |
| <i>Lupinus guadalupensis</i> Greene | | CLE | | | | | | | |
| <i>Lupinus hirsutissimus</i> Benth. | | CLE | | CAT | | ROS | CRU | ANA | |
| <i>Lupinus microcarpus</i> Sims | | | | CAT | | ROS | CRU | ANA | MIG |
| <i>Lupinus succulentus</i> K. Koch | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Lupinus truncatus</i> Nutt. | | CLE | | CAT | | ROS | CRU | ANA | |
| <i>Lupinus varicolor</i> Steud. | | | | CAT | | ROS | CRU | ANA | MIG |
| <i>Medicago polymorpha</i> L.* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Medicago sativa</i> L.* | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Melilotus albus</i> Medik.* | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Melilotus indicus</i> (L.) All.* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Pickeringia montana</i> Nutt. | var. <i>montana</i> | | | | | | CRU | | |
| <i>Pisum sativum</i> L.* | | | NIC | | | | CRU | | |
| <i>Robinia pseudoacacia</i> L.* | | | NIC | | | | CRU | | |
| <i>Spartium junceum</i> L.* | | | NIC | CAT | | | CRU | | |
| <i>Trifolium albopurpureum</i> Torr. & A. Gray | | | NIC ¹⁵⁶ | CAT | | ROS | CRU | | |
| <i>Trifolium barbigerum</i> Torr. | | | | | | ROS | | | MIG |
| <i>Trifolium ciliolatum</i> Benth. | | | | CAT | | ROS | CRU | | |
| <i>Trifolium depauperatum</i> Desv. | var. <i>amplectens</i> (Torr. & A. Gray) McDermott | CLE | | CAT | | | | | |
| <i>Trifolium depauperatum</i> Desv. | var. <i>truncatum</i> (Greene) Isely | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Trifolium fucatum</i> Lindl. | | CLE | | CAT | | ROS | CRU | ANA | MIG |
| <i>Trifolium gracilentum</i> Torr. & A. Gray | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Trifolium hirtum</i> All. | | CLE | | | | | | | |
| <i>Trifolium macraei</i> Hook. & Arn. | | | NIC | CAT | | ROS | CRU | | |
| <i>Trifolium microcephalum</i> Pursh | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Trifolium microdon</i> Hook. & Arn. | | | NIC | CAT | | | | | |
| <i>Trifolium palmieri</i> S. Watson | | CLE | NIC | CAT | BAR | | | ANA | |
| <i>Trifolium repens</i> L.* | | | NIC | CAT | | | | | |

¹⁵⁴SD: Steven A. Junak May 19, 1997 SCL877¹⁵⁵SBBC: M.R. Benedict Jun 26 1971¹⁵⁶JEPS93564 (SN-846).det. var. *dichotomum* in TJM2) by: Michael Vincent in 2005.

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|--|-------------------------------|--------------------|-----|--------------------|-----|-----|-----|-----|-----|
| <i>Trifolium variegatum</i> Nutt. | | | | | | | CRU | | |
| <i>Trifolium willdenovii</i> Spreng. | var. <i>major</i> Loja. | CLE ¹⁵⁷ | | CAT ¹⁵⁸ | BAR | ROS | CRU | ANA | MIG |
| <i>Vicia americana</i> Willd. | | | | | | ROS | CRU | | MIG |
| <i>Vicia benghalensis</i> L.* | | | | CAT ¹⁵⁹ | | | CRU | ANA | |
| <i>Vicia hassei</i> S. Watson | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Vicia ludoviciana</i> Torr. & A. Gray | ssp. <i>ludoviciana</i> | CLE ¹⁶⁰ | | CAT ¹⁶¹ | | ROS | CRU | ANA | |
| <i>Vicia sativa</i> L.* | ssp. <i>nigra</i> (L.) Erhart | | NIC | | | ROS | | | |
| <i>Vicia sativa</i> L.* | ssp. <i>sativa</i> | | NIC | | | ROS | CRU | ANA | |
| <i>Vicia villosa</i> Roth | (Host) Corb. | | NIC | CAT ¹⁶² | | | | | |
| <i>Quercus agrifolia</i> Née | var. <i>agrifolia</i> | | | | | ROS | CRU | | |
| <i>Quercus chrysolepis</i> Liebm. | | CLE | | CAT | | ROS | CRU | ANA | |
| <i>Quercus douglasii</i> Hook. & Arn. | | | | CAT | | | CRU | | |
| <i>Quercus engelmannii</i> Greene | | | | CAT | | ROS | | | |
| <i>Quercus kelloggii</i> Newb. | | | | | | | CRU | | |
| <i>Quercus lobata</i> Née | | | | CAT | | ROS | CRU | | |
| <i>Quercus xmacdonaldii</i> Greene | | | | CAT | | ROS | CRU | | |
| <i>Quercus pacifica</i> Nixon & C.H. Mull. | | | | CAT | | ROS | CRU | | |
| <i>Quercus parvula</i> Greene | | | | | | | CRU | | |
| <i>Quercus tomentella</i> Engelm. | var. <i>parvula</i> | | | CAT | | ROS | CRU | ANA | |
| Frankeniaceae | | | | | | | | | |
| <i>Frankenia salina</i> (Molina) I.M. Johnston | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| Garryaceae | | | | | | | | | |
| <i>Garrya veitchii</i> Kellogg | | | | | | | CRU | | |
| Gentianaceae | | | | | | | | | |
| <i>Zelmeria daruji</i> (Jeps.) G. Mans. | | CLE | NIC | CAT | | ROS | CRU | | |
| <i>Zelmeria venusta</i> (A. Gray) G. Mans. | | | | | | | | | |
| Geraniaceae | | | | | | | | | |
| <i>California macrophylla</i> (Hook. & Arn.) J.J. Aldasoroet | | | | CAT ¹⁶³ | | | | | |
| <i>Erodium botrys</i> (Cav.) Berol.* | | | NIC | CAT ¹⁶⁴ | | ROS | CRU | | |
| <i>Erodium brachycarpum</i> (Godr.) Thell.* | | CLE ¹⁶⁵ | | CAT ¹⁶⁶ | | ROS | | | |
| <i>Erodium cicutarium</i> (L.) Aiton* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Erodium moschatum</i> (L.) Aiton* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |

157B&A: PH. Raven May 8 1962 17614

1581C: FR. Fishberg Mar 25 1931 s4367

159&BBG: PH. Raven May 20 1962 17789

1601C&R: Steve Boyd, T.S. Ross, L. Arnsed. Apr 7 1990 4260

161&SBBG: R.F. Thorne Mar 7 1966 35954

162&SD: Robert F. Thorne, D. Propst May 29, 1968 37691

163&GH: W.A. Wallace

164&SBBG: S.A. Junak, K. Kirkland, L. Vorobik May 16 1998 SCA-697

165&BBG: T. Ross, O. Misreeta, M. Hannitt May 18 1991 5191

166&BBG: S.A. Junak, M.L. Hoefs, K. Kirkland Apr 5 1998 SCA-549

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|--|-------------------------|---------------------|-----|-----|-----|-----|-----|-----|--------------------|
| <i>Erodium texanum</i> A. Gray | | | | CAT | | | | | |
| <i>Geranium carolinianum</i> L. | | | | CAT | | ROS | CRU | | |
| <i>Geranium dissectum</i> L.* | | | | | | ROS | | | |
| <i>Geranium molle</i> L.* | | | | | | | CRU | | |
| <i>Pelargonium ×hortorum</i> L.H. Bailey* | | CLE ¹⁶⁷ | NIC | CAT | | ROS | CRU | | MIG ¹⁶⁸ |
| <i>Pelargonium peltatum</i> (L.) L'Her.* | | | NIC | | | | | | |
| Grossulariaceae | | | | | | | | | |
| <i>Ribes malvaceum</i> Sm. | var. <i>malvaceum</i> | CLE | | CAT | | ROS | CRU | ANA | |
| <i>Ribes viburnifolium</i> A. Gray | | | | | | | | | |
| <i>Ribes thacherianum</i> (Jepps.) Munz | | | | | | | CRU | | |
| Juglandaceae | | | | | | | | | |
| <i>Juglans californica</i> S. Watson* | | | | CAT | | | CRU | | |
| <i>Juglans regia</i> L.* | | | | | | | | | |
| Lamiaceae | | | | | | | | | |
| <i>Clinopodium douglasii</i> (Benth.) Kuntze | | | | CAT | | ROS | CRU | | |
| <i>Lamium amplexicaule</i> L.* | | | | | | | CRU | | |
| <i>Lepechinia fragrans</i> (Greene) Epling | | | | CAT | | ROS | CRU | | |
| <i>Marrubium vulgare</i> L.* | | CLE | NIC | CAT | | ROS | CRU | | MIG |
| <i>Mentha aquatica</i> L.* | | | | CAT | | | | | |
| <i>Mentha spicata</i> L.* | | | | CAT | | | CRU | | |
| <i>Nepeta cataria</i> L.* | | | | CAT | | | | | |
| <i>Salvia apiana</i> Jepps. | | | | CAT | | | | | |
| <i>Salvia brandegeei</i> Munz | | | | | | ROS | | | |
| <i>Salvia columbariae</i> Benth. | | CLE | | CAT | | ROS | CRU | | |
| <i>Salvia leucophylla</i> Greene | | | | | | | CRU | | |
| <i>Salvia mellifera</i> Greene | | CLE? ¹⁶⁹ | | CAT | | ROS | CRU | ANA | |
| <i>Scutellaria tuberosa</i> Benth. | | | | | | | CRU | | |
| <i>Stachys ajugoides</i> Benth. | | | | | | ROS | | | MIG |
| <i>Stachys bullata</i> Benth. | | | | | | ROS | CRU | ANA | |
| <i>Trichostema lanceolatum</i> Benth. | | | | CAT | | | | | |
| Linaceae | | | | | | | | | |
| <i>Hesperolinon micranthum</i> (A. Gray) Small | | | | CAT | | | | | |
| Loasaceae | | | | | | | | | |
| <i>Mentzelia affinis</i> Greene | | CLE | NIC | CAT | | ROS | CRU | | |
| <i>Mentzelia micrantha</i> (Hook. & Arn.) Torr. & A. | | CLE | | CAT | | | CRU | | |
| Lythraceae | | | | | | | | | |
| <i>Ammannia robusta</i> Heer & Regel | | | | CAT | | | | | |

¹⁶⁷SBBG: T. Ross May 22 1991 5435¹⁶⁸SBBG: R.N. Philbrick Mar 25 1966 B66-91¹⁶⁹Pers. com. E. Howe

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|--|--|--------------------|------|--------------------|-----|-----|------|-----|-----|
| <i>Lycium californicum</i> Torr. & A. Gray | | | | | | | CRU | | |
| <i>Lycium hyssopifolia</i> L.* | | CLE | NIC | CAT ¹⁷⁰ | | ROS | CRU | | |
| Malvaceae | | | | | | | | | |
| <i>Alcea rosea</i> L.* | | | | CAT | | | CRU | | |
| <i>Eremalche exilis</i> (A. Gray) Greene | | CLE | | CAT | | | CRU | | |
| <i>Lavatera assurgentiflora</i> | ssp. <i>assurgentiflora</i> | CLE* | NIC* | | | ROS | CRU | ANA | MIG |
| <i>Lavatera assurgentiflora</i> | ssp. <i>glabra</i> (Munz & I.M. Johnston) Kearney | CLE | | CAT | | | CRU* | | |
| <i>Malacothamnus clementinus</i> | var. <i>catalhensis</i> (Eastw.) Kearney | CLE | | CAT | | | | | |
| <i>Malacothamnus fasciculatus</i> (Torr. & A. Gray) Greene | var. <i>nesioficus</i> (B.L. Rob.) Kearney | | | | | | CRU | | |
| <i>Malacothamnus fasciculatus</i> Webb & Berthel.* | | CLE ¹⁷¹ | | | | ROS | | ANA | |
| <i>Malva pseudolavatera</i> All.* | | | | | | ROS | CRU | | |
| <i>Malva nicaeensis</i> All.* | | | | | | ROS | CRU | | |
| <i>Malva parviflora</i> L.* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Malvella leprosa</i> (Ortega) Krapov. | | CLE | | CAT | | ROS | CRU | | |
| <i>Sidalcea malviflora</i> (DC.) A. Gray | ssp. <i>malviflora</i> | | | | | ROS | CRU | | MIG |
| Montiaceae | | | | | | | | | |
| <i>Calandrinia breweri</i> S. Watson | | | | | | ROS | CRU | | |
| <i>Calandrinia ciliata</i> Fisch. & C.A. Mey. | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Cistanthe maritima</i> (Nutt.) Hershk. | | CLE | | CAT | BAR | ROS | CRU | ANA | |
| <i>Claytonia parviflora</i> Hook. | ssp. <i>parviflora</i> | | NIC | CAT ¹⁷² | BAR | | CRU | | MIG |
| <i>Claytonia perfoliata</i> Willd. | ssp. <i>mexicana</i> (Rydb.) John M. Mill. & K.L. Chambers | CLE ¹⁷³ | NIC | CAT ¹⁷⁴ | BAR | ROS | CRU | ANA | MIG |
| <i>Claytonia perfoliata</i> Willd. | ssp. <i>perfoliata</i> | CLE | | CAT | | ROS | CRU | | |
| <i>Montia fontana</i> L. | | | | CAT | | | CRU | | |
| Moraceae | | | | | | | | | |
| <i>Ficus carica</i> L.* | | CLE ¹⁷⁵ | | CAT | | | CRU | | MIG |
| Myrsinaceae | | | | | | | | | |
| <i>Anagallis arvensis</i> L.* | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Anagallis minima</i> (L.) E.H.L. Krause | | | | | | ROS | | | |
| Myrtales | | | | | | | | | |
| <i>Eucalyptus cannadulensis</i> Dehnh.* | | | | CAT ¹⁷⁶ | | ROS | CRU | | |
| <i>Eucalyptus cladocalyx</i> F. Muell.* | | | | CAT ¹⁷⁷ | | | | | |
| <i>Eucalyptus globulus</i> Labill.* | | CLE | | CAT | BAR | ROS | CRU | ANA | |

170RSA: Mark Hoefs, Steven A. Junak, Janet Takana, M. Gay Jul 14 1995 2401

171SD: Steven A. Junak Apr 23, 1997 SCI858

172SBBG: S.A. Junak, K. Kirkland Apr 13 2001 SCA-1421

173SBBG: Tim Ross, Orlando Mistretta, Mike Hammitt May 19 1991 5286

174SBBG: E.R. Blakley Apr 7 1963 5537

175SBBG: S.A. Junak May 20 1996

176UCR: T.S. Ross Apr 23 1993 6926

177UCR: O.F. Clarke Feb 25 1968 s.n.

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|--|---|---------------------|-----|--------------------|-----|-----|-----|-----|-----|
| <i>Eucalyptus polyanthemos</i> Schauer* | | | | CAT ¹⁷⁸ | | | | | |
| <i>Eucalyptus sideroxylon</i> Woolls* | | | | | | | CRU | | |
| <i>Eucalyptus tereticornis</i> Sm.* | | | | | | ROS | CRU | | |
| Nyctaginaceae | | | | | | | | | |
| <i>Abronia latifolia</i> Eschsch. | | | | | | | | | MIG |
| <i>Abronia maritima</i> S. Watson | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Abronia umbellata</i> Lam. | | CLE | NIC | CAT | | ROS | CRU | | MIG |
| <i>Mirabilis laevis</i> (Benth.) Curran | var. <i>crassifolia</i> (Choisy) Spellentb. | CLE | | CAT | BAR | ROS | CRU | ANA | |
| Oleaceae | | | | | | | | | |
| <i>Olea europaea</i> L.* | | | | | BAR | | CRU | ANA | |
| Onagraceae | | | | | | | | | |
| <i>Camissonia strigulosa</i> (Fisch. & C.A. Mey.) P.H. Raven | | | | | | ROS | | | |
| <i>Camissoniopsis cheiranthifolia</i> (Spreng.) W.L. Wagner & Hoch | ssp. <i>cheiranthifolia</i> | CLE | NIC | | BAR | ROS | CRU | | MIG |
| <i>Camissoniopsis cheiranthifolia</i> (Spreng.) W.L. Wagner & Hoch | ssp. <i>suffruticosa</i> (S. Watson) W.L. Wagner & Hoch | | NIC | | | | | | |
| <i>Camissoniopsis guadalupensis</i> (S. Watson) W.L. Wagner & Hoch | ssp. <i>clementina</i> (P.H. Raven) W.L. Wagner & Hoch | CLE | | | | | CRU | | |
| <i>Camissoniopsis hirtella</i> (Greene) W.L. Wagner & Hoch | | | | | | | | | |
| <i>Camissoniopsis ignota</i> (Jeps.) W.L. Wagner & Hoch | | | | | | ROS | CRU | | MIG |
| <i>Camissoniopsis intermedia</i> (P.H. Raven) W.L. Wagner & Hoch | | | | CAT | | | CRU | | |
| <i>Camissoniopsis micrantha</i> (Spreng.) W.L. Wagner & Hoch | | CLE | | CAT | | ROS | CRU | ANA | MIG |
| <i>Camissoniopsis robusta</i> (P.H. Raven) W.L. Wagner & Hoch | | CLE | | CAT | | | CRU | | MIG |
| <i>Clarkia davii</i> (Jeps.) H. Lewis & M. Lewis | | | | | | ROS | | | |
| <i>Clarkia epilobioides</i> (Torr. & A. Gray) A. Nelson & J.F. Clarkia | | CLE | | CAT | | ROS | CRU | ANA | |
| <i>Clarkia prostrata</i> H. Lewis & M. Lewis | | | | | | | | | |
| <i>Clarkia purpurea</i> (Curtis) A. Nelson & J.F. Macbr. | ssp. <i>quadrivulnera</i> (Lindl.) H. Lewis & M. Lewis | | | CAT | | ROS | CRU | | |
| <i>Clarkia unguiculata</i> Lindl. | | | | | | | | | |
| <i>Epilobium brachycarpum</i> C. Presl | | CLE? ¹⁷⁹ | | CAT | | | CRU | | |
| <i>Epilobium canum</i> (Greene) P.H. Raven ¹⁸⁰ | | | | | | ROS | CRU | ANA | MIG |
| <i>Epilobium canum</i> (Greene) P.H. Raven | ssp. <i>canum</i> | CLE | | CAT | | | CRU | ANA | |

178]CR: T.S. Ross, Janet Takara, Stacey Otte Apr 24 1993 6964

179]Pers. com. E. Howe

180]This taxa unresolved

181]SDSU: R.M. Beauchamp August 8, 1966 54

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|---|--|---------------------|-----|-----|-----|-----|-----|-----|-----|
| <i>Epilobium ciliatum</i> Raf. | | | | CAT | | | CRU | | MIG |
| <i>Eulobus californicus</i> Torr. & A. Gray | ssp. <i>ciliatum</i> | | | CAT | | | CRU | | |
| <i>Ludwigia peploides</i> (Kunth) P.H. Raven | ssp. <i>peploides</i> | | | CAT | | ROS | CRU | | |
| <i>Oenothera xenogaura</i> W.L. Wagner & Hoch* | | | | | | | CRU | | |
| <i>Oenothera sinuosa</i> W.L. Wagner & Hoch* | | | | CAT | | | | | |
| <i>Oenothera elata</i> Kunth. | ssp. <i>hirsutissima</i> (S. Watson) W. Dietr. | | | | | | CRU | | |
| Orobanchaceae | | | | | | | | | |
| <i>Castilleja affinis</i> Hook. & Arn. | ssp. <i>affinis</i> | | | CAT | | ROS | CRU | ANA | MIG |
| <i>Castilleja attenuata</i> (A. Gray) T.I. Chuang & Heckard | | | | | | | CRU | | |
| <i>Castilleja densiflora</i> (Benth.) T.I. Chuang & Heckard | | | NIC | | | ROS | CRU | | MIG |
| <i>Castilleja exserta</i> (A. Heller) T.I. Chuang & Heckard | | | | CAT | | ROS | CRU | | MIG |
| <i>Castilleja foliolosa</i> Hook. & Arn. | | | | CAT | | | | | |
| <i>Castilleja grisea</i> Dunkle | | CLE | | | | | | | |
| <i>Castilleja hololeuca</i> Greene | | | | | | ROS | CRU | ANA | MIG |
| <i>Castilleja mollis</i> Pennell | | | | | | ROS | | | MIG |
| <i>Kopsipopsis strobilacea</i> (A. Gray) Beck | | | | | | ROS | | | |
| <i>Orobanche bulbosa</i> Beck | | | | CAT | | ROS | CRU | | |
| <i>Orobanche californica</i> Cham. & Schltdl. | ssp. <i>grandis</i> Heckard | | | | | ROS | | | |
| <i>Orobanche fasciculata</i> Nutt. | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Orobanche parishii</i> (Jeps.) Heckard | ssp. <i>brachyloba</i> Heckard | | NIC | CAT | | ROS | CRU | | MIG |
| <i>Orobanche uniflora</i> L. | | CLE? ¹⁸² | | | | | CRU | | |
| Oxalidaceae | | | | | | | | | |
| <i>Oxalis articulata</i> Savigny* | ssp. <i>rubra</i> (A. St.-Hil.) Lourteig | | | CAT | | ROS | | | |
| <i>Oxalis californica</i> (Abrams) R. Knuth | | | | | | | CRU | | |
| <i>Oxalis corniculata</i> L.* | | CLE ¹⁸³ | NIC | CAT | | ROS | CRU | | |
| <i>Oxalis pes-caprae</i> L.* | | CLE | NIC | CAT | | | CRU | | |
| Papaveraceae | | | | | | | | | |
| <i>Dendromecon harfordii</i> Kellogg | | CLE | | CAT | | ROS | CRU | | |
| <i>Ehrendorferia ochroleuca</i> (Engelm.) Fukuhara | | | | | | | CRU | | |
| <i>Eschscholzia californica</i> Cham. | | CLE ¹⁸⁴ | NIC | CAT | | ROS | CRU | | MIG |
| <i>Eschscholzia ramosa</i> (Greene) Greene | | CLE | NIC | CAT | BAR | ROS | CRU | | |
| <i>Meconella denticulata</i> Greene | | | | | | | CRU | | |
| <i>Papaver californicum</i> A. Gray | | | | | | ROS | CRU | | |
| <i>Papaver heterophyllum</i> (Benth.) Greene | | CLE | | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Papaver somniferum</i> L.* | | | | CAT | | | CRU | | |
| <i>Platystemon californicus</i> Benth. | | | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Romneya coulteri</i> Harv.* | | | | CAT | | | | | |

¹⁸²Pers. com. E. Howe¹⁸³FRSA: Steven A. Junak May 14 1985 SC1-56¹⁸⁴FRSA: M.B. Dunkle May 27 1928 1983

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|--|--|--------------------|-----|--------------------|-----|-----|-----|-----|-----|
| Phymaceae | | | | | | | | | |
| <i>Mimulus aurantiacus</i> Curtis | | | | CAT ¹⁸⁵ | | | | | |
| <i>Mimulus aurantiacus</i> Curtis | var. <i>aurantiacus</i> | CLE | | | | ROS | CRU | ANA | |
| <i>Mimulus aurantiacus</i> Curtis | var. <i>parviflorus</i> (Greene) D.M. Thomps. | | | | | ROS | CRU | | |
| <i>Mimulus aurantiacus</i> Curtis | var. <i>pubescens</i> (Torr.) D.M. Thomps. | | | CAT | | | | | |
| <i>Mimulus aurantiacus</i> Curtis | var. <i>panicus</i> (Nutt.) D.M. Thomps. | | | CAT | | | | | |
| <i>Mimulus cardinalis</i> Benth. | | CLE ¹⁸⁶ | | CAT | | ROS | CRU | | |
| <i>Mimulus floribundus</i> Lindl. | | CLE | | CAT | | ROS | CRU | | |
| <i>Mimulus guttatus</i> DC. | | | | CAT | | | | | |
| <i>Mimulus latifolius</i> A. Gray | | | | CAT ¹⁸⁷ | | | CRU | | |
| <i>Mimulus traskiae</i> A.L. Grant | | | | CAT | | | | | |
| Pittosporaceae | | | | | | | | | |
| <i>Pittosporum undulatum</i> Vent.* | | | | CAT ¹⁸⁸ | | | | | |
| Plantaginaceae | | | | | | | | | |
| <i>Antirrhinum kelloggii</i> Greene | | | | CAT | | | CRU | | |
| <i>Antirrhinum multiflorum</i> Pennell | | | | | | | CRU | | |
| <i>Antirrhinum nuttallianum</i> A. DC. | | CLE | | CAT | | ROS | CRU | ANA | MIG |
| <i>Callitriche marginata</i> Torr. | ssp. <i>subsessile</i> (A. Gray) D.M. Thomps. | CLE | | CAT | | | | | |
| <i>Collinsia heterophylla</i> Graham | | CLE | | | | ROS | | | |
| <i>Gambelia speciosa</i> Nutt. | | CLE | | CAT | BAR | | | | |
| <i>Keckiella cordifolia</i> (Benth.) Straw | | CLE | | CAT | | ROS | CRU | ANA | |
| <i>Kickxia elatine</i> (L.) Dumort.* | | | | CAT ¹⁸⁹ | | | | | |
| <i>Linaria bipartita</i> (Vent.) Willd.* | | | | CAT | | | | | |
| <i>Nuttallanthus texanus</i> (Scheele) | | CLE | | CAT | | ROS | CRU | ANA | MIG |
| D.A. Sutton | | | | | | | | | |
| <i>Veronica anagallis-aquatica</i> L.* | | | | | | | CRU | | |
| <i>Plantago coronopus</i> L.* | | | NIC | CAT | | | | ANA | MIG |
| <i>Plantago elongata</i> Pursh | | | | | | ROS | CRU | | MIG |
| <i>Plantago erecta</i> E. Morris | | CLE | | CAT | | ROS | CRU | ANA | |
| <i>Plantago lanceolata</i> L.* | | CLE | | CAT ¹⁹⁰ | | | CRU | | MIG |
| <i>Plantago major</i> L.* | | | NIC | CAT | | | CRU | | |
| <i>Plantago maritima</i> L. | | | | | | ROS | | | |
| <i>Plantago ovata</i> Forssk. | | CLE | | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Plantago subnuda</i> Pilg.* | var. <i>insularis</i> (Eastw.) S.C. Meyers & A. Liston | | NIC | CAT | | ROS | CRU | | MIG |
| Plantanaceae | | | | | | | | | |
| <i>Plantanus racemosa</i> Nutt. | | | | CAT* | | | CRU | | |

¹⁸⁵OBE: John Knapp, Denise Knapp, 7, April 13, 2003¹⁸⁶SBBC: S. Boyd, T. Ross, L. Amseth Apr 8 1990 4291¹⁸⁷Dave M. Thompson 2012, *Mimulus*, in Jepson Flora Project (eds.) Jepson eFlora, accessed on May 7 2014¹⁸⁸GH: R.F. Thorne & A.D. Probst 1974 09-12 45100¹⁸⁹SBBC: M.L. Hoels, R.F. Thorne, J. Takara Jul 25 1995 2458¹⁹⁰SBBC: M.L. Hoels, R.F. Thorne Apr 6 1996 2671

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|--|--|----------------------|---------------------|--------------------|-----|-----|------|-------|-------|
| Plumbaginaceae | | | | | | | | | |
| <i>Armeria maritima</i> (Mill.) Willd. | | | | | | ROS | | | |
| <i>Limonium californicum</i> (Boiss.) A. Heller* | ssp. <i>californica</i> (Boiss.) A.E. Porsild | CLE [?] 191 | | | | | | | |
| <i>Limonium peresii</i> (Stapf) F.T. Hubb.* | | CLE | | CAT | | | | ANA & | MIG & |
| <i>Limonium sinuatum</i> (L.) Mill.* | | CLE | | CAT | | | | | |
| Polemoniaceae | | | | | | | | | |
| <i>Allophylum glutinosum</i> (Benth.) A.D. Grant & V.E. Grant | | CLE | | CAT | | | CRU | | |
| <i>Eriastrum filifolium</i> (Nutt.) Wooton & Standl. | | CLE | | CAT | | | | | |
| <i>Gilia achilleifolia</i> Benth. | ssp. <i>multicaulis</i> (Benth.) V.E. Grant & A.D. Grant | CLE | | CAT | | ROS | CRU | | |
| <i>Gilia engelensis</i> V.E. Grant | | | | CAT | | | CRU | | |
| <i>Gilia capitata</i> Sims | ssp. <i>abrotanifolia</i> (Greene) V.E. Grant | | | CAT | | | CRU | ANA | MIG |
| <i>Gilia chlorum</i> (Jeps.) V.E. Grant | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | |
| <i>Gilia nevadensis</i> A. Gray | | CLE | | CAT | | ROS | CRU | | |
| <i>Gilia tenuiflora</i> Benth. | ssp. <i>hoffmannii</i> (Eastw.) A.D. Grant & V.E. Grant | CLE | | CAT | | ROS | CRU | | MIG |
| <i>Leptosiphon bicolor</i> Nutt. | | | | | | | | | |
| <i>Leptosiphon parviflorus</i> Benth. | | | | | | | | | |
| <i>Leptosiphon pygmaeus</i> (Brand) J.M. Porter & L.A. Johnson | ssp. <i>pygmaeus</i> | CLE | | | | | | | |
| <i>Linanthus dianthiflorus</i> (Benth.) Greene | | | | CAT | | | CRU | | |
| <i>Navarretia atractyloides</i> (Benth.) Hook. & Arn. | | CLE | | CAT | | ROS | CRU | | |
| <i>Navarretia hamata</i> Greene | ssp. <i>leptantha</i> (Greene) H. Mason | CLE | | CAT | | | | | |
| Polygalaceae | | | | | | | | | |
| <i>Polygala californica</i> Nutt. | | | | | | | CRU | | |
| <i>Chorizanthe staticoides</i> Benth. | | | | CAT | | | | | |
| <i>Chorizanthe wheeleri</i> S. Watson | | | | | | ROS | CRU | | |
| <i>Eriogonum arborescens</i> Greene | | | | | | ROS | CRU | ANA | |
| <i>Eriogonum chieretum</i> Benth. | | | NIC ^{192*} | | | ROS | | | |
| <i>Eriogonum fasciculatum</i> Benth.* | var. <i>fasciculatum</i> | | | CAT ¹⁹³ | | | | | |
| <i>Eriogonum fasciculatum</i> Benth.* | var. <i>polifolium</i> (Benth.) Torr. & A. Gray | | NIC | | BAR | | | | |
| <i>Eriogonum giganteum</i> S. Watson | var. <i>compactum</i> Dunkle | | | | | | | | |
| <i>Eriogonum giganteum</i> S. Watson | var. <i>formosum</i> K. Brandegee | CLE | | CAT | | ROS | CRU* | | ANA |
| <i>Eriogonum giganteum</i> S. Watson | var. <i>giganteum</i> | | | CAT | | | CRU | | |
| <i>Eriogonum grande</i> Greene | var. <i>grande</i> | CLE | | CAT | | ROS | CRU | | ANA |

¹⁹¹Pers. com. E. Howe
¹⁹²S.BBC: S.A. Junak, T. Murphy, SN-432, Feb 21, 1990
¹⁹³HSC: R.F. Thorne, D. Propst, M. Haefl, Sep 12, 1974, 45110

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|---|---|--------------------|-----|-----|-----|-----|-----|-----|------|
| <i>Eriogonum grande</i> Greene | ssp. <i>rubescens</i> (Greene) Munz | | | | | ROS | CRU | ANA | MIG |
| <i>Eriogonum grande</i> Greene | var. <i>tinorum</i> Reveal | | NIC | CAT | | ROS | CRU | | |
| <i>Lastarratea coriacea</i> (Goodman) Hoover | | | | | | | | | |
| <i>Persicaria lapathifolia</i> (L.) Gray | | | | | | | | | |
| <i>Polygonum argyrocoleon</i> Kunze* | | CLE | NIC | CAT | | | CRU | | |
| <i>Polygonum aviculare</i> L.* | ssp. <i>depressum</i> (Meisn.) Arcang. | CLE | NIC | CAT | | ROS | CRU | ANA | |
| <i>Pterostegia drymarioides</i> | Fisch. & C.A. Mey. | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Rumex acetosella</i> L.* | | | | | | ROS | CRU | | |
| <i>Rumex conglomeratus</i> Murray* | | CLE ¹⁹⁴ | | CAT | | ROS | CRU | | |
| <i>Rumex crispus</i> L.* | | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| <i>Rumex fueginus</i> Phil. | | | | | | | | | MIG |
| <i>Rumex obtusifolius</i> L.* | | | NIC | CAT | | | | | |
| <i>Rumex pulcher</i> L.* | | | | | | | CRU | | |
| <i>Rumex salicifolius</i> Weimm. | | CLE | NIC | CAT | | ROS | CRU | | MIG |
| Portulacaceae | | | | | | | | | |
| <i>Portulaca oleracea</i> L.* | | | | CAT | | | CRU | | |
| Primulaceae | | | | | | | | | |
| <i>Dodecatheon cleveandtii</i> Greene | ssp. <i>insulare</i> H.J. Thomps. | CLE | NIC | CAT | | ROS | CRU | ANA | MIG |
| Ranunculaceae | | | | | | | | | |
| <i>Clematis lasiantha</i> Nutt. | | | | | | | CRU | | |
| <i>Clematis ligusticifolia</i> Nutt. | | | | CAT | | ROS | CRU | | |
| <i>Clematis pauciflora</i> Nutt. | | | | | | | CRU | | |
| <i>Delphinium parryi</i> A. Gray | ssp. <i>maritimum</i> (Davidson) M.J. Warnock | | | CAT | | ROS | CRU | ANA | MIG |
| <i>Delphinium parryi</i> A. Gray | ssp. <i>parryi</i> | | | CAT | | | CRU | | |
| <i>Delphinium variegatum</i> Torr. & A. Gray | ssp. <i>kinakense</i> (Munz) M.J. Warnock | CLE | | | | | | | |
| <i>Delphinium variegatum</i> Torr. & A. Gray | ssp. <i>thornei</i> Munz | CLE | | | | | | | |
| <i>Ranunculus californicus</i> Benth. | | | | CAT | | ROS | CRU | | MIG |
| <i>Ranunculus hebecarpus</i> Hook. & Arn. | | | | CAT | | | | | |
| Resedaceae | | | | | | | | | |
| <i>Oligomeris limifolia</i> (Hornem.) J.F. Macbr. | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Reseda odorata</i> L.* | | | | CAT | | | | | |
| Rhamnaceae | | | | | | | | | |
| <i>Ceanothus arboreus</i> Greene | | | | CAT | | ROS | CRU | | |
| <i>Ceanothus megacarpus</i> Nutt. | var. <i>insularis</i> (Eastw.) Munz | CLE | | CAT | | ROS | CRU | ANA | MIG& |
| <i>Ceanothus megacarpus</i> Nutt. | var. <i>megacarpus</i> | CLE | | CAT | | | CRU | | |
| <i>Frangula californica</i> (Eschsch.) A. Gray | ssp. <i>californica</i> | CLE | | CAT | | ROS | CRU | | MIG& |
| <i>Rhamnus pirifolia</i> Greene | | | | | | | CRU | | |
| Rosaceae | | | | | | | | | |
| <i>Adenostoma fasciculatum</i> Hook. & Arn. | var. <i>fasciculatum</i> | CLE | | CAT | | ROS | CRU | | |

¹⁹⁴SD: Steven A. Junak May 18, 1996 SCI488a

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|--|--|-----|-----|--------------------|-----|-----|-----|-----|-----|
| <i>Adenostoma fasciculatum</i> Hook. & Arn. | var. <i>prostratum</i> Dunkle | | | CAT | | ROS | CRU | | |
| <i>Aphanes occidentalis</i> (Nutt.) Rydb. | | CLE | | CAT | | ROS | CRU | | |
| <i>Cercocarpus betuloides</i> Nutt. | var. <i>betuloides</i> | | | CAT | | ROS | CRU | | |
| <i>Cercocarpus betuloides</i> Nutt. | var. <i>blancheae</i> (C.K. Schneid.) Little | | | CAT | | ROS | CRU | | |
| <i>Cercocarpus traskiae</i> Eastw. | | | | CAT | | | | | |
| <i>Drymocalis glandulosa</i> (Lindl.) Rydb. ¹⁹⁵ | | | | CAT | | | | | |
| <i>Heteromeles arbutifolia</i> (Lindl.) M. Roem. | | CLE | | CAT | | ROS | CRU | ANA | MIG |
| <i>Holodiscus discolor</i> (Pursh) Maxim. | | | | CAT | | | CRU | | |
| <i>Lynothamnus floribundus</i> A. Gray | ssp. <i>asplenifolius</i> (Greene) P.H. Raven | CLE | | CAT | | ROS | CRU | | |
| <i>Lynothamnus floribundus</i> A. Gray | ssp. <i>floribundus</i> | | | CAT | | | | | |
| <i>Potentilla anserina</i> L. | ssp. <i>paefifica</i> (Howell) Rousi | | | CAT ¹⁹⁶ | | | CRU | | MIG |
| <i>Poterium sanguisorba</i> L.* | | | | CAT | | | CRU | ANA | |
| <i>Prunus ilicifolia</i> (Hook. & Arn.) D. Dietr. | ssp. <i>lyonii</i> (Eastw.) P.H. Raven | CLE | | CAT | | ROS | CRU | ANA | |
| <i>Rosa californica</i> Cham. & Schltdl. | | | | CAT | | ROS | CRU | | |
| <i>Rubus ursinus</i> Cham. & Schltdl. | | | | CAT | | ROS | CRU | | MIG |
| Rubiaceae | | | | | | | | | |
| <i>Galium angustifolium</i> subsp. | ssp. <i>foliosum</i> (Hilend & J.T. Howell) Dempster & Stebbins | | | | | ROS | CRU | ANA | |
| <i>Galium angustifolium</i> A. Gray | ssp. <i>angustifolium</i> | | | CAT | | | CRU | ANA | MIG |
| <i>Galium aparine</i> L. | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Galium buxifolium</i> Greene | | | | | | | CRU | | MIG |
| <i>Galium californicum</i> Hook. & Arn. | ssp. <i>flaccidum</i> (Greene) Dempster & Stebbins | | | | | | CRU | | |
| <i>Galium californicum</i> Hook. & Arn. | ssp. <i>miguelense</i> (Greene) Dempster & Stebbins | | | | | ROS | | | MIG |
| <i>Galium catalinense</i> A. Gray | ssp. <i>acrispum</i> Dempster | CLE | | | | | | | |
| <i>Galium catalinense</i> A. Gray | ssp. <i>catalinense</i> | | | CAT | | | | | |
| <i>Galium nuttallii</i> A. Gray | ssp. <i>insulare</i> Ferris | | | CAT | | ROS | CRU | | |
| <i>Galium parisiense</i> L.* | | | | CAT ¹⁹⁷ | | ROS | | | |
| <i>Galium porrigens</i> Dempster | var. <i>porrigens</i> | | | CAT | | ROS | CRU | | |
| Rutaceae | | | | | | | | | |
| <i>Ruta chalepensis</i> L.* | | | | CAT | | | | | |
| Salicaceae | | | | | | | | | |
| <i>Populus fremontii</i> S. Watson | ssp. <i>fremontii</i> | | | CAT | | | CRU | | |
| <i>Populus trichocarpa</i> Hook. | | | | CAT | | ROS | CRU | | |
| <i>Salix exigua</i> Nutt. | | | NIC | | | | CRU | | |
| <i>Salix gooddingii</i> C. R. Ball | | CLE | | | | | | | |
| <i>Salix laevigata</i> Bebb | | | | CAT | | | CRU | | |

¹⁹⁵Synonym: *Potentilla glandulosa* Lindl.¹⁹⁶[C; Tim Ross, 6923, Apr 22, 1993¹⁹⁷SBBC; S.A. Junak, M.L. Hoefs, K. Kirkland Jul 17 1998 SCA-769

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|---|-------------------------|----------------------|-------|--------------------|-------|--------------------|-------|-------|-------|
| <i>Salix lasiandra</i> Benth. | ssp. <i>lasiandra</i> | | | | | | CRU | | |
| <i>Salix lasiolepis</i> Benth. | var. <i>lasiandra</i> | CLE? ¹⁹⁸ | NIC | CAT | | ROS | CRU | ANA | MIG |
| Sapindaceae | | | | | | | | | |
| <i>Acer macrophyllum</i> Pursh | | | | | | | CRU | | |
| Saxifragaceae | | | | | | | | | |
| <i>Heuchera maxima</i> Greene | | CLE | NIC | CAT | | ROS | CRU | ANA | |
| <i>Jepsonia matifolia</i> (Greene) Small | | | | CAT | | ROS | CRU | | |
| <i>Lithophragma affine</i> A. Gray | | | | CAT | | ROS | | | |
| <i>Lithophragma cymbalaria</i> Torr. & A. Gray | | | | | | ROS | CRU | | |
| <i>Lithophragma maximum</i> Baccig. | | CLE | | | | | | | |
| <i>Micranthes californica</i> (Greene) Small ¹⁹⁹ | | CLE ²⁰⁰ | | | | ROS | CRU | | |
| Scrophulariaceae | | | | | | | | | |
| <i>Myoporum laetum</i> G. Forst. * | | CLE ²⁰¹ | NIC | | | ROS | CRU & | | |
| <i>Scrophularia californica</i> | | | | | | ROS | | | |
| Cham. & Sehtld. | | | | | | | | | |
| <i>Scrophularia villosa</i> Pennell | | CLE | | CAT | | | CRU | | |
| <i>Verbascum thapsus</i> L. * | | | | | | | | | |
| Solanaceae | | | | | | | | | |
| <i>Datura wrightii</i> Regel | | CLE? ^{202*} | | CAT | | ROS | CRU | | |
| <i>Lycium brevipes</i> Benth. | | CLE | NIC | CAT & | | | | | |
| <i>Lycium californicum</i> Nutt. | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Lycium fremontii</i> A. Gray | | | | | | | | | |
| <i>Lycium verrucosum</i> Eastw. | | | NIC & | | | | | | |
| <i>Lycopersicon esculentum</i> Mill. * | | CLE? ²⁰³ | NIC | CAT ²⁰⁴ | BAR & | | CRU | ANA & | MIG & |
| <i>Nicotiana clelandii</i> A. Gray | | | | CAT ²⁰⁵ | BAR | | CRU | ANA | |
| <i>Nicotiana glauca</i> Graham * | | CLE? ²⁰⁶ | NIC | CAT | | | CRU | | |
| <i>Nicotiana quadrivalvis</i> Pursh | | | | CAT ²⁰⁷ | | | | | |
| <i>Petunia parviflora</i> Juss. | | | | | | ROS | | ANA | |
| <i>Solanum americanum</i> Mill. * | | CLE ²⁰⁸ | NIC | | | ROS ²⁰⁹ | | ANA | |
| <i>Solanum douglasii</i> Dunal | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |

198Pers. com. E. Howe

199Synonym: *Stafifraga californica* Greene

200SBBG: S.A. Junak Mar 13 1997 SCI-770

201SBBG: S.A. Junak Jul 31 1981 SCI-53

202Pers. com. E. Howe

203Pers. com. E. Howe

204RSA: R.F. Thorne, 47381, Sep 4 1975

205RSA: Blanche Trask Mar 1901 s.n.

206Pers. com. E. Howe

207SD: Robert F. Thorne, P. Everett, 34883, Jun 22, 1965

208SBBG: H.L. Ferguson, R.M. Reuchamp Sep 15 1979

209SBBG: S.A. Junak Sep 23 1995 SR-896

APPENDIX 2. Continued

| Family/species | ssp./var. and infraname | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
|--|--|---------------------|-----|--------------------|------|-----|--------------------|-----|-----|
| <i>Solanum elaeagnifolium</i> Cav.* | | | | CAT | | ROS | CRU | | |
| <i>Solanum wallacei</i> (A. Gray) Parish | | | | CAT | | ROS | CRU | | |
| Tamaricaceae | | | | | | | | | |
| <i>Tamarix aphylla</i> (L.) H. Karst.* | | | | | | ROS | | | |
| <i>Tamarix chinensis</i> Lour.* | | CLE? ²¹⁰ | | | | | | | |
| <i>Tamarix parviflora</i> DC.* | | | NIC | CAT ²¹¹ | | ROS | CRU | ANA | MIG |
| <i>Tamarix ramosissima</i> Ledeb.* | | CLE | | | | | | | |
| Theophrastaceae | | | | | | | | | |
| <i>Samolus parviflorus</i> Raf. | | | | | | | CRU | | |
| Tropaeolaceae | | | | | | | | | |
| <i>Tropaeolum majus</i> L.* | | CLE ²¹² | | CAT | BAR& | | | | |
| Ulmaceae | | | | | | | | | |
| <i>Ulmus hollandica</i> Mill.* | | | | | | | CRU | | |
| Urticaceae | | | | | | | | | |
| <i>Hesperocnide tenella</i> Torr. | | CLE | | CAT | BAR | ROS | CRU | | |
| <i>Parietaria hespera</i> Hinton | | CLE | NIC | CAT | BAR | ROS | CRU | ANA | MIG |
| <i>Soleirolia soleirolii</i> (Req.) Dandy* | | | NIC | | | | | | |
| <i>Urtica dioica</i> L. | | | | CAT | | ROS | CRU | ANA | |
| <i>Urtica urens</i> L. | ssp. <i>holosericea</i> (Nutt.) Thorne | | | CAT | | ROS | CRU | | MIG |
| Valerianaceae | | | | | | | | | |
| <i>Centranthus ruber</i> (L.) DC.* | | | | CAT | | | CRU | | |
| <i>Plectritis ciliosa</i> (Greene) Jeps. | | | | | | | CRU | | |
| Verbenaceae | | | | | | | | | |
| <i>Phyla nodiflora</i> (L.) Greene* | | CLE ²¹³ | | CAT | | | CRU ²¹⁴ | | |
| <i>Verbena bracteata</i> Lag. & Rodr. | | CLE ²¹⁵ | | CAT | | ROS | | | |
| <i>Verbena lasiostachys</i> Link | var. <i>lasiostachys</i> | CLE | NIC | CAT | | | | | |
| <i>Verbena lasiostachys</i> Link | var. <i>scabrida</i> Moldenke | | | CAT | | ROS | CRU | | MIG |
| Violaceae | | | | | | | | | |
| <i>Viola pedunculata</i> Torr. & A. Gray | | CLE | | CAT | | ROS | CRU | | |
| Vitaceae | | | | | | | | | |
| <i>Vitis girdiana</i> Munson | | | | CAT | | | | | |
| Zygophyllaceae | | | | | | | | | |
| <i>Tribulus terrestris</i> L.* | | 436 | 279 | CAT ²¹⁶ | 150 | 519 | 662 | 271 | 296 |
| NUMBER OF SPECIES | | | | | | | | | |

²¹⁰Pers. com. E. Howe²¹¹RSA: R.E. Thorne, 45759, Mar 22 1975²¹²UCR: T.S. Ross, 5434, May 22 1991²¹³SBBC: H.L. Ferguson Mar 12 1981 234²¹⁴SBBC: S.A. Junak, R.N. Philbrick, M.C. Hochberg, SC-63, May 9 1979²¹⁵PSA: E. Kellogg Jun 28 1992 s.n.²¹⁶SBBC: S.A. Junak, K. Kirkland, M. Bushman Oct 21 1998 SCa-815