

**Rare Plant Status Review: *Calystegia atriplicifolia* ssp. *buttensis***  
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*Calystegia atriplicifolia* ssp. *buttensis* is an endemic, perennial herb in the Convolvulaceae. It is known from chaparral and rocky areas in lower montane coniferous forest habitats from 600 to 1524 meters in elevation. *C. atriplicifolia* ssp. *buttensis* is sometimes found growing on roadcuts. It is included in *The Jepson Manual* (1993) and will be included in *The Jepson Manual* (2<sup>nd</sup> Edition). *C. atriplicifolia* ssp. *buttensis* flowers between May and July.

*C. atriplicifolia* ssp. *buttensis* is known from 101 occurrences in Butte, Del Norte, Shasta, and Tehama counties and, possibly, Mendocino and Contra Costa counties (please see page 4 for a map showing most known locations). 14 of these occurrences are considered historical and have not been documented for at least 20 years. Out of the 87 recent occurrences (those that have been documented in the past 20 years) a total of 33 are currently ranked as either "good" or "excellent" by CNDDDB. 16 of 87 recent occurrences are ranked as either "fair" or "poor" by CNDDDB. The occurrence rank is unknown for 52 occurrences. Field work should attempt to re-locate historical occurrences of *C. atriplicifolia* ssp. *buttensis*, and suitable habitat within and beyond its known range should be searched for new occurrences. Please see the table below for a summary of occurrence data.

There are currently some serious questions regarding the taxonomy of *C. atriplicifolia* ssp. *buttensis*. The map on page 4 clearly shows the bimodal distribution between occurrences of this taxon in Shasta, and Butte and Tehama Counties. Communication with *Jepson Manual* (2<sup>nd</sup> Edition) *Calystegia* author, Richard Brummitt (pers. comm. 2008) indicates that future taxonomic research may result in the northern (Shasta county) and southern (Butte and Tehama Counties) populations of *C. atriplicifolia* ssp. *buttensis* being recognized as separate taxa. Additionally, plants identified as *C. atriplicifolia* ssp. *buttensis* from Contra Costa County may represent an undescribed taxon. Lastly, *C. atriplicifolia* ssp. *buttensis* from Mendocino County (1 occurrence) are outside the known range of this taxon and their proper identification is questionable.

Occurrence Statistics for <i>Calystegia atriplicifolia</i> ssp. <i>buttensis</i>											
Data from CNDDDB, January 2009											
Total # of Known Element Occurrences	Element Occurrence Ranks						Population Status		Presence		
	A	B	C	D	X	U	Historic >20 years	Recent <=20 years	Present, Extant	Possibly Extirpated	Extirpated
101	3	30	15	1	0	52	14	87	101	0	0

The population size of *C. atriplicifolia* ssp. *buttensis* is not well known. However, some data are available for 46 occurrences. Counts/estimates conducted between 1996 and 2007 indicate that the population size at occurrences of *C. atriplicifolia* ssp. *buttensis*

varies greatly (from 8 plants at EO# 103 and 77 to as many as 1,000,000 plants at EO# 24). Population count/estimate data is provided in the table on page 5.

*C. atriplicifolia* ssp. *buttensis* was first included on List 3 (Plant about which we need more information) in the Third Edition of The CNPS Inventory (1984). It was included on List 1B in the Sixth Edition (2001) of the Inventory.

Occurrences of *C. atriplicifolia* ssp. *buttensis* are threatened by road maintenance, weed control measures (e.g. herbicide application), and vehicles. There is, however, evidence that indicates that *C. atriplicifolia* ssp. *buttensis* grows well in areas that are subjected to human disturbance (e.g. recently logged areas).

The relatively large number of occurrences (101) of *C. atriplicifolia* ssp. *buttensis* may seem to indicate that it is too common to be included on List 1B. Some clients have asked us to submit this review, requesting your input on possibly downgrading its status. It is, however, important to note that only 33 occurrences are ranked as “good” or “excellent” by CNDDDB. Generally speaking, List 1B contains plants that are known from fewer than 50 occurrences ranked as “good” or “excellent” by CNDDDB. Consequently, it appears that, at this point in time, there are insufficient data to support re-ranking *C. atriplicifolia* ssp. *buttensis* to List 4.

Furthermore, there is evidence that indicates that plants from Shasta, Butte and Tehama counties may, in the future, be split into two different taxonomic entities. Should this occur, both entities would likely qualify for inclusion on CNPS List 1B.

Based on the current information, CNPS and CNDDDB recommend that *C. atriplicifolia* ssp. *buttensis* be kept on List 1B. If, however, reviewers conclude that *C. atriplicifolia* ssp. *buttensis* is too common for List 1B we will consider re-ranking it to List 4. If reviewers determine that it should be maintained on List 1B, we will monitor new reports of *C. atriplicifolia* ssp. *buttensis* and propose (via the Rare Plant Status Review Process) re-ranking it to List 4 once there are greater than 50+ known occurrences ranked as “good” or “better” by CNDDDB.

### **Recommended Actions**

**CNPS:** Keep on CNPS List 1B.2

**CNDDDB:** Keep on G5T3, S3

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### **Current CNPS *Inventory* record:**

*Calystegia atriplicifolia* Hallier f. ssp. *buttensis* Brummitt  
Butte County morning glory  
Convolvulaceae

List 1B.2

Butte (BUT), ~~Contra Costa (CCA)?~~, Del Norte (DNT), Mendocino (MEN), Shasta (SHA), Tehama (TEH)

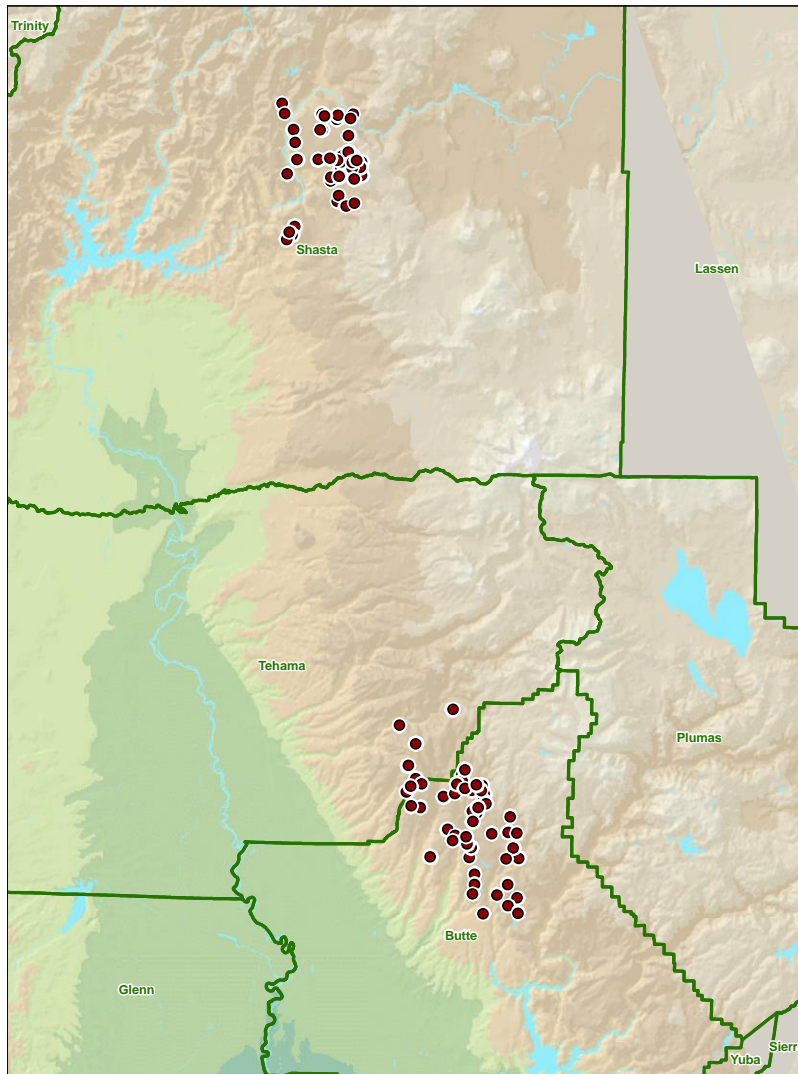
~~Clayton (464B)?~~ 3712188, Stirling City (592A) 3912185, Cohasset (592B) 3912186, Paradise West (592C) 3912176, Paradise East (592D) 3912175, Bell Springs (600A) 3912385, Devils Parade Ground (608C) 4012116, Ishi Caves (609D) 4012117, Chalk Mountain (663A) 4012187, Roaring Creek (663B) 4012188, Montgomery Creek (663C) 4012178, Hatchet Mountain Pass (663D) 4012177, Goose Gap (664A) 4012281, Big Bend (680C) 4112118, Shoeinhorse Mountain (681D) 4112211, Hiouchi (740D)? 4112471

Chaparral, lower montane coniferous forest (LCFRs)/rocky, sometimes on roadsides; elevation 600-1524 meters.

Perennial, rhizomatous herb, blooms May through July.

Threatened by road maintenance, vehicles, and weed control measures. Possibly threatened by erosion. Can be variable. Plants from ~~CCA Co.~~ and SHA Co. probably undescribed taxa, plants from DNT Co. intermediate to ssp. *atriplicifolia*, and plants from MEN Co. (600A) need confirmation. See *Kew Bulletin* 35(2):327 (1980) for original description.

**Map showing the most of the known occurrences (those in Shasta, Butte, and Tehama Counties) of *Calystegia atriplicifolia* ssp. *buttensis***



**Population Counts/Estimates at *Calystegia atriplicifolia* ssp. *buttensis*  
 Occurrences**

<b>Element Occurrence# (s)</b>	<b>Population Count/Estimate</b>	<b>Date(s) of Observation</b>
2	200	2005
12	20	2006
13, 29, 30 combined	2200	1997
24	Possibly a few hundred plants on Forest Service land extending to a million (?) in the private plantations surrounding	1996
25	2000	1996
27	1	1996
28	1000	1996
31	30	2001
33	750	2006
48	"Many Plants"	2006
51	30	2004
52	20	2003
59	"Few Plants"	2004
61	"Very Large Population"	2004
63	100 to 300	2004
72	260	2003
73	10	2006
74	1000 to 5000	2005
75, 76 combined	500	2006
77, 78 combined	50	2006
79, 80 combined	20	2006
81	75	2006
82	40	2006

Element Code: PDCON04012  
Changed from CNPS List 1B.2 to 4.2 on 2009-04-30

84	100	2006
85	200	2006
86, 87 combined	50	2006
88	30 to 50	2006
89	100+	2006
90	10	2006
93	175	2007
94	30	2006
95	250	2006
96	"Many Plants"	2006
97	150	2006
98	10	2006
101	1040	2007
102	25	2007
103	8	2007
104	12	2007
105	1304	2007
107	62	2007
<b>Estimated Total Number of Plants</b>	<b>14,000+</b>	