



# Annotated Checklist of Vascular Flora

## *Capitol Reef National Park*

Natural Resource Technical Report NPS/NCPN/NRTR-2009/154



**ON THE COVER**

Last Chance townsendia (*Townsendia aprica*), Capitol Reef National Park. Photograph by Walter Fertig.

# **Annotated Checklist of Vascular Flora**

## ***Capitol Reef National Park***

Natural Resource Technical Report NPS/NCPN/NRTR-2009/154

### **Author**

Walter Fertig  
Moenave Botanical Consulting  
1117 W. Grand Canyon Dr.  
Kanab, UT 84741

### **Editing and Design**

Alice Wondrak Biel  
Northern Colorado Plateau Network  
P.O. Box 848  
Moab, UT 84532

January 2009

U.S. Department of the Interior  
National Park Service  
Natural Resource Program Center  
Fort Collins, Colorado

The Natural Resource Publication series addresses natural resource topics that are of interest and applicability to a broad readership in the National Park Service and to others in the management of natural resources, including the scientific community, the public, and the NPS conservation and environmental constituencies. Manuscripts are peer-reviewed to ensure that the information is scientifically credible, technically accurate, appropriately written for the intended audience, and is designed and published in a professional manner.

The Natural Resource Technical Report series is used to disseminate the peer-reviewed results of scientific studies in the physical, biological, and social sciences for both the advancement of science and the achievement of the National Park Service's mission. The reports provide contributors with a forum for displaying comprehensive data that are often deleted from journals because of page limitations. Current examples of such reports include the results of research that addresses natural resource management issues; natural resource inventory and monitoring activities; resource assessment reports; scientific literature reviews; and peer-reviewed proceedings of technical workshops, conferences, or symposia.

Views, statements, findings, conclusions, recommendations, and data in this report are solely those of the author(s) and do not necessarily reflect views and policies of the U.S. Department of the Interior, National Park Service. Mention of trade names or commercial products does not constitute endorsement or recommendation for use by the National Park Service.

Printed copies of reports in this series may be produced in limited quantity, and are only available as long as the supply lasts. You may send a request to:

Northern Colorado Plateau Network  
P.O. Box 848  
Moab, UT 84532

This report is also available electronically from the Northern Colorado Plateau Network website, <http://science.nature.nps.gov/im/units/ncpn/index.cfm>, or at <http://www.nature.nps.gov/publications/NRPM/index.cfm>.

Please cite this publication as:

Fertig, W. 2009. Annotated checklist of vascular flora: Capitol Reef National Park. Natural Resource Technical Report NPS/NCPN/NRTR-2009/154. National Park Service, Fort Collins, Colorado.

# Contents

Figures .....	v
Tables .....	v
Abstract .....	vii
Acknowledgements .....	ix
1 Introduction .....	1
1.1 Background and justification.....	1
1.2 Objectives.....	1
1.3 Study area .....	1
1.3.1 History and setting.....	1
1.3.2 Geology .....	2
1.3.3 Vegetation.....	4
1.3.4 Previous botanical studies .....	4
2 Methods.....	9
3 Results.....	11
3.1 Summary of the flora of Capitol Reef National Park .....	11
3.2 Life form and biogeographic diversity.....	12
3.3 Plants of special concern .....	12
3.4 Non-native species and noxious weeds.....	12
4 Discussion .....	17
5 Literature Cited .....	19
Appendices .....	23
Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes. ....	26
Appendix B. Potential (unconfirmed) taxa of Capitol Reef National Park.....	105
Appendix C. Rejected (falsely reported or questionable) taxa of Capitol Reef National Park. .	117
Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes.....	129



# Figures

Figure 1.3.1. Location of Capitol Reef National Park (Wayne, Garfield, Emery, and Sevier counties, Utah).. 3

Figure 1.3.4. Increase in the number of plant taxa confirmed as present in Capitol Reef National Park by decade, 1930–2006. .... 7

# Tables

Table 1.3.4. Chronology of plant collecting efforts in Capitol Reef National Park. .... 5

Table 3.1. Statistical summary of the flora of Capitol Reef National Park. .... 11

Table 3.3. Plant species of conservation concern from Capitol Reef National Park. .... 13





# Abstract

In 2005–2006, the National Park Service’s Northern Colorado Plateau Network received funding to develop a revised checklist of the vascular plant flora of Capitol Reef National Park. This entailed a thorough review of existing literature, re-examination of specimens from the Capitol Reef National Park herbarium and other state and national museum collections, and additional field work to corroborate unverified species reports or locate new species. Based on this study, 887 vascular plant taxa have been confirmed or reliably reported as occurring in the park (835 are known from validated herbarium specimens and 52 from unvouchered literature reports). Another 117 species formerly considered part of the park flora have now been shown to be falsely reported. The current flora of Capitol Reef National Park represents about 25% of the known flora of Utah, and 52.4% of the flora of the Colorado Plateau ecoregion within Utah. At least 7 of these species are federally listed as threatened or endangered, and 54 more are considered species of concern by the state natural heritage program. Introduced plants make up 13.8% of the park flora (45 species), of which only 3 species are considered noxious weeds by the State of Utah. Further surveys in Capitol Reef National Park are likely to find additional new species (about 192 are known from similar habitats outside the park boundary), especially among late- season flowering, weedy, or wetland taxa.



# Acknowledgements

I would like to thank the following individuals for their assistance with this project. Botanist Dr. Angela Evenden, former leader of the Northern Colorado Plateau Network in Moab, Utah, was an active proponent of this project and helped secure funding for field work and herbarium studies in 2006. Tom Clark, natural resources chief at Capitol Reef National Park, and Debi Clark, interagency botanist, provided access to all mounted and unmounted CARE herbarium specimens, research permits, reprints, and advice on botanical issues related to the park. Amy Tendick and Liz Ballenger recorded specimen-label data from all mounted collections in the CARE herbarium. Dr. Mary Barkworth, of Utah State University, corroborated the identification of *Stipa scribneri* in the park. Libby Nance, former database specialist with the NCPN, assisted with development and quality control of the park's NPSpecies database. Libby Nance, Janet Coles, and Helen Thomas also provided data from recent vegetation mapping and wetland inventories in the park. Drs. Stanley Welsh and Duane Atwood provided access to herbarium collections at Brigham Young University. Dr. Michael Piep provided access to collections at the Utah State University (Intermountain) herbarium. Dr. Ron Hartman and Ernie Nelson provided access and specimen loans from the Rocky Mountain Herbarium at the University of Wyoming. Thanks to the technical reviewers (Dr. Angela Evenden, Dr. Dusty Perkins, and Libby Nance) for their comments and suggestions. To any others whom I may have inadvertently forgotten, please accept my apologies (and thanks).

Research was conducted under permit # CARE-2006-SCI-0002 for study number CARE-06002. Funding was provided by the National Park Service through the University of Wyoming.



# 1 Introduction

In 2006, the National Park Service (NPS) established a cooperative agreement with the University of Wyoming, through the Rocky Mountains Cooperative Ecosystem Studies Unit, to produce a series of technical reports summarizing the vascular plant flora of each of the 16 national park units of the Northern Colorado Plateau Network (NCPN). These reports are based on existing information in the park service's NPSpecies database system and augmented by further data mining, reviews of state and regional herbaria, and new field surveys to resolve the status of many reported and unconfirmed species. The objective of these reports is to summarize the current state of knowledge of the flora of each park for the benefit of NPS biologists and interpretive staff, outside researchers, and the general public. The following report addresses the vascular flora of Capitol Reef National Park (NP), in south-central Utah. Other NCPN park units are addressed in separate reports.

## 1.1 Background and justification

One of the primary missions of the NPS is “to conserve unimpaired the natural and cultural resources and values of the national park system for the enjoyment of this and future generations” (NPS 2000). Due to their high degree of protection and distribution across a wide variety of habitat types, the nation's national park units make a significant contribution to the protection of biological diversity (Noss and Cooperrider 1994). Unfortunately, the full contribution of the NPS system is not known, as many park units have traditionally lacked comprehensive biological inventories or monitoring programs to identify the composition and condition of their biota. Knowing the status of park flora and fauna is critical for effective park management and for systematically identifying and filling gaps in the nation's protected area network (Margules and Pressey 2000).

To rectify this shortcoming, Congress passed the National Parks Omnibus Management Act in 1998 to provide guidance and funding for an inventory and monitoring program across the entire national park system. Since 2000, the NCPN Inventory and Monitoring Program has been developing and verifying species lists of vertebrates and vascular plants for each park unit in the network

(Evenden et al. 2002). This effort has entailed reviewing existing species checklists, corroborating the identification of specimens in park museum and herbarium collections, locating additional specimen records from other museums, mining relevant literature and datasets, and conducting field surveys to locate new taxa or confirm unsubstantiated reports.<sup>†</sup> All of these data have been synthesized in NPSpecies, the park service's standardized database for documenting park status (present, probably present, unconfirmed, falsely reported), abundance, residency, nativity, and rarity. With the production of a technical series of reports on the flora of each park, the NPSpecies data will now be available to a broader audience.

## 1.2 Objectives

The objectives of this project were to:

1. Document the current status (present, reported, potential, or falsely reported) of all vascular plant species that have been cited as occurring in Capitol Reef NP, based on a review of herbarium collections and past literature; and
2. Develop an annotated checklist of the flora of Capitol Reef NP, with supplemental information on taxonomic synonyms, distribution, within-park abundance, flowering period, growth form, nativity, habitat, and sources for each record.

## 1.3 Study area

### 1.3.1 History and setting

The oldest evidence of human occupation of the Capitol Reef and Waterpocket Fold area comes from dart points dating from 2,000 to 8,000 years before present. Sedentary farmers and hunter-gatherers of the Ancestral Puebloan and Fremont cultures inhabited areas near perennial water sources within the park during the period from 600 to 1275 A.D. Following periods of extensive drought, native cultures adopted the more nomadic lifestyle that existed at the time of European contact (Frye 1998).

Waterpocket Fold presented a significant barrier to early European explorers, who largely bypassed the park area until the mid-19th century. Almon Thompson, of the Powell survey, made

---

<sup>†</sup>Taxa refer to all named species, subspecies, and varieties.

the first scientific explorations through the future park in 1872, en route to the Henry Mountains. Geologists Grove Karl Gilbert and Clarence Dutton mapped the Waterpocket Fold in detail in the late 1870s. Mormon pioneers began settling the area in the vicinity of Capitol Reef in the late 1870s and early 1880s. A small farming community began at Fruita in 1886, but struggled due to its remoteness (Frye 1998).

Wayne County civic leaders and boosters began espousing protection of a portion of the Capitol Reef area around Fruita (the “Wayne Wonderland”) as a state or national park in the early 1920s. Such a designation would result in improved road access to the area and greater economic prosperity from tourism. These efforts reached fruition in August 1937, with the creation of Capitol Reef National Monument by President Franklin Roosevelt, under the Antiquities Act. The monument’s original boundaries were enlarged by President Eisenhower in 1958, and again in 1969 by President Johnson, who increased the area by nearly 600%. In December 1971, Congress fixed the current boundaries at 241,904 acres (97,895 ha) and upgraded Capitol Reef to full national park status (Evenden et al. 2002, Frye 1998). With the additions in 1969, the park currently stretches nearly 70 miles, from Thousand Lake Mountain almost to Lake Powell.

Capitol Reef National Park is located in west-central Wayne, north-central Garfield, southwestern Emery, and southeastern Sevier counties in central Utah (Figure 1.3.1), about 75 road miles east of Richfield. Elevation within the park ranges from 3,880 feet (1,183 m) at the bottom of Halls Creek to 8,960 feet (2,731 m) on the flank of Thousand Lake Mountain. Annual precipitation averages 5 inches (12.5 cm) at the south end of the park and 12 inches (30 cm) at the higher, north end. Fruita has an annual precipitation of 7.2 inches (18 cm), with 30% coming in the summer monsoon season. The average minimum temperature at Fruita in January is 18°F (−8°C), and in July, 92°F (33°C) (Heil et al. 1993).

### 1.3.2 Geology

The “Capitol” in Capitol Reef comes from the dome-like outcrops of Navajo Sandstone in the Fruita area that resemble the rotunda shape of many capitol buildings. Early geographers applied the term “reef” to the nearly 100-mile-long Waterpocket Fold, which created a formidable barrier to travelers—much like marine reefs impede ship

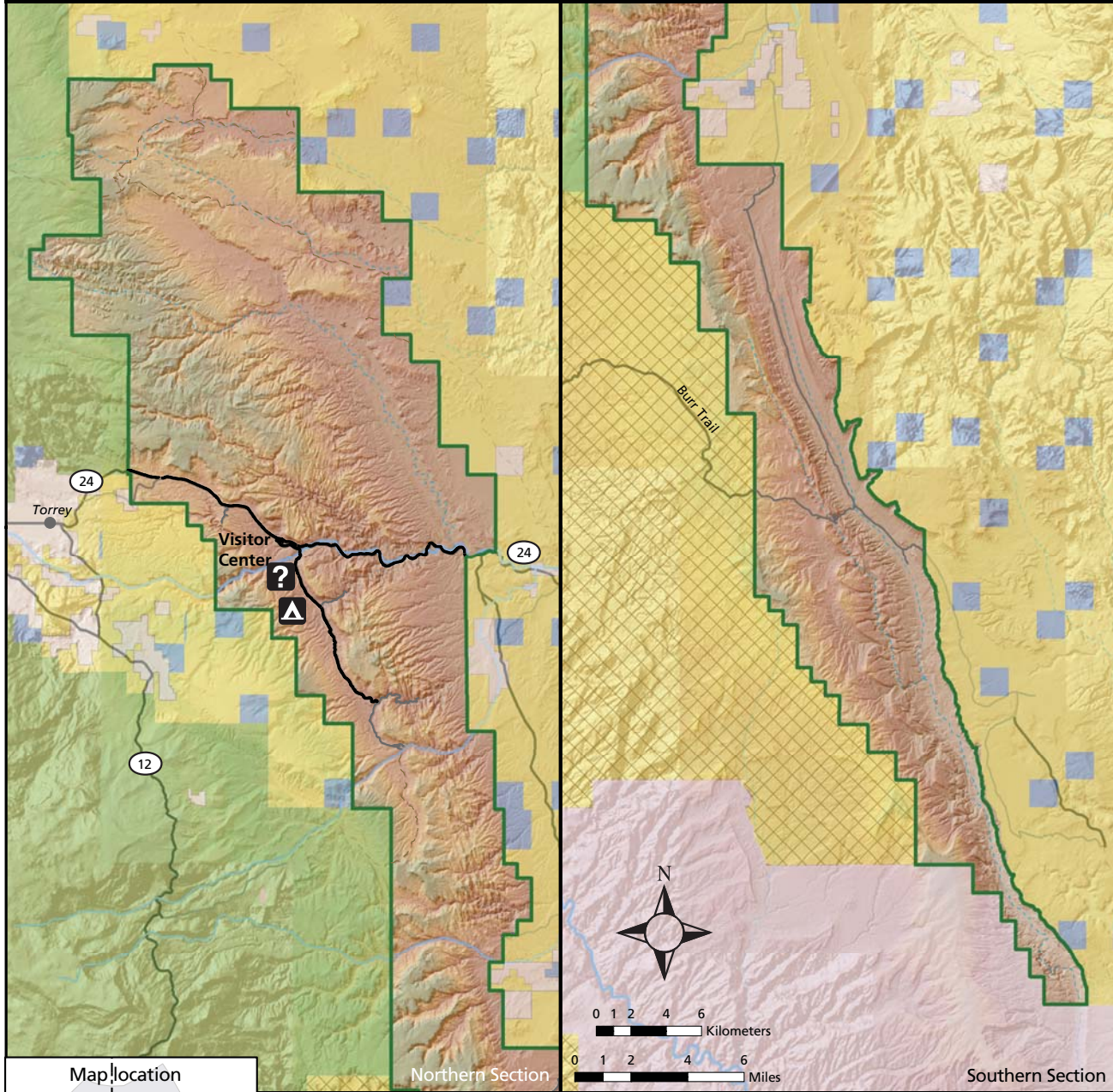
traffic. Waterpocket Fold, an east-dipping monocline extending from Thousand Lake Mountain nearly to Lake Powell, was uplifted during a period of tectonic activity in the late Cretaceous or early Tertiary, along with much of the Colorado Plateau and Rocky Mountains. Different rates of erosion (depending on the nature and position of sedimentary beds) over time carved the deep canyons, domes, arches, and bedrock holes (“waterpockets”) characteristic of the Capitol Reef area (Chronic 1988; Morris et al. 2003).

Rocks exposed in Capitol Reef NP range in age from Permian sandstone to Quaternary volcanic boulders. The oldest strata tend to occur in the western part of the park, becoming progressively younger as one travels eastward, following the tilt of the Waterpocket Fold monocline (Chronic 1988). Permian-age outcrops of the Cutler Group (including the Cedar Mesa and White Rim sandstones), dating to about 265 million years ago, are exposed in the bottom of the Fremont River canyon and Sulphur Creek near the park’s western boundary. These strata were originally deposited as beach and wind-blown sand dunes, and are capped by the marine-derived Kaibab limestone. In the early Triassic, the Capitol Reef area was a coastal tidal flat that was periodically reflooded by marine waters, forming the alternating brown and red mudstones and siltstones of the Moenkopi Formation. During the late Triassic, the park area was buried by river-borne volcanic ash and clay of the Chinle Formation.

Continuing eastward, the Chinle is covered by early Jurassic Wingate Sandstone (derived from wind-blown sand dunes) and sandstone-claystone conglomerates of the fluvial Kayenta Formation. Above the Kayenta are the thick beds of Navajo Sandstone that form the park’s characteristic monolithic cliffs and domes. The Navajo was part of a Sahara-like dune system that extended from Nevada to southern Wyoming. Later in the Jurassic and early Cretaceous, the Capitol Reef area was again inundated by marine intrusions or exposed as a tidal flat. Alternating beds of sandstone, siltstone, mudstone, gypsum, and limestone were laid down during this time as the San Rafael Group (Page Sandstone, Carmel, Entrada, Curtis, and Summerville formations), Morrison Formation, and Dakota Sandstone. Deep marine waters, alternating with delta and coastal plain depositional environments, predominated during the early to mid-Cretaceous, giving rise to the various members of the Mancos Shale and Mesa Verde Formation.



# Capitol Reef National Park Utah



Established August 2, 1937  
1,183–2,731 m elevation  
(3,880–8,960 ft elevation)  
97,895 ha (241,904 ac)



Legend	
Intermittent streams	Grand Staircase-Escalante NM (BLM)
Perennial streams	U.S. Bureau of Land Management
Rivers	Private
Paved roads	State
Unpaved roads	U.S. Forest Service
Unimproved/4WD roads	Glen Canyon NRA (NPS)
Park boundary (NPS)	

MAP CREATED BY ANETH WIGHT, NCPN (DERIVED FROM EVENDEN ET AL. 2002)

Figure 1.3.1. Location of Capitol Reef National Park (Wayne, Garfield, Emery, and Sevier counties, Utah).

The Cenozoic has largely been a time of erosion in Capitol Reef NP, interrupted by periods of volcanic activity about 20–25 million years ago and again as recently as 3.7 million years ago (Morris et al. 2003). Remnants of the last period of volcanism persist in the form of intrusive igneous dikes, sills, and diatremes found sporadically in the South Desert area. Large, black boulders on hills near the visitor center were derived from lava fields on plateaus to the west and north and transported to the park as outwash from glaciation (Chronic 1988).

### 1.3.3 Vegetation

The plant communities of Capitol Reef National Park have been described in detail by Meyer (1990), Heil et al. (1993), and the Northern Colorado Plateau Network (in ed.). These can be aggregated into five general vegetation types that correlate with elevational and moisture gradients. Bentonite and gypsum badlands and low-elevation, clay-rich substrates (such as the Moenkopi, Chinle, and Mancos) are dominated by salt desert scrub vegetation of shadscale (*Atriplex confertifolia*), mat saltbush (*A. corrugata*), Castle Valley saltbush (*A. gardneri* var. *cuneata*), spiny hopsage (*Grayia spinosa*), and crisp-leaf wild buckwheat (*Eriogonum corymbosum* var. *corymbosum*). Low-elevation desert sites with shallow soils over impervious bedrock support stands of blackbrush (*Coleogyne ramosissima*) and rabbitbrush (*Chrysothamnus* spp.) (Heil et al. 1993).

Sagebrush shrublands and grasslands replace desert scrub at higher elevations and on alluvial terraces or sandy soils. These stands may be dominated by big sagebrush (*Artemisia tridentata*), rubber rabbitbrush (*Chrysothamnus nauseosus*), or fourwing saltbush (*Atriplex canescens*). More saline terraces may be locally dominated by greasewood (*Sarcobatus vermiculatus*), and sites over stabilized sand dunes by sand sagebrush (*Artemisia filifolia*) or perennial grasses.

Pinyon-juniper woodlands predominate on thin, rocky soils at low to mid-elevations. These pygmy forests are dominated by two-needle pinyon (*Pinus edulis*) and Utah juniper (*Juniperus osteosperma*), with understories of green ephedra (*Ephedra viridis*) or other low shrubs or grasses. Wind-blasted, rocky ridges are often locally dominated by cushion plant species, while slickrock exposures or ledges may be sparsely vegetated by dwarf mountain mahogany (*Cercocarpus intricatus*).

Mixed conifer forests, which occur at higher elevations on deep, coarse-textured soils, or in shady slot canyons, consist primarily of Ponderosa pine (*Pinus ponderosa*), bitterbrush (*Purshia tridentata*), alder-leaf mountain mahogany (*Cercocarpus montanus*), and greenleaf manzanita (*Arctostaphylos patula*). Quaking aspen (*Populus tremuloides*) may predominate in more mesic sites with rich soils. Western bristlecone pine (*Pinus longaeva*)-cushion plant stands occur locally in the park, and are considered a community of conservation concern by Heil et al. (1993).

Wetlands occur across all elevations and are associated with perennial rivers, streams, or seeps. Fremont cottonwood (*Populus fremontii*) woodlands with an understory of willows (*Salix* spp.) or rabbitbrush occur commonly along the larger watercourses. Stands of common reed (*Phragmites australis*) or Baltic rush (*Juncus arcticus*) may occur among cottonwood forests. At higher elevations, riparian woodlands may be dominated by thinleaf alder (*Alnus incana*), water birch (*Betula occidentalis*), blue spruce (*Picea pungens*), or red-osier dogwood (*Cornus sericea*). Hanging gardens associated with shady cliff alcoves and perennial seeps are uncommon in the park, but are commonly occupied by southern maidenhair fern (*Adiantum capillus-veneris*), giant helleborine (*Epipactis gigantea*), and western poison ivy (*Toxicodendron rydbergii*) (Fowler et al. 2007; Welsh 1989). Many of the riverside terraces in the Fruita area were converted to orchards by Mormon pioneers. These are still maintained by the National Park Service, and contain a number of cultivated fruit species and weeds (Heil et al. 1993).

### 1.3.4 Previous botanical studies

Lester Ward, of the Powell Survey, explored Rabbit Valley and the Aquarius Plateau west of Capitol Reef in 1875, but apparently did not collect botanical specimens within the future park itself. Likewise, Marcus E. Jones conducted field work in the Henry Mountains and vicinity of Hanksville and Loa in 1894, Per Axel Rydberg and E. C. Carlton surveyed the Aquarius Plateau in 1905, and W. D. Stanton botanized the Henry Mountains in 1930, but all apparently bypassed Capitol Reef, itself. The earliest collections known from Capitol Reef National Monument were made by Bertrand F. Harrison, Ben Markham, and Elden Beck, of Brigham Young University, in 1938 (Table 1.3.4, Figure 1.3.4). Noteworthy among the finds that year was the collection of the holotype of Beck's spring-parsley (*Cymopterus beckii*),



**Table 1.3.4. Chronology of plant collecting efforts in Capitol Reef National Park.**

Year	Collector(s)	# of new taxa	Comments
1938–1940	B. F. Harrison, B. Markham, E. Beck, Reed, & W. B. McDougall	7	Bertrand Harrison and colleagues from Brigham Young University collected at least 7 plant taxa in Capitol Reef National Monument over a three-year period, including the holotype of <i>Cymopterus beckii</i> in 1938. NPS regional biologist W. B. McDougall made a cursory checklist of monument flora in 1940 based on a one-day visit (McDougall 1940).
1951	B. F. Harrison	1	B. F. Harrison collected the first record of Springfield's bluestem ( <i>Bothriochloa springfieldii</i> ) while passing through the monument.
1958	F. Swancara & E. Lehnert	40	Frank Swancara and Emery Lehnert made collections of 40 new taxa. These specimens formed the foundation of the Capitol Reef herbarium (CARE).
1961	R. Barneby	1	Rupert Barneby, of the New York Botanical Garden, collected the type of <i>Astragalus harrisonii</i> from Capitol Reef National Monument.
1965–1968	K. Erdman & K. Taylor	11	Kimball Erdman and Kelly Taylor added 11 new species to the monument flora.
1970–1971	R. Nelson	79	Ruth Nelson discovered 79 new species for Capitol Reef National Park, including first records for several rare or locally endemic species, such as Bicknell milkvetch ( <i>Astragalus consobrinus</i> ), Woodruff's milkvetch ( <i>A. woodruffii</i> ), and low hymenoxys ( <i>Hymenoxys acaulis</i> var. <i>nana</i> ).
1972	N. D. Atwood & L. Higgins	1	Duane Atwood and Larry Higgins collected the type of <i>Phacelia rafaensis</i> from Capitol Reef National Park.
1973–1975	H. K. Harrison	90	Keith Harrison made nearly 600 collections for the CARE herbarium and documented 90 new taxa for the park flora.
1977–1978	P. Camp, E. Neese, and S. White	38	Pam Camp, of Utah State University, made more than 200 collections in the Halls Creek area of Capitol Reef National Park and Glen Canyon National Recreation Area. Excluding Glen Canyon records, she added 37 new taxa to the flora of Capitol Reef National Park. Elizabeth Neese and S. White discovered <i>Spiranthes diluvialis</i> in Capitol Reef in 1977 (this species was listed as threatened under the Endangered Species Act in 1992).
1980–1981	S. Meyer	186	Susan Meyer made more than 300 collections for the CARE herbarium and added 186 new species to the park flora. Meyer (1982) compiled a checklist of 512 plant species for the park.
1982	N. D. Atwood, S. Goodrich, S. Welsh, and E. Neese	4	Stan Welsh and colleagues discovered 4 new species for the park, including the type of <i>Erigeron maguirei</i> var. <i>harrisonii</i> (no longer considered distinct from <i>E. maguirei</i> ).
1984–1985	J. Lichthardt, S. Welsh, and E. Neese	7	Juanita Lichthardt, Stan Welsh, and Elizabeth Neese added 7 new species to the park flora.
1986–1988	K. Heil, J. M. Porter, R. Fleming, and W. Romme	353	Ken Heil, Mark Porter, and Rich Fleming, of San Juan College, and William Romme, of Fort Lewis College, conducted a multi-year vegetation classification, floristic inventory, and rare-plant survey for Capitol Reef National Park. In the course of collecting more than 650 specimens for the CARE herbarium, this group added 353 new species to the park flora and 33 new rare species, including first records of Rabbit Valley gilia ( <i>Gilia caespitosa</i> ), Winkler's pincushion cactus ( <i>Pediocactus winkleri</i> ), Wright's fishhook cactus ( <i>Sclerocactus wrightiae</i> ), Jones' cycladenia ( <i>Cycladenia humilis</i> var. <i>jonesii</i> ), and Barneby's reed-mustard ( <i>Schoenocrambe barnebyi</i> ). Heil et al. (1993) produced a checklist of the park flora with 759 taxa.
1989–1991	E. Haskell, J. Spence, K. Mason, and K. Heil	3	Eric Haskell, John Spence, Karen Mason, and Ken Heil added first reports of Thunberg's barberry ( <i>Berberis thunbergii</i> ), <i>Dryopteris filix-mas</i> , and cardinal-flower ( <i>Lobelia cardinalis</i> ).
1992–1993	J. Fowler, C. L. May, and J. Hak	0	Jim Fowler and colleagues surveyed hanging garden vegetation in the park, but added no new species to the flora (Fowler et al. 2007).

**Table 1.3.4. Chronology of plant collecting efforts in Capitol Reef National Park, cont.**

Year	Collector(s)	# of new taxa	Comments
1995–1997	T. Clark, D. Clark, K. Harper, R. Van Buren, and Z. Aanderud	2	Tom and Debi Clark discovered the first record of <i>Gilia tenuis</i> (a rare species) in the park. Kim Harper, Renee Van Buren, and Z. Aanderud discovered <i>Gnaphalium wrightii</i> in Capitol Reef NP.
1997–2002	D. Clark	1	Debi Clark and colleagues with the Interagency Rare Plant Team surveyed Capitol Reef and adjacent BLM and USFS lands for rare plants, partly funded by a grant from Canon USA, Inc. <i>Thelesperma subnudum</i> var. <i>alpinum</i> was discovered in the park in 2000 (Clark 2002)
2004	K. Andersen, D. Barnes, K. Harper, & Northern Colorado Plateau Network veg mapping team	3 (+ 25 reported)	Donna Barnes and Kim Harper of Utah Valley State College collected more than 50 specimens for the CARE herbarium, including first records of 2 taxa. Kim Andersen collected one new exotic species and reported 2 others during a survey of noxious weeds (Dewey and Andersen 2005). The Northern Colorado Plateau Network (in ed.) vegetation mapping team reported 23 new species for the park (without vouchers)
2005	R. Harms, W. Fertig, & P. Lesica	7	Rebecca Harms discovered 3 new species for the park during a survey of seeps and springs (Springer et al. 2006). Walter Fertig and Peter Lesica added 4 new species.

named in honor of its discoverer. National Park Service regional biologist W. B. McDougall compiled the first plant checklist for the new monument (mostly prominent trees and shrubs) based on a one-day visit in 1940 (Frye 1998; McDougall 1940).

Botanical research and collecting was sporadic during the Capitol Reef National Monument era. Frank Swancara and Emery Lehnert initiated the Capitol Reef herbarium (CARE) with their collections in 1958. Rupert Barneby visited the monument in 1961 and collected the type specimen of a new species, Harrison’s milkvetch (*Astragalus harrisonii*). Ruth Nelson more than doubled the known flora of the area by adding 79 new species in 1970–1971. Duane Atwood and Larry Higgins, graduate students from Brigham Young University, took the type of San Rafael phacelia (*Phacelia rafaensis*) from the park in 1972 (Welsh 1982).

The pace of new discovery accelerated in the mid-1970s and early 1980s. Keith Harrison made nearly 600 collections for the CARE herbarium from 1973 to 1975, and documented 90 new species for the park. Pam Camp, of Utah State University, collected more than 200 specimens in the Halls Creek drainage area along both sides of the Capitol Reef NP/Glen Canyon National Recreation Area boundary in 1977–1978. Camp discovered at least 37 new species for Capitol Reef NP, but several additional species credited to her in later checklists (Heil et al. 1993) were actually found

on the Glen Canyon side and remain unconfirmed (but potential) for Capitol Reef. Elizabeth Neese and S. White discovered an unusual orchid along the Fremont River in 1977 that was eventually identified as Ute ladies’-tresses (*Spiranthes diluvialis*, federally listed as threatened under the Endangered Species Act since 1992). From 1980 to 1981, Susan Meyer made more than 300 collections from the park and added 186 new species to the flora (increasing it by nearly 40%). Meyer (1982, 1990) published a park checklist identifying 512 taxa. Stan Welsh and colleagues from Brigham Young University conducted a study of grazing impacts on the park in 1982, and discovered the holotype of Maguire’s fleabane (*Erigeron maguirei* var. *harrisonii*, now considered synonymous with var. *maguirei*) (Welsh 1982).

The most comprehensive survey of the flora and vegetation of Capitol Reef NP took place from 1986 to 1988, under the direction of Ken Heil, Mark Porter, and Rich Fleming, of San Juan College, and William Romme, of Fort Lewis College (Heil et al. 1993). This group collected more than 650 specimens for the CARE herbarium in the course of sampling 34 vegetation types. Heil et al. (1993) produced a checklist identifying 759 taxa for the park, of which 353 represented new species. In addition, Heil and his colleagues discovered 33 new rare species for the park, including four of the park’s seven listed threatened or endangered plant species (see Tables 1.3.4 and 3.3).

In the past 20 years, the number of new species discovered in Capitol Reef NP has leveled off (Figure 1.3.4), but not stopped. Rare and uncommon species continue to be discovered, including male fern (*Dryopteris filix-mas*), by John Spence and Karen Mason in 1990, Mussentuchit gilia (*Gilia tenuis*) and alpine greenthread (*Thelesperma subnudum* var. *alpinum*), by Tom and Debi Clark in 1995 and 2000, and Wright's cudweed (*Gnaphalium wrightii*), by Kim Harper and Renee Van Buren in 1997. More recently, Donna Barnes and Kim Harper, from Utah Valley State College, added two new species while conducting general floristic collecting in the park in 2004. Kim

Andersen of Utah State University vouchered or reported three new invasive plant taxa in 2004 (Dewey and Andersen 2005). Vegetation mapping crews from Capitol Reef NP and the Northern Colorado Plateau Network (in ed.) reported 23 new species (without vouchers) in 2004. Rebecca Harms discovered three new riparian species in a 2005 survey of seeps and springs (Springer et al. 2006). Montana botanist Peter Lesica and I collected four new species during the 2005 field season (Table 1.3.4).

Additional details on plant-collecting efforts at Capitol Reef NP can be found in Table 1.3.4.

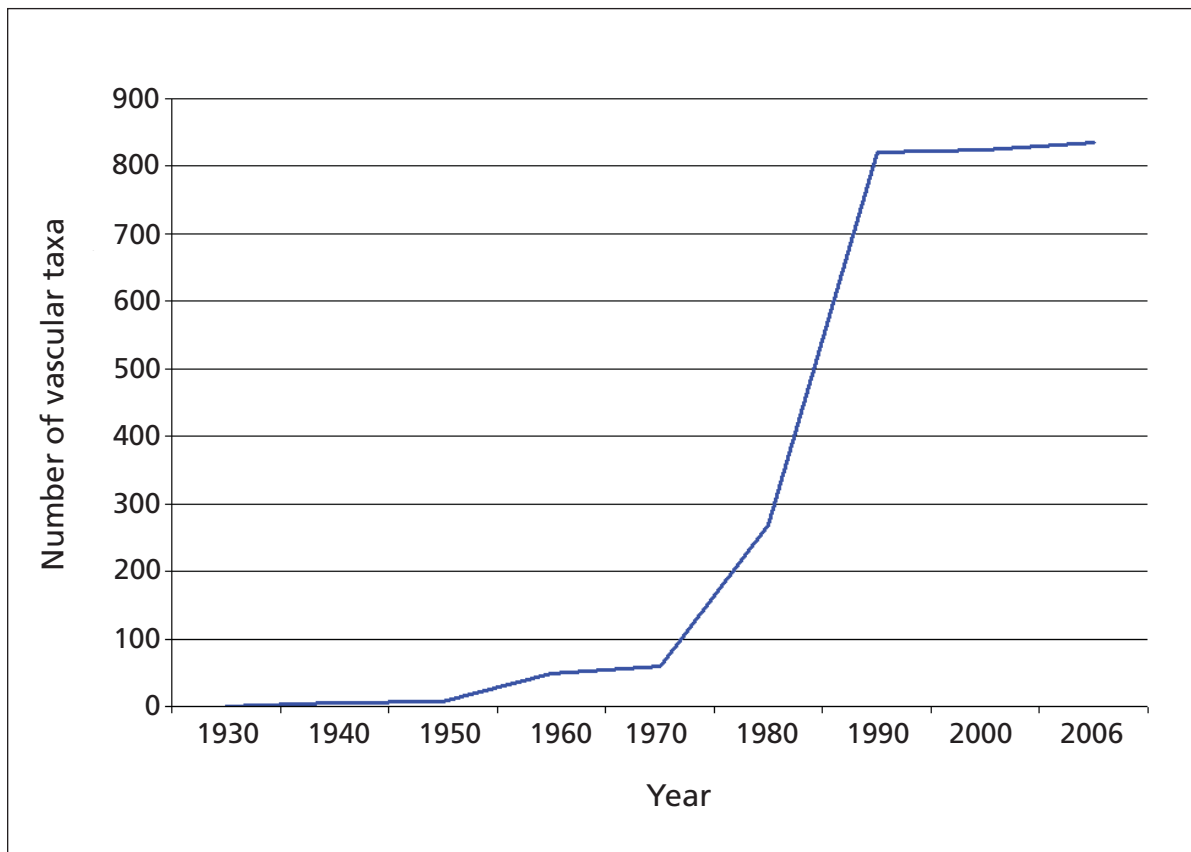


Figure 1.3.4. Increase in the number of plant taxa confirmed as present in Capitol Reef National Park by decade, 1930–2006.



## 2 Methods

In January and February 2005, I reviewed all mounted specimens in the Capitol Reef National Park herbarium (CARE) to determine whether each was correctly identified to species, subspecies, or variety following the nomenclature of Welsh et al. (2003). As necessary, I made corrections and annotations to each specimen and to the voucher records in the park's Automated National Cataloging System (ANCS+) and NPSpecies database. Based on this herbarium work and a review of park references (Heil et al. 1993; Meyer 1982; Dewey and Andersen 2005; Springer et al. 2006), I developed four lists:

1. A revised checklist of species that were present in the park (confirmed by an authenticated voucher; included in Appendices A and D);
2. A list of species that were reported in the literature but not corroborated with a voucher (equivalent to "probably present" in NPSpecies terminology; included in Appendices A and D);
3. A list of potential species ("unconfirmed" in NPSpecies) known from the vicinity of Capitol Reef National Park, using an unpublished list generated by Dr. N. Duane Atwood of Brigham Young University and Albee and others (1988) (Appendix B); and
4. A list of species that are now known to be misidentified or highly questionable (Appendix C).

I annotated each list with supplemental information on life form, geographic range (within

the context of Utah), population size in the park (derived from Heil et al. 1993, NCPN in ed., and field observations), flowering period, distribution across general vegetation types, nativity, data source (collector and collection number from a sample specimen or literature citation), year of earliest collection (from herbarium records), and relevant synonymy and taxonomic problems (based on review of Barkworth et al. 2003, 2007; Barneby 1989; Cronquist 1994; Cronquist et al. 1972, 1977, 1984, 1997; Dorn 2001; Flora of North America Editorial Committee 1993, 1997, 2000, 2002a, 2002b, 2003, 2005, 2006a, 2006b, 2006c; Holmgren et al. 2005; and Weber and Wittmann 2001). I then incorporated the annotations to these lists and label data from the CARE herbarium review into the NPSpecies database for the park.

Work in 2005–2007 focused on confirmation of reported and potential species for the park flora through field surveys and review of collections from state and regional herbaria. To target missing species, I made collecting trips to Capitol Reef NP in May 2005 and September 2006, emphasizing under-sampled wetland, weedy, and late-flowering taxa. I undertook herbarium studies at Brigham Young University (BRY), Utah State University (USU), and the University of Wyoming (RM) in March, June, and October 2006 and February and March 2007, and documented park specimens from the Virtual Herbarium website of the New York Botanical Garden (<http://sciweb.nybg.org/science2/hcol/intf/index.asp>). Finally, I located additional new species reports by examining unmounted collections by NCPN researchers and reviewing plot data from recent vegetation mapping and wetland inventories (NCPN in ed.; Springer et al. 2006).



# 3 Results

## 3.1 Summary of the flora of Capitol Reef National Park

Of the 2,028 vascular plant vouchers in the CARE herbarium examined in 2005, 221 were misidentified (10.9%), 81 were revised to a more current name (4%), 288 had variety or subspecies names added (14.2%), and 1,438 were found to be correctly determined (70.9%). Based solely on these collections, the confirmed flora of Capitol Reef National Park stood at 794 taxa (Fertig 2006). From 2005 to 2007, I located an additional 34 taxa from collections at Brigham Young University (many of which had been reported by Heil et al. 1993, but without a duplicate voucher deposited in the CARE herbarium). Field surveys

in 2005 netted another seven new species from my field collections and those of Rebecca Harms (Springer et al. 2006). Overall, the documented flora of Capitol Reef NP has increased by 41 species (4.9%), bringing the total number of taxa to 835 (Table 3.1, Appendices A, D).

Currently, 52 additional taxa have been reported for Capitol Reef NP but have yet to be corroborated with voucher specimens (Table 3.1, Appendix A). Of these, 43 were reported by Heil et al. (1993) or the Northern Colorado Plateau Network (in ed.). Taken together, the number of confirmed and reported vascular plant taxa in Capitol Reef NP stands at 887 taxa (Table 3.1, Appendix A).

At the start of the 2006 field season, I recognized 216 taxa as potentially occurring in Capitol Reef NP, based on the proximity of the park to known

**Table 3.1. Statistical summary of the flora of Capitol Reef National Park.**

Category	Number confirmed in park	Number additionally reported for park	Total
<b>Taxonomic diversity</b>			
Total taxa (including varieties and subspecies)	835	52	887
Full species (excluding varieties and subspecies)	786	45	831
Families	90	1	91
<b>Life form diversity</b>			
Tree taxa	49	2	51
Shrub taxa	115	8	123
Perennial forb taxa	396	31	427
Annual forb taxa	135	4	139
Perennial graminoid taxa	108	6	114
Annual graminoid taxa	22	1	23
Fern taxa	10	0	10
<b>Biogeographic diversity</b>			
Introduced taxa	119	3	122
Native taxa			
Locally endemic taxa	26	1	27
Regionally endemic taxa	110	5	115
Disjunct taxa	1	0	1
Peripheral taxa	8	0	8
Sparse taxa	14	1	15
Widespread taxa	557	42	599
<i>Total native taxa</i>	<i>716</i>	<i>49</i>	<i>765</i>

The number of taxa and families is based on taxonomic concepts of Welsh et al. (2003). See Appendices, "Codes and Definitions", for an explanation of the various categories.



populations (Albee et al. 1988, Fertig 2006). At least 24 of these species were found to occur in the park based on field collections or relocated herbarium specimens in 2005–2007. The current number of potential species that I am recognizing for Capitol Reef NP is 192 (Appendix B).

Of the original pool of species documented or reported for Capitol Reef NP, I found 117 taxa to be falsely reported based on misidentified voucher specimens in the CARE and BRY herbaria. I consider an additional six species cited (but not vouchered) by the NCPN vegetation mapping team (NCPN in ed.) to be questionable based on the absence of suitable habitat or the distance of Capitol Reef NP to the known or expected range of each species (Appendix C).

The confirmed and reported flora of Capitol Reef NP represents 24.7% of the 3,594 native and naturalized taxa documented for the state of Utah by Welsh et al. (2003) and 60.3% of the state's 151 plant families (Table 3.1). Within Wayne and Garfield counties, the park flora captures 57.3% of the 1,547 taxa reported by Welsh et al. (2003). At the ecoregional scale, Capitol Reef NP contains 52.4% of the 1,694 species reported for the Utah portion of the Colorado Plateau (Shultz et al. 2006).

### 3.2 Life form and biogeographic diversity

Although ecologically dominant, tree and shrub species make up only 19.6% of the confirmed and reported plant taxa of Capitol Reef National Park (Table 3.1). Perennial forbs are the most species-rich life form in the park's flora, with 427 known and reported taxa (48.1% of the total flora). About 18% of the flora is comprised of annual forbs and grass-like plants. Like trees and shrubs, perennial graminoids are ecologically important but relatively species-poor, representing 12.2% of the total flora. The diversity of ferns and fern-allies in Capitol Reef NP is especially low (1.1%) (Table 3.1).

Of the park's 765 native taxa, 599 (78.3%) are widespread across Utah and western North America. Only 27 species (3.5% of the total native flora of the park) have extremely limited global distributions (local endemics found within an area of less than 1° of latitude × 2° degrees of longitude; see Appendix A for complete definitions of biogeographic categories). Regional endemics (largely restricted to the Colorado Plateau) com-

prise an additional 15% of the park's native flora (Table 3.1). Disjunct, peripheral, and sparse species make up just 3.1% of the total native flora.

### 3.3 Plants of special concern

With seven listed species, Capitol Reef National Park has the largest number of threatened or endangered plant species of any park unit in the Northern Colorado Plateau Network (Table 3.3). At least 18 additional park taxa were formerly candidates for potential listing (Category 2 or 3C) under the Endangered Species Act (UDWR 1998). Eight of these taxa are currently listed as sensitive by the Utah Bureau of Land Management and U.S. Forest Service. The Utah Division of Wildlife Resources Conservation Data Center (UTCDC) lists 61 taxa from Capitol Reef NP as species of concern (UDWR 1998).

Heil's wild buckwheat (*Eriogonum corymbosum* var. *heilii*) was described as a new taxon by James Reveal in 2004 (Flora of North America Editorial Committee 2005) and is apparently restricted to Thousand Lake Mountain in Capitol Reef NP and adjacent Fishlake National Forest. It presently has no legal status but research on its distribution and potential management needs should be considered a high priority. Several recent studies have focused on mapping the distribution of the park's threatened, endangered and sensitive species (Clark 1999a, 1999b, 2001a, 2001b, 2002; Heil et al. 1993), monitoring populations (Fertig et al. 2005 and Capitol Reef references cited therein), and researching pollination biology (Tepedino et al. 2003).

### 3.4 Non-native species and noxious weeds

Introduced plant species (not historically native to Utah or North America) make up 13.8% of the confirmed and reported flora of Capitol Reef National Park (Table 3.1). This figure is comparable to the statewide average of 13.5% non-native species (Fertig 2007; Welsh et al. 2003). Of the 122 introduced plant species confirmed or reported for Capitol Reef NP (Table 3.1), only three—Russian knapweed (*Centaurea repens*), field bindweed (*Convolvulus arvensis*), and quackgrass (*Elymus repens*)—are listed as noxious by the State of Utah (State of Utah Department of Agriculture and Food 2007). Heil et al. (1993) and Dewey and Andersen (2005) conducted surveys of non-native and noxious weeds and mapped the distribution of selected species. Since the mid-1980s, several



eradication efforts have been implemented to contain the spread of five-stamen tamarisk (*Tamarix chinensis*), Russian olive (*Elaeagnus angustifolia*),

and tree-of-heaven (*Ailanthus altissima*) along the Fremont River, Sulphur Creek, and Halls Creek Narrows (Evenden et al. 2002).

**Table 3.3. Plant species of conservation concern from Capitol Reef National Park.**

Family	Species	Common name	TNC global rank	Federal legal status	UTCDC status
Apocynaceae	<i>Cycladenia humilis</i> var. <i>jonesii</i>	Jones' cycladenia	G3G4T2	USFWS: Threatened	Rare, S2
Betulaceae	<i>Ostrya knowltonii</i>	western hop-hornbeam	G3G4		Watch, S2
Boraginaceae	<i>Cryptantha capitata</i>	head cryptanth	G4		Watch, S2?
Cactaceae	<i>Opuntia basilaris</i> var. <i>heilii</i>	Heil's beavertail	G5T2T3		Rare, S1
Cactaceae	<i>Opuntia phaeacantha</i> var. <i>major</i>	large pricklypear	G5T5		Periph., S2S3
Cactaceae	<i>Pediocactus winkleri</i>	Winkler's pincushion cactus	G2	USFWS: Threatened	Rare, S1
Cactaceae	<i>Sclerocactus wrightiae</i>	Wright's fishhook cactus	G2	USFWS: Endangered	Rare, S2
Campanulaceae	<i>Lobelia cardinalis</i> ssp. <i>graminea</i>	cardinal-flower	G5		Periph., S2
Chenopodiaceae	<i>Chenopodium graveolens</i> var. <i>neomexicanum</i>	New Mexico goosefoot	G5T5		Periph., S1
Compositae (Asteraceae)	<i>Aster welshii</i>	Welsh's aster	G2		Watch, S3?
Compositae (Asteraceae)	<i>Chrysothamnus nauseosus</i> var. <i>bigelovii</i> *	Bigelow's rabbitbrush	G5 T3T5Q		Periph., S2
Compositae (Asteraceae)	<i>Cirsium calcareum</i> var. <i>calcareum</i>	Caineville thistle	G4TNR		Tax. Prob., SNR
Compositae (Asteraceae)	<i>Cirsium neomexicanum</i> var. <i>utahense</i>	Utah thistle	G5T3T4		Add. Data, S3?
Compositae (Asteraceae)	<i>Erigeron abajoensis</i>	Abajo daisy	G1G2	USFS Region 4: Sensitive	Add. Data, S1S2
Compositae (Asteraceae)	<i>Erigeron maguirei</i>	Maguire's daisy	G2	USFWS: Threatened	Rare, S2
Compositae (Asteraceae)	<i>Erigeron pumilus</i> var. <i>condensatus</i>	vernal daisy	G4G5 T3T4		Infreq., S2?
Compositae (Asteraceae)	<i>Gnaphalium wrightii</i>	Wright's cudweed	G5		Periph., S2?
Compositae (Asteraceae)	<i>Hymenoxys acaulis</i> var. <i>nana</i>	low hymenoxys	G5T1T2	USFWS: former C2 candidate	Rare, S1S2
Compositae (Asteraceae)	<i>Thelesperma subnudum</i> var. <i>alpinum</i>	alpine greenthread	G5T2	USFS Region 4: Sensitive; BLM (UT): Sensitive; USFWS: former C2 candidate	Rare, S1
Compositae (Asteraceae)	<i>Townsendia aprica</i>	Last Chance townsendia	G2	USFWS: Threatened	Rare, S1
Compositae (Asteraceae)	<i>Xylorhiza confertifolia</i>	Henrieville woodyaster	G2G3	USFWS: former 3C	Watch, S2S3
Cruciferae (Brassicaceae)	<i>Arabis demissa</i>	nodding rock cress	G5T4	USFWS: former 3C	Watch, S2?

**Table 3.3. Plant species of conservation concern from Capitol Reef National Park, cont.**

Family	Species	Common name	TNC global rank	Federal legal status	UTCDC status
Cruciferae (Brassicaceae)	<i>Physaria acutifolia</i> var. <i>purpurea</i>	purple twinpod	G5T2		Rare, S2
Cruciferae (Brassicaceae)	<i>Schoenocrambe barnebyi</i>	Barneby's reed-mustard	G1	USFWS: Endangered	Rare, S1
Euphorbiaceae	<i>Tragia ramosa</i> *	noseburn	G5		Periph., S1
Gramineae (Poaceae)	<i>Andropogon glomeratus</i> var. <i>scabriglumis</i>	bushy bluestem	G5		Periph., S2
Gramineae (Poaceae)	<i>Festuca sororia</i>	ravine fescue	G4		Add. Data, S2
Gramineae (Poaceae)	<i>Panicum oligosanthes</i> var. <i>scribnerianum</i>	Scribner panicgrass	G5T5		Infreq., S2?
Gramineae (Poaceae)	<i>Schizachne purpurascens</i>	false melic	G5		Periph., S1
Gramineae (Poaceae)	<i>Stipa scribneri</i>	Scribner needlegrass	G4		Add. Data, SR
Hydrophyllaceae	<i>Nama retrorsum</i> *	Howell's nama	G3	USFWS: former 3C	Watch, S2
Leguminosae (Fabaceae)	<i>Astragalus barnebyi</i>	Barneby's milkvetch	G5T3	USFWS: former 3C	Watch, S2
Leguminosae (Fabaceae)	<i>Astragalus brandegei</i>	Brandegee's milkvetch	G3G4	USFWS: former C2 candidate	Watch, S2
Leguminosae (Fabaceae)	<i>Astragalus consobrinus</i>	Bicknell's milkvetch	G2G3	USFS Region 4: Sensitive	Watch, S2S3
Leguminosae (Fabaceae)	<i>Astragalus desperatus</i> var. <i>petrophilus</i>	rockloving milkvetch	G5T3		Watch, S3
Leguminosae (Fabaceae)	<i>Astragalus flavus</i> var. <i>argillosus</i>	clay milkvetch	G5T3		Tax. Prob., SNR
Leguminosae (Fabaceae)	<i>Astragalus harrisonii</i>	Harrison's milkvetch	G2G3	USFWS: former 3C	Watch, S2S3
Leguminosae (Fabaceae)	<i>Astragalus laccoliticus</i>	lacolite milkvetch	G5T2?		Rare, S2?
Leguminosae (Fabaceae)	<i>Astragalus malacoides</i>	Kaiparowits milkvetch	G3	USFWS: former 3C	Watch, S3
Leguminosae (Fabaceae)	<i>Astragalus pardalinus</i>	panther milkvetch	G3?	USFWS: former 3C	Watch, S3?
Leguminosae (Fabaceae)	<i>Astragalus wardii</i> *	Ward's milkvetch	G3		Watch, S3
Leguminosae (Fabaceae)	<i>Astragalus woodruffii</i>	Woodruff's milkvetch	G3	USFWS: former 3C	Watch, S3
Leguminosae (Fabaceae)	<i>Psoralidium junceum</i>	rush scurfpea	G3		Watch, S3
Leguminosae (Fabaceae)	<i>Psoralidium lanceolatum</i> var. <i>stenophyllum</i>	slenderleaf scurfpea	G5TNR		Tax. Prob., S3?
Leguminosae (Fabaceae)	<i>Psoralethamnus thompsoniae</i> var. <i>thompsoniae</i> *	Thompson's indigo-bush	G3?T3?	USFWS: former 3C	Watch, S3?
Nyctaginaceae	<i>Mirabilis linearis</i> var. <i>decipiens</i>	New Mexico umbrellawort	G5T5		Tax. Prob., S2?

**Table 3.3. Plant species of conservation concern from Capitol Reef National Park, cont.**

Family	Species	Common name	TNC global rank	Federal legal status	UTCDC status
Orchidaceae	<i>Habenaria zothecina</i>	alcove bog-orchid	G2	BLM (UT): Sensitive; USFWS: former C2 candidate	Rare, S2
Orchidaceae	<i>Spiranthes roman-zoffiana</i> var. <i>diluvialis</i> ( <i>S. diluvialis</i> )**	Ute ladies'-tresses	G2	USFWS: Threatened	Rare, S1
Polemoniaceae	<i>Gilia caespitosa</i>	Rabbit Valley gilia	G2	USFS Region 4: Sensitive; USFWS: former C1 candidate	Rare, S1
Polemoniaceae	<i>Gilia imperialis</i>	cataract gilia	G4T2	BLM (UT): Sensitive	Rare, S2
Polemoniaceae	<i>Gilia tenuis</i>	Mussentuchit gilia	G1	BLM (UT): Sensitive; USFWS: former C2 candidate	Rare, S1
Polygonaceae	<i>Eriogonum corymbosum</i> var. <i>heilii</i>	Heil's wild buckwheat	G5T?		
Polygonaceae	<i>Eriogonum leptophyllum</i>	slenderleaf wild buckwheat	G3G4		Watch, S1
Polygonaceae	<i>Eriogonum tumulosum</i>	woodside wild buckwheat	G3Q	USFWS: former 3C	Watch, S2
Polypodiaceae (Adiantaceae, Sinopteridaceae)	<i>Pellaea limitanea</i>	border cloak-fern	G4G5		Periph., S1
Polypodiaceae (Aspleniaceae, Woodsiaceae)	<i>Woodsia oregana</i>	Oregon woodsia	G5T4?		Periph., S1
Primulaceae	<i>Primula specuicola</i>	cave primrose	G4Q	USFWS: former 3C	Watch, S3
Scrophulariaceae	<i>Penstemon caespitosus</i> var. <i>desertipicti</i>	painted penstemon	G5T3?		Watch, S2?
Scrophulariaceae	<i>Penstemon scariosus</i> var. <i>scariosus</i>	plateau penstemon	G4T3T4		Watch, S3S4
Umbelliferae (Apiaceae)	<i>Cymopterus beckii</i>	Beck's spring-parsley	G1	USFS Region 4: Sensitive; BLM (UT): Sensitive; USFWS: former C2 candidate	Rare, S1
Umbelliferae (Apiaceae)	<i>Lomatium junceum</i>	rush lomatium	G3		Watch, S2S3
Vitaceae	<i>Parthenocissus vitacea</i>	thicket-creeper	G5		Periph., S1

This list is derived from Utah Division of Wildlife Resources (1998). All species are confirmed as present and extant unless indicated by "\*" (reported) or "\*\*" (historical or extirpated).

Codes: **TNC global rank** assesses abundance and conservation priority on a scale of 1–5 (1 being extremely vulnerable and 5 being secure) for full species (G) and varieties or subspecies (T) across their entire range. A "?" indicates uncertainty in the rank, Q = taxonomic questions, U = unknown, and NR = not ranked. A comparable scoring system is used to measure state abundance (S) in Utah under the column UTCDC status.

Under **legal status**, USFWS = US Fish and Wildlife Service. C2 = category 2 candidate (a former category used for taxa that might warrant being proposed for Threatened or Endangered status following additional research). C3 = category 3 candidates (species dropped from consideration for listing). USFS = U.S. Forest Service. BLM = U.S. Bureau of Land Management.

**UTCDC status** includes conservation categories adopted by the state natural heritage program to prioritize endemic and rare plant taxa (Utah Division of Wildlife Resources 1998). These categories include: Historical (presumed extinct or only known historically through their range), Rare (plants with rangewide viability concerns), Watch (regional endemics without rangewide viability concerns), Peripheral (rare or uncommon in Utah, but more common rangewide), Infrequent (plants occur infrequently over western US), Taxonomic Problems (validity of species, subspecies, or variety has been questioned), Additional Data (species appear rare, but more information needed before being assigned to a different category).



## 4 Discussion

Data on the flora of Capitol Reef National Park developed slowly in the early decades of the park's existence, but greatly increased starting in 1970, with the efforts of Ruth Nelson and, later, Susan Meyer. Over 40% of the park's flora (and a large percentage of its rarest species) were discovered during the floristic and vegetation studies of Heil et al. (1993) in the late 1980s. Presently, the documented and reported flora of Capitol Reef National Park stands at 887 taxa (Tables 3.1 and 3.3, Figure 1.3.4, Appendix A). Based on available habitats and proximity, at least another 192 plant taxa may occur within the park (Appendix B). Should all of these potential species be found, the documented flora of the park would increase by

nearly 18%. Many of the "missing" potential or reported taxa consist of cryptic species that flower late in the growing season, or occur in under-sampled wetland or weedy habitats. Confirmation of reported species should remain a high priority, as reports for some of these taxa may ultimately prove to be erroneous. Work is especially needed in the upper Deep Creek and Halls Creek drainages, at the extreme northern and southern ends of the park, to confirm species reported by Heil et al. (1993) and Camp (1978) that may actually occur outside the park. Additional studies would also be useful to better refine the abundance and distribution of species of high management interest (especially rare plants and invasive non-natives).



## 5 Literature Cited

- Albee, B. J., L. M. Shultz, and S. Goodrich. 1988. Atlas of the vascular plants of Utah. +Occasional Publ. 7. Salt Lake City: Utah Museum of Natural History. 670 pp.
- Barkworth, M. E., K. M. Capels, S. Long, and M. B. Piep, eds. 2003. Magnoliophyta: Commelinidae (in part): Poaceae, part 2. Flora of North America north of Mexico, volume 25. New York: Oxford University Press. 783 pp.
- Barkworth, M. E., K. M. Capels, S. Long, L. K. Anderton, and M. B. Piep, eds. 2007. Magnoliophyta: Commelinidae (in part): Poaceae, part 1. Flora of North America north of Mexico, volume 24. New York: Oxford University Press. 911 pp.
- Barneby, R. C. 1989. Volume 3, Part B. Fabales, in Cronquist, A., A. H. Holmgren, N. H. Holmgren, J. L. Reveal, and P. K. Holmgren, eds., Intermountain flora: Vascular plants of the Intermountain West, U.S.A. Bronx, N.Y.: New York Botanical Garden. 279 pp.
- Camp, P. A. 1978. Ecological reconnaissance, Halls Creek, Capitol Reef National Park. Department of Botany, Utah State University, Logan, Ut.
- Chronic, H. 1988. Pages of stone, geology of western national parks and parks: Grand Canyon and the Plateau Country. Seattle, Wa.: The Mountaineers. 158 pp.
- Clark, D. J. 1999a. 1999 field survey and final results of a two-year Winkler and San Rafael cactus study. Capitol Reef National Park, Resource Management Division. 55 pp.
- . 1999b. Survey results for Barneby's reed-mustard (*Schoenocrambe barnebyi*). Capitol Reef National Park, Resource Management Division. 3 pp.
- . 2001a. 2001 survey results for Rabbit Valley gilia (*Gilia caespitosa* = *Aliciella caespitosa*). Fishlake National Forest and Capitol Reef National Park. 5 pp.
- . 2001b. 2001 survey results for Mussentuchit gilia (*Gilia tenuis*). Capitol Reef National Park and Bureau of Land Management Richfield Field Office. 7 pp.
- . 2002. Summary of the Interagency Rare Plant Inventory Project, 1999 through 2002. Dixie National Forest, Bureau of Land Management Richfield Field Office, Capitol Reef National Park, and Fishlake National Forest.
- Cronquist, A. 1994. Volume 5, Asterales, Cronquist, A., A. H. Holmgren, N. H. Holmgren, J. L. Reveal, and P. K. Holmgren, eds., Intermountain flora: Vascular plants of the Intermountain West, U.S.A. Bronx, N.Y.: New York Botanical Garden. 496 pp.
- Cronquist, A., A. H. Holmgren, N. H. Holmgren, and J. L. Reveal, eds. 1972. Volume 1, Geological and botanical history of the region, its plant geography and a glossary. The vascular cryptogams and the gymnosperms. Intermountain flora: Vascular plants of the Intermountain West, U.S.A. Bronx, N.Y.: New York Botanical Garden. 270 pp.
- Cronquist, A., A. H. Holmgren, N. H. Holmgren, J. L. Reveal, and P. K. Holmgren, eds. 1977. Volume 6, The monocotyledons. Intermountain flora: Vascular plants of the Intermountain West, U.S.A. Bronx, N.Y.: New York Botanical Garden. 584 pp.
- . 1984. Volume 4, subclass Asteridae (except Asteraceae). Intermountain flora: Vascular plants of the Intermountain West, U.S.A. Bronx, N.Y.: New York Botanical Garden. 573 pp.
- Cronquist, A., N. H. Holmgren, and P. K. Holmgren, eds. 1997. Volume 3, Part A, subclass Rosidae (except Fabales). Intermountain flora: Vascular plants of the Intermountain West, U.S.A. Bronx, N.Y.: New York Botanical Garden. 446 pp.
- Dewey, S., and K. Andersen. 2005. An inventory of invasive non-native plants in Capitol Reef National Park (2004): Final report. Utah State University, Logan, Ut. Weed Science Research Project Report # SD0514A.
- Dorn, R. D. 2001. Vascular plants of Wyoming. Third edition. Cheyenne, Wy.: Mountain West Publishing. 412 pp.
- Even-den, A., M. Miller, M. Beer, E. Nance, S. Daw, A. Wight, M. Estenson, and L. Cudlip. 2002. Northern Colorado Plateau Vital Signs Network and Prototype Cluster, plan for natural resources monitoring: Phase I report, October 1, 2002 [two volumes]. National Park Service, Northern Colorado Plateau Network, Moab, UT. 138 pp + app.

- Fertig, W. 2006. Herbarium and field studies of vascular plant flora of CARE for National Park Service Inventory and Monitoring program. Investigator's Annual Report, National Park Service. 2 pp.
- Fertig, W. 2007. Introduced and naturalized plants of Utah. *Sego Lily* 30(5):7–11.
- Fertig, W., M. Beer, and R. DenBleyker. 2005. Monitoring protocol for selected threatened, endangered, and sensitive plant species of Capitol Reef National Park and partner federal land management agencies. Northern Colorado Plateau Network, Moab, UT. 28 pp. + 12 appendices.
- Flora of North America Editorial Committee. 1993. Pteridophytes and Gymnosperms. *Flora of North America north of Mexico*, volume 2. New York: Oxford University Press. 475 pp.
- . 1997. Magnoliophyta: Magnoliidae and Hamamelidae. *Flora of North America north of Mexico*, volume 3. New York: Oxford University Press. 590 pp.
- . 2000. Magnoliophyta: Alismatidae, Arecidae, Commelinidae (in part), and Zingiberidae. *Flora of North America north of Mexico*, volume 22. New York: Oxford University Press. 352 pp.
- . 2002a. Magnoliophyta: Commelinidae (in part): Cyperaceae. *Flora of North America north of Mexico*, volume 23. New York: Oxford University Press. 608 pp.
- . 2002b. Magnoliophyta: Liliidae: Liliales and Orchidales. *Flora of North America north of Mexico*, volume 26. New York: Oxford University Press. 723 pp.
- . 2003. Magnoliophyta: Caryophyllidae, part 1. *Flora of North America north of Mexico*. Volume 4. New York: Oxford University Press. 559 pp.
- . 2005. Magnoliophyta: Caryophyllidae, part 2. *Flora of North America north of Mexico*. Volume 5. New York: Oxford University Press. 656 pp.
- . 2006a. Magnoliophyta: Asteridae, part 6: Asteraceae, part 1. *Flora of North America north of Mexico*. Volume 19. New York: Oxford University Press. 579 pp.
- . 2006b. Magnoliophyta: Asteridae, part 7: Asteraceae, part 2. *Flora of North America north of Mexico*. Volume 20. New York: Oxford University Press. 666 pp.
- . 2006c. Magnoliophyta: Asteridae, part 8: Asteraceae, part 3. *Flora of North America north of Mexico*. Volume 21. New York: Oxford University Press. 616 pp.
- Fowler, J. F., N. L. Stanton, and R. L. Hartman. 2007. Distribution of hanging garden vegetation associations of the Colorado Plateau, USA. *Journal Botanical Research Institute Texas* 1(1):585-607.
- Frye, B. J. 1998. From barrier to crossroads: An administrative history of Capitol Reef National Park. Volumes I & II. U.S. Department of Interior, National Park Service, Intermountain Region, Cultural Resources Selections, Denver, Co.
- Heil, K. D., J. M. Porter, R. Fleming, and W. H. Romme. 1993. Vascular flora and vegetation of Capitol Reef National Park, Utah. Technical Report NPS/NAUCARE/NRTR-93/01.
- Holmgren, N. H., P. K. Holmgren, and A. Cronquist. 2005. Volume 2, Part B, subclass Dilleniidae. *Intermountain flora: Vascular plants of the Intermountain West, U.S.A.* Bronx, N.Y.: New York Botanical Garden. 488 pp.
- Margules, C. R., and R. L. Pressey. 2000. Systematic conservation planning. *Nature* 405:243–253.
- McDougall, W. B. 1940. Special report: Capitol Reef National Monument. Capitol Reef National Park archives.
- Meyer, S. E. 1982. Plant checklist: Capitol Reef National Park. Capitol Reef Natural History Association, Torrey, Ut.
- . 1990. Places in the Sun: Story of Capitol Reef Plants. Capitol Reef Natural History Association, Torrey, Ut.
- Morris, T. H., V. Wood Manning, and S. M. Ritter. 2003. Geology of Capitol Reef National Park. Pages 84–105 in Sprinkel, D. A., T. C. Chidsey, Jr., and P. B. Anderson, eds., *Geology of Utah's parks and monuments*. Utah Geological Association Publication 28 (second edition).
- National Park Service. 2000. Management policies. U.S. Department of Interior, National Park Service, Washington, DC. Publication



- # NPS D1416. 137 pp.
- Northern Colorado Plateau Network (NCPN).  
in ed. Capitol Reef National Park vegetation  
classification and mapping project. Natural  
Resource Technical Report. National Park  
Service, Denver, Co.
- Noss, R. F., and A. Y. Cooperrider. 1994. Saving  
Nature's legacy: Protecting and restoring  
biodiversity. Washington, D.C.: Island Press.  
416 pp.
- Shultz, L. M., R. D. Ramsey, and W. Lindquist.  
2006. Revised atlas of Utah plants. College  
of Natural Resources, Utah State University,  
Logan, Ut. <http://earth.gis.usu.edu/plants>.
- Springer, A. E., L. E. Stevens, and R. Harms.  
2006. Inventory and classification of  
selected National Park Service springs on  
the Colorado Plateau. Northern Arizona  
University, Flagstaff, Az. NPS Coopera-  
tive Agreement # CA 1200-99-009; Task #  
NAU-118.
- State of Utah Department of Agriculture and  
Food. 2007. Utah noxious weed list. [http://  
ag.utah.gov/plantind/noxious\\_weeds.html](http://ag.utah.gov/plantind/noxious_weeds.html).
- Tepedino, V. J., D. Alston, and T. Toler. 2003.  
Integrated pest management: T&E pollina-  
tors. Interim Report, December. USDA-  
ARS Bee Biology and Systematics Labora-  
tory, Department of Biology, Utah State  
University, Logan, Ut.
- Utah Division of Wildlife Resources (UDWR).  
1998. Inventory of sensitive species and  
ecosystems in Utah. Endemic and rare  
plants of Utah: An overview of their distri-  
bution and status. Report prepared for the  
Utah Reclamation Mitigation and Conser-  
vation Commission and U.S. Department of  
the Interior. 566 pp + app.
- Weber, W. A., and R. C. Wittmann. 2001. Colo-  
rado flora: Western Slope. Third edition.  
Boulder: University Press of Colorado. 488  
pp.
- Welsh, S. L. 1982. Utah plant types: Historical  
perspective, 1840 to 1981. Annotated list  
and bibliography. *Great Basin Naturalist*  
42:1–44.
- . 1989. On the distribution of Utah's hanging  
gardens. *Great Basin Naturalist* 49:1–30.
- Welsh, S. L., N. D. Atwood, S. Goodrich, and L.  
C. Higgins. 2003. A Utah flora. Third edition,  
revised. Provo, Ut.: Brigham Young Univer-  
sity. 912 pp.



# Appendices

The following appendices contain annotated checklists of the vascular flora of Capitol Reef National Park.

Appendix A lists all species that have been confirmed for the flora with an authenticated voucher specimen (including extant and historical records) or that have been reliably reported for the park in the literature (Dewey and Andersen 2005; Heil et al. 1993; Meyer 1982; NCPN in ed.). Vouchers were examined from the CARE herbarium and collections from Brigham Young University (BRY), Utah State University (USU), the University of Wyoming (RM), and the digital museum database of the New York Botanical Garden (NY). Species entries in Appendix A are organized alphabetically by family and genus.

Appendix B includes species that may potentially occur within Capitol Reef National Park based on the proximity of the park to other populations or the presence of suitable habitat.

Appendix C lists species that have been previously reported for Capitol Reef National Park but are now considered erroneous because they are based on misidentified specimens or questionable literature records.

Appendix D contains the same confirmed, historical, and reported taxa as in Appendix A, but organized by life form rather than by family in order to better meet the needs of NPS interpretive specialists.

The codes and references for each field in the appropriate appendices are summarized below.

## Family (Appendices A, B, C, and D)

Family concepts and nomenclature follow *A Utah Flora* (Welsh et al. 2003). Alternative family names and treatments from other regional floras (Dorn 2001; Flora of North America Editorial Committee 1993, 2002b; Holmgren et al. 2005; Weber and Wittman 2001) are listed in parentheses.

## Species name (Appendices A, B, C, and D)

Nomenclature for scientific names and taxonomic concepts is derived from Welsh et al. (2003). Scientific names are listed in alphabetical rather than phylogenetic order.

## Synonyms/Taxonomic notes (Appendices A, B, and C)

Pertinent synonyms are included for species with alternative scientific names in other recent state and regional floras (Barkworth et al. 2003, 2007; Barneby 1989; Cronquist 1994; Cronquist et al. 1972, 1977, 1984, 1997; Dorn 2001; Flora of North America Editorial Committee 1993, 1997, 2000, 2002a, 2002b, 2003, 2005, 2006a, 2006b, 2006c; Holmgren et al. 2005; Weber and Wittmann 2001). No effort has been made to identify additional synonyms from monographs and floras preceding the early 1970s.

## Common name (Appendices A, B, C, and D)

Common names are derived primarily from Welsh et al. (2003) and the *Intermountain Flora* (Barneby 1989; Cronquist 1994; Cronquist et al. 1972, 1977, 1984, 1997; Holmgren et al. 2005).

## Life form (Appendices A, B, C, and D)

Life form is based on the stature and growth habit of typical members of a species at reproductive maturity. **Trees** are woody perennials with a single stem or trunk and are typically over 3.5 m tall. **Shrubs** are woody perennials with one to many trunks arising from near the base of the plant and are usually less than 3.5 m tall. **Perennial Forbs (PerF)** are broad-leaved dicots or monocots with non-woody stems (at least above ground level) that live for multiple years. **Annual Forbs (AnnF)** are broad-leaved dicots or monocots with non-woody stems that complete their life cycle (mature, flower, and die) in one year. **Perennial Graminoids (PerG)** are linear-leaved, grass-like monocots that live for multiple years. **Annual Graminoids (AnnG)** are linear-leaved, grass-like monocots that complete their life cycle (mature, flower, and die) in one year. **Ferns and fern-allies (Fern)** are non-flowering vascular plants that reproduce by spores.

## Range (Appendices A, B, and C)

Range represents the distribution of a species within Utah and the state's contribution to the plant's overall global range. **Disjunct (Disj)** taxa have their Utah distribution separated from the main, contiguous portion of their range by a gap of more than 800 km (ca 500 miles). **Introduced (Intro)** taxa are those that are not native to Utah or North America but that have become naturalized (breeding on their own without human assistance). **Local Endemics (LocEn)** are taxa

whose entire global range is restricted to an area of less than 16,500 km<sup>2</sup> (ca 6,370 mi<sup>2</sup>, or 1° of latitude × 2° of longitude). Peripheral (**Periph**) taxa have a widespread global distribution but occur at the margin of their contiguous range in Utah and occupy less than 5% of the state's area (usually only within a few miles of the state border). Regional Endemics (**RegEn**) are taxa with a global range of 16,500–250,000 km<sup>2</sup> (an area about the size of the state of Wyoming). **Sparse** taxa occur widely across Utah or North America, but their range within Utah is small and patchy, with populations restricted to specialized or uncommon habitats. Widespread (**Wide**) taxa have global ranges exceeding 250,000 km<sup>2</sup> and occur over at least 10% of the state.

#### **Park status (Appendices A, C, and D)**

Park status identifies whether a species is Present (**Pres**), Historical (**Hist**), or Reported (**Rep**) for Capitol Reef National Park. Species are considered Present if a confirmed voucher or documented observation has been made within park boundaries since 1970. Historical species have been confirmed with a voucher from the park but have not been relocated since before 1970. Reported species are listed for the park in the literature (Dewey and Andersen 2005; Heil et al. 1993; Meyer 1982; NCPN in ed.), but have not been corroborated with a voucher specimen. Species that may potentially occur in CARE are listed in Appendix B. Rejected taxa (listed in Appendix C) have either been falsely reported (**FalsRep**) in the literature based on misidentified herbarium specimens or are considered Questionable (**Ques?**) because park reports are from well outside their known or expected range.

#### **Pop. size (Appendix A)**

Population size refers to the abundance and frequency with which a species occurs within Capitol Reef National Park. Abundance data are derived from Heil et al. (1993), Northern Colorado Plateau Network (in ed.), and personal observations. Abundant (**Abun**) taxa have large populations, have a broad ecological amplitude (often being dominant in one to several vegetation types), or occur extensively across the park. Common (**Com**) taxa have large local populations but may be restricted to a single vegetation type or do not occur across the entire park. Uncommon (**Unc**) taxa have low-to-medium-sized populations, typically have a narrow ecological amplitude (or at least contribute relatively little to total vegetative cover), or have a small range across the park.

**Rare** taxa usually have low population numbers and are restricted to a single location within the park. A “?” indicates that population size is unknown.

#### **Source (Appendix A)**

Sources are the evidence for the assigned park status. In the case of Present and Historical taxa, sources are herbarium records (with collector, collection number, and repository) that were corroborated during this study. For reported taxa, the source is a published or unpublished reference citing the species within the park. Specimen repositories include the Capitol Reef National Park herbarium (**CARE**), Brigham Young University (**BRY**), Utah State University (**USU**), New York Botanical Garden (**NY**), and the University of Wyoming's Rocky Mountain Herbarium (**RM**).

#### **Year doc. (Appendix A)**

Year documented indicates the first year in which a species was confirmed or reported to occur in Capitol Reef National Park. This year does not necessarily correspond with the date of the voucher specimen cited under Source. “NA” indicates that the first year is not known (used mostly for “reported” taxa).

#### **Comments (Appendices A, B, C, and D)**

This column includes additional comments on the status of a particular species in the park, the place of origin for introduced species, legal status, and other data.

#### **Nativity (Appendix D)**

Nativity indicates whether a species is **native** to Utah or Introduced (**Intro**), based on Fertig (2007).

#### **Flower time (Appendix D)**

Flower time refers to the months in which a species is most likely to be in flower. NA indicates a species that is a non-flowering fern or gymnosperm.

#### **Habitat (Appendix D)**

The distribution of species across generalized habitats in Capitol Reef National Park is indicated by an “x” in the columns SaltDes through Wet and is derived from the Capitol Reef National Park vegetation classification (Northern Colorado Plateau Network, in ed.), Heil et al. (1993), Meyer (1990), and Welsh et al. (2003). **SaltDes**=Salt desert scrub dominated by shadscale (*Atriplex confertifolia*), Castle Valley salt-

bush (*A. gardneri* var. *cuneata*), and blackbrush (*Coleogyne ramosissima*). **Sage**=sagebrush grasslands dominated by big sagebrush (*Artemisia tridentata*), fourwing saltbush (*Atriplex canescens*), and rubber rabbitbrush (*Chrysothamnus nauseosus*). **PJ**=two-needle pinyon (*Pinus edulis*)/Utah juniper (*Juniperus osteosperma*) woodlands/rim-

rock. **MixCon**=Mixed conifer forests of ponderosa pine (*Pinus ponderosa*) and quaking aspen (*Populus tremuloides*). **Wet**=wetlands associated with perennial streams, seeps, and hanging gardens. Additional comments are included for species that are restricted to a particular soil/geologic type or are found mostly in disturbed sites.

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Aceraceae	<i>Acer glabrum</i> var. <i>glabrum</i>	Includes vars. <i>neomexicanum</i> , <i>douglasii</i> , & <i>tripartitum</i>	Rocky Mountain maple	Shrub	Wide	Pres	Unc	Heil 2617 (CARE)	1986	
Aceraceae	<i>Acer negundo</i>	<i>A. negundo</i> var. <i>interius</i> , <i>Negundo aceroides</i> ssp. <i>interius</i>	box elder	Tree	Wide	Pres	Unc	Harrison 1290 (CARE)	1958	
Agavaceae	<i>Yucca angustissima</i>	<i>Y. angustissima</i> var. <i>angustissima</i>	narrowleaved yucca	Shrub	RegEn	Pres	Unc	Camp 548 (CARE)	1978	
Agavaceae	<i>Yucca harrimaniae</i> var. <i>harrimaniae</i>		Harriman's yucca	Shrub	Wide	Pres	Com	Porter 3828 (CARE)	1986	Type locality is Helper, Carbon Co, UT (Trelease s.n. MO)
Alismataceae	<i>Sagittaria cuneata</i>		northern arrowhead	PerF	Wide	Pres	Rare	Heil 2747 (CARE)	1986	
Amaranthaceae	<i>Amaranthus albus</i>		tumble pigweed	AnnF	Intro	Pres	Unc	Meyer 4629 (CARE)	1980	Native to tropical America
Amaranthaceae	<i>Amaranthus blitoides</i>	<i>A. graecizans</i>	prostrate pigweed	AnnF	Wide	Pres	Unc	Porter 4118 (BRY)	1986	
Amaranthaceae	<i>Amaranthus retroflexus</i>		redroot pigweed	AnnF	Intro	Pres	Unc	Porter 4372 (CARE)	1986	Native to Central America
Anacardiaceae	<i>Rhus aromatica</i> var. <i>simplicifolia</i>	<i>R. trilobata</i> var. <i>simplicifolia</i>	squawbush	Shrub	Wide	Pres	Unc	Heil 2553 (CARE)	1966	
Anacardiaceae	<i>Rhus aromatica</i> var. <i>trilobata</i>	<i>R. trilobata</i> var. <i>trilobata</i>	squawbush	Shrub	Wide	Pres	Abun	Swancara 19 (CARE)	1958	
Anacardiaceae	<i>Toxicodendron rydbergii</i>	<i>Rhus radicans</i> , <i>T. radicans</i>	western poison ivy	Shrub	Wide	Pres	Unc	Fleming 368 (CARE)	1987	
Apocynaceae	<i>Amsonia jonesii</i>		Jones' amsonia	PerF	RegEn	Pres	Unc	Porter 4666 (CARE)	1987	
Apocynaceae	<i>Amsonia tomentosa</i> var. <i>stenophylla</i>	<i>A. tomentosa</i> , <i>A. eastwoodiana</i>	tomentose amsonia	PerF	Wide	Pres	Unc	Meyer 4727 (CARE)	1981	Type locality of <i>A. eastwoodiana</i> is Moab vicinity, Grand Co, UT (Rydberg & Garrett 8468 NY)

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Apocynaceae	<i>Apocynum cannabinum</i>	Includes vars. <i>cannabinum</i> , <i>glaberrimum</i> , & <i>angustifolium</i>	common dogbane	PerF	Wide	Pres	Unc	Harrison 1185 (CARE)	1973	
Apocynaceae	<i>Cycladenia humilis</i> var. <i>jonesii</i>	<i>C. jonesii</i>	Jones' cycladenia	PerF	RegEn	Pres	Rare	Heil 3111 (CARE)	1987	Type locality is San Rafael Swell, Emery Co, UT (Jones s.n. CAS). USFWS: Threatened
Asclepiadaceae	<i>Asclepias asperula</i> var. <i>asperula</i>		spider milkweed	PerF	Wide	Pres	Rare	Harrison 1402 (CARE)	1974	
Asclepiadaceae	<i>Asclepias cryptoceras</i> var. <i>cryptoceras</i>	<i>A. cryptoceras</i>	pallid milkweed	PerF	Wide	Pres	Unc	Harrison 935 (CARE)	1973	
Asclepiadaceae	<i>Asclepias labriformis</i>		Circle Cliffs milkweed	PerF	RegEn	Pres	Unc	Nelson 9175 (CARE)	1958	Type locality is Capitol Wash, Wayne Co, UT (Jones 5650 POM)
Asclepiadaceae	<i>Asclepias latifolia</i>		broadleaf milkweed	PerF	Wide	Pres	Rare	Porter 5201 (CARE)	1987	
Asclepiadaceae	<i>Asclepias macrosperma</i>	Included in <i>A. involucrata</i> by some authors	bigseed milkweed	PerF	RegEn	Pres	Unc	Meyer 4522 (CARE)	1971	
Asclepiadaceae	<i>Asclepias ruthiae</i>	<i>A. uncialis</i> ssp. <i>ruthiae</i>	Ruth's milkweed	PerF	RegEn	Pres	Unc	Porter 3770 (CARE)	1981	Type locality is Calif Spring Canyon SE of Castledale, Emery Co, UT (Maguire 18310 UTC)
Asclepiadaceae	<i>Asclepias speciosa</i>		showy milkweed	PerF	Wide	Pres	Unc	Porter 3973 (CARE)	1958	
Asclepiadaceae	<i>Asclepias subverticillata</i>	<i>A. galioides</i>	whorled milkweed	PerF	Wide	Rep	NA	Heil et al. (1993)	NA	Reports from CARE Herbarium based on collections from outside the park.
Berberidaceae	<i>Berberis thunbergii</i>	<i>B. thunbergii</i>	Thunberg's barberry	Shrub	Intro	Pres	Unc	Haskell s.n. (CARE)	1989	Native to Japan

*Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.*

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Berberidaceae	<i>Berberis vulgaris</i>		common barberry	Shrub	Intro	Pres	Unc	Fleming 259 (CARE)	1987	Native to Eurasia
Berberidaceae	<i>Mahonia fremontii</i>	<i>Berberis fremontii</i>	Fremont's mahonia	Shrub	Wide	Pres	Com	Harrison 1377 (CARE)	1958	
Berberidaceae	<i>Mahonia repens</i>	<i>Berberis repens</i>	Oregon-grape	Shrub	Wide	Pres	Unc	Meyer 4533 (CARE)	1980	
Betulaceae	<i>Alnus incana</i> var. <i>occidentalis</i>	<i>A. incana</i> ssp. <i>tenuifolia</i> , <i>A.</i> <i>tenuifolia</i>	thinleaf alder	Shrub	Wide	Pres	Unc	Meyer 4677 (CARE)	1980	
Betulaceae	<i>Betula occidentalis</i>	<i>B. fontinalis</i>	water birch	Tree	Wide	Pres	Unc	Harrison 1190 (CARE)	1973	
Betulaceae	<i>Betula pendula</i>		European white birch	Tree	Intro	Pres	Unc	Heil s.n. (CARE)	1985	Native to Eurasia
Betulaceae	<i>Ostrya knowltonii</i>		western hop- hornbeam	Tree	RegEn	Pres	Rare	Camp s.n. (CARE)	1977	
Bignoniaceae	<i>Catalpa speciosa</i>		showy catalpa	Tree	Intro	Pres	Unc	Harrison 1356 (CARE)	1974	Native to E North America
Boraginaceae	<i>Cryptantha abata</i>		low cryptanth	PerF	RegEn	Pres	Com	Meyer 4760 (CARE)	1971	
Boraginaceae	<i>Cryptantha capitata</i>		head cryptanth	PerF	RegEn	Pres	Unc	Heil 4423 (CARE)	1988	
Boraginaceae	<i>Cryptantha cinerea</i> var. <i>cinerea</i>	Includes <i>C. atwoodii</i>	ashy cryptanth	PerF	Wide	Pres	Com	Heil 3265 (CARE)	1981	
Boraginaceae	<i>Cryptantha cinerea</i> var. <i>jamesii</i>	<i>C. jamesii</i> , <i>Oreocarya</i> <i>suffruticosa</i>	James' cryptanth	PerF	Wide	Pres	Unc	Camp 444 (CARE)	1971	
Boraginaceae	<i>Cryptantha cinerea</i> var. <i>pustulosa</i>	<i>C. pustulosa</i>	San Juan cryptanth	PerF	RegEn	Pres	Unc	Meyer 4547 (CARE)	1980	Type locality is Elk Mts, San Juan Co, UT (Rydberg & Garrett 9320 NY)
Boraginaceae	<i>Cryptantha circumscissa</i>		cushion cryptanth	AnnF	Wide	Pres	Unc	Porter 2396 (CARE)	1981	
Boraginaceae	<i>Cryptantha confertiflora</i>		basin yellow cryptanth	PerF	Wide	Pres	Com	Fleming 355 (CARE)	1980	



**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Boraginaceae	<i>Cryptantha crassipala</i> var. <i>elachantha</i>		thick-seeped cryptanth	AnnF	Wide	Pres	Unc	Meyer 4523 (CARE)	1981	
Boraginaceae	<i>Cryptantha fendleri</i>		sand dune cryptanth	AnnF	Wide	Pres	Unc	Porter 5157 (CARE)	1987	
Boraginaceae	<i>Cryptantha flava</i>	<i>Oreocarya flava</i>	plateau yellow cryptanth	PerF	Wide	Pres	Abun	Harrison 909 (CARE)	1971	
Boraginaceae	<i>Cryptantha flaviculata</i>	<i>Oreocarya flaviculata</i>	yellow-eye cryptanth	PerF	Wide	Pres	Com	Meyer 4483 (CARE)	1971	
Boraginaceae	<i>Cryptantha fulvocanescens</i>	<i>Oreocarya fulvocanescens</i> . Includes vars. <i>fulvocanescens</i> & <i>echinooides</i>	plateau cryptanth	PerF	RegEn	Pres	Abun	Harrison 828 (CARE)	1973	Type locality of var. <i>echinooides</i> is Paria Canyon, Garfield Co, UT (Jones 5297p POM)
Boraginaceae	<i>Cryptantha gracilis</i>		slender cryptanth	AnnF	Wide	Pres	Com	Meyer 4527 (CARE)	1980	
Boraginaceae	<i>Cryptantha humilis</i>	<i>Oreocarya humilis</i> ssp. <i>nana</i>	dwarf cryptanth	PerF	Wide	Pres	Unc	Fleming BC318 (CARE)	1987	
Boraginaceae	<i>Cryptantha mensana</i>	<i>Oreocarya mensana</i>	carbon cryptanth	PerF	RegEn	Pres	Unc	Heil 3275 (CARE)	1973	Type locality is Emery, Emery Co, UT (Jones 5445p POM)
Boraginaceae	<i>Cryptantha micrantha</i>		redroot cryptanth	AnnF	Wide	Pres	Rare	Porter 4676 (CARE)	1987	Type locality is "Southern Utah" (Parry 164)
Boraginaceae	<i>Cryptantha osterhoutii</i>	<i>Oreocarya osterhoutii</i>	Osterhout's cryptanth	PerF	RegEn	Pres	Unc	Atwood & Goodrich 8643 (BRY)	1982	Type locality is Monument Park (Colorado NM), near Grand Junction, Mesa Co., CO (Osterhout 6138 RM)
Boraginaceae	<i>Cryptantha pterocarya</i> var. <i>pterocarya</i>		wing-nut cryptanth	AnnF	Wide	Pres	Unc	Porter 2513 (CARE)	1986	
Boraginaceae	<i>Cryptantha recurvata</i>		recurved cryptanth	AnnF	Wide	Pres	Com	Meyer 4475 (CARE)	1980	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Boraginaceae	<i>Cryptantha rollinsii</i>	<i>Oreocarya rollinsii</i>	Rollins' cryptanth	PerF	RegEn	Pres	Unc	Fleming & Romme 674 (BRY)	1988	Type locality is 22 miles S of Ouray, Uintah Co, UT (Rollins 1715 GH). USFWS: former C2 candidate
Boraginaceae	<i>Cryptantha setosissima</i>		bristly cryptanth	PerF	RegEn	Pres	Unc	Porter 3859 (CARE)	1986	Type locality is Fish Lake, Sevier Co, UT (Ward s.n. GH)
Boraginaceae	<i>Heliotropium convolvulaceum</i>	<i>Euploca convolvulacea</i> spp. <i>californica</i>	bindweed heliotrope	AnnF	Wide	Pres	Unc	Fleming 512 (CARE)	1987	
Boraginaceae	<i>Lappula occidentalis</i> var. <i>cupulata</i>	<i>L. texana</i> , <i>L. redowskii</i> var. <i>cupulata</i> , <i>L. marginata</i>	cupseed stickseed	AnnF	Wide	Pres	Com	Meyer 4466 (CARE)	1980	
Boraginaceae	<i>Lithospermum incisum</i>		showy stoneseed	PerF	Wide	Pres	Com	Harrison 840 (CARE)	1971	
Boraginaceae	<i>Lithospermum multiflorum</i>		southwestern stoneseed	PerF	Wide	Pres	Unc	Meyer 4770 (CARE)	1981	
Boraginaceae (Ehretiaceae)	<i>Tiquilia latior</i>	<i>Coldenia hispidissima</i>	matted tiquila	PerF	RegEn	Pres	Unc	Heil 2859 (CARE)	1981	
Cactaceae	<i>Coryphantha vivipara</i> var. <i>arizonica</i>	<i>Escobaria vivipara</i> var. <i>arizonica</i> . Vars. not recognized in <i>Flora of North America</i> (2003)	Arizona pincushion	PerF	Wide	Pres	Unc	Heil 1 (CARE)	1986	
Cactaceae	<i>Echinocereus triglochidiatus</i> var. <i>melanacanthus</i>	Includes var. <i>inermis</i> . Vars. not recognized in <i>Flora of North America</i> (2003).	claretcup	PerF	Wide	Pres	Abun	Fleming 646 (CARE)	1987	
Cactaceae	<i>Opuntia basilaris</i> var. <i>heilii</i>	<i>O. basilaris</i> var. <i>longiareolata</i>	Heil's beavertail	PerF	RegEn	Pres	Rare	Fleming 630 (CARE)	1988	Type locality is sw of Hanksville, Wayne Co, UT (Neese 5938 BRY)
Cactaceae	<i>Opuntia fragilis</i>	<i>O. fragilis</i> var. <i>brachyartha</i>	brittle pricklypear	PerF	Wide	Pres	Com	Heil 3008 (CARE)	1986	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Cactaceae	<i>Opuntia phaeacantha</i> var. <i>major</i>	Vars. not recognized in <i>Flora of North America</i> (2003)	large pricklypear	PerF	Wide	Pres	Com	Fleming 631 (CARE)	1988	
Cactaceae	<i>Opuntia polyacantha</i> var. <i>polyacantha</i>	<i>Flora of North America</i> (2003) includes vars. <i>rufispina</i> & <i>trichophora</i>	plains pricklypear	PerF	Wide	Pres	Abun	Fleming 376 (CARE)	1987	
Cactaceae	<i>Opuntia polyacantha</i> var. <i>rufispina</i>	Included within <i>O. polyacantha</i> var. <i>polyacantha</i> in <i>Flora of North America</i> (2003)	rufous-spine pricklypear	PerF	Wide	Pres	Unc	Harrison 1950 (BRY)	1975	
Cactaceae	<i>Pediocactus simpsonii</i>	Includes vars. <i>minor</i> & <i>simpsonii</i>	Simpson's hedgehog cactus	PerF	Wide	Pres	Unc	Heil 2593 (CARE)	1986	
Cactaceae	<i>Pediocactus winkleri</i>		Winkler's pincushion cactus	PerF	LocEn	Pres	Rare	Heil 2578 (CARE)	1986	Type locality is E of Capitol Reef, Wayne Co, UT (Winkler s.n. UNM). USFWS: Threatened
Cactaceae	<i>Sclerocactus whipplei</i> var. <i>roseus</i>	<i>S. parviflorus</i> , <i>S. whipplei</i> var. <i>intermedius</i> . Includes <i>S. contortus</i> & <i>S. terrae-canyonae</i>	small-flower fishhook cactus	PerF	Wide	Pres	Unc	Heil 3105 (CARE)	1973	Type locality of <i>S. parviflorus</i> is Glen Canyon, San Juan Co, UT (Clover & Jotter 2398 US)
Cactaceae	<i>Sclerocactus wrightiae</i>		Wright's fishhook cactus	PerF	LocEn	Pres	Unc	Fleming 310 (CARE)	1987	Type locality is San Rafael Ridge, Emery Co, UT (Benson & Benson 16595 POM). USFWS: Endangered
Campanulaceae	<i>Campanula parryi</i>	<i>C. parryi</i> var. <i>parryi</i>	Parry's harebell	PerF	Wide	Pres	Rare	Fleming 168 (CARE)	1986	
Campanulaceae	<i>Lobelia cardinalis</i> ssp. <i>graminea</i>		cardinal-flower	PerF	Periph	Pres	Rare	Heil 2932 (CARE)	1991	
Cannabaceae	<i>Humulus lupulus</i> var. <i>neomexicanus</i>	<i>H. lupulus</i> ssp. <i>americanus</i>	common hops	PerF	Wide	Pres	Unc	Fleming 696 (CARE)	1988	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Capparaceae (Cleomaceae)	<i>Cleome lutea</i>		yellow beeplant	AnnF	Wide	Pres	Unc	Swancara 12 (CARE)	1958	
Capparaceae (Cleomaceae)	<i>Cleome serrulata</i>		Rocky Mountain beeplant	AnnF	Wide	Pres	Rare	Porter 4416 (CARE)	1986	
Capparaceae (Cleomaceae)	<i>Cleomella palmeriana</i> var. <i>palmeriana</i>		Palmer's stinkweed	AnnF	RegEn	Pres	Rare	Porter 2434 (BRY)	1971	Type locality is Green River, Emery Co, UT (Jones s.n. POM)
Caprifoliaceae	<i>Lonicera utahensis</i>		Utah honeysuckle	Shrub	Wide	Rep	NA	Heil et al. (1993)	NA	Specimen has not been relocated. Type locality is Cottonwood Canyon, Salt Lake Co, UT (Watson 477 U5)
Caprifoliaceae (Adoxaceae)	<i>Sambucus caerulea</i>	<i>S. nigra</i> ssp. <i>caerulea</i> , <i>S. caerulea</i>	blue elderberry	Shrub	Wide	Pres	Unc	Porter 3958 (CARE)	1986	
Caprifoliaceae	<i>Symphoricarpos longiflorus</i>		long-flower snowberry	Shrub	Wide	Pres	Unc	Nelson 9592 (CARE)	1971	
Caprifoliaceae	<i>Symphoricarpos orbiculatus</i>		coralberry	Shrub	Intro	Pres	Unc	Fleming 413 (CARE)	1987	Native to E North America
Caprifoliaceae	<i>Symphoricarpos oreophilus</i> var. <i>utahensis</i>	<i>S. rotundifolius</i> , Includes vars. <i>parishii</i> & <i>oreophilus</i>	mountain snowberry	Shrub	Wide	Pres	Unc	Meyer 4520 (CARE)	1980	
Caprifoliaceae (Adoxaceae)	<i>Viburnum opulus</i>	<i>V. opulus</i> var. <i>americanum</i>	snowball-bush	Shrub	Intro	Pres	Unc	Fleming 260 (CARE)	1987	Native to Eurasia and Africa
Caryophyllaceae (Alsiniaceae)	<i>Arenaria fendleri</i> var. <i>eastwoodiae</i>	<i>Eremogone eastwoodiae</i> var. <i>eastwoodiae</i> , <i>A. eastwoodiae</i>	Eastwood's sandwort	PerF	Wide	Pres	Com	Meyer 4749 (CARE)	1981	
Caryophyllaceae (Alsiniaceae)	<i>Arenaria fendleri</i> var. <i>glabrescens</i>	<i>A. kingii</i> ssp. <i>uintahensis</i> , <i>A. kingii</i> ssp. <i>compacta</i> , <i>A. kingii</i> ssp. <i>plateauensis</i> , <i>Eremogone kingii</i> var. <i>glabrescens</i> , <i>E. kingii</i> var. <i>uintahensis</i>	basin sandwort	PerF	Wide	Rep	NA	Heil et al. (1993)	NA	Reports from CARE Herbarium based on collections from outside the park.

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Caryophyllaceae (Asteraceae)	<i>Cerastium fontanum</i>	<i>C. vulgatum</i> , <i>C. fontanum</i> ssp. <i>vulgare</i>	mouse-ear chickweed	PerF	Intro	Pres	Rare	Heil 3567 (CARE)	1987	Native to Eurasia
Caryophyllaceae	<i>Lychnis drummondii</i>	<i>Silene drummondii</i> ssp. <i>drummondii</i> , <i>S. drummondii</i> ssp. <i>striata</i> , includes vars. <i>striata</i> , <i>kruckebergii</i> , & <i>drummondii</i> , <i>Gastrolychnis drummondii</i>	Drummond's catchfly	PerF	Wide	Pres	Rare	Heil 3559 (CARE)	1987	
Caryophyllaceae (Asteraceae)	<i>Paronychia sessiliflora</i>		creeping nailwort	PerF	Wide	Pres	Unc	Porter 4340 (BRY)	1986	
Caryophyllaceae	<i>Saponaria officinalis</i>		bouncing-bet	PerF	Intro	Pres	Unc	Meyer 4658 (CARE)	1980	Native to Europe
Caryophyllaceae	<i>Silene antirrhina</i>		sleepy catchfly	AnnF	Wide	Pres	Unc	Porter 2516 (CARE)	1981	
Caryophyllaceae (Asteraceae)	<i>Stellaria longipes</i> var. <i>longipes</i>	<i>S. longipes</i> ssp. <i>stricta</i> , <i>S. longipes</i> ssp. <i>longipes</i> . Includes var. <i>monantha</i> in <i>Flora of North America</i> (2005)	long-stalk starwort	PerF	Wide	Pres	Rare	Heil 2644 (BRY)	1986	
Celastraceae	<i>Pachystima myrsinites</i>	<i>Paxistima myrsinites</i> , <i>mountain-lover</i>		Shrub	Wide	Pres	Unc	Heil 3287 (CARE)	1987	
Chenopodiaceae	<i>Allenrolfea occidentalis</i>		iodine bush	Shrub	Wide	Pres	Rare	Lichthardt 505 (CARE)	1985	Type locality is Raft River Valley, Box Elder Co, UT (Watson 995 US)
Chenopodiaceae	<i>Atriplex argentea</i> var. <i>argentea</i>	<i>A. argentea</i>	silver orach	AnnF	Wide	Rep	Rare	Heil et al. (1993), Northern Colorado Plateau Network (in ed.)	2004	Report from CARE Herbarium based on specimen that may have been collected outside the park.

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Chenopodiaceae	<i>Atriplex canescens</i> var. <i>canescens</i>	<i>A. canescens</i> var. <i>occidentalis</i>	fourwing saltbush	Shrub	Wide	Pres	Abun	Harrison 1196 (CARE)	1958	
Chenopodiaceae	<i>Atriplex confertifolia</i>		shadscale	Shrub	Wide	Pres	Abun	Harrison 1142 (CARE)	1958	Type locality is Great Salt Lake (near mouth of Weber River), Weber Co, UT (Fremont 761 NY)
Chenopodiaceae	<i>Atriplex corrugata</i>		mat saltbush	Shrub	RegEn	Pres	Unc	Nelson 9563 (CARE)	1971	
Chenopodiaceae	<i>Atriplex gardneri</i> var. <i>cuneata</i>	<i>A. cuneata</i>	Castle Valley saltbush	Shrub	RegEn	Pres	Abun	Erdman 2868 (CARE)	1965	Type locality is near Emery, Emery Co, UT (Jones 5443 RM)
Chenopodiaceae	<i>Atriplex graciliflora</i>		Blue Valley orach	AnnF	RegEn	Pres	Rare	Fleming 679 (CARE)	1986	Type locality is Blue Valley, west of Hanksville, Wayne Co, UT (Jones 5697 POM)
Chenopodiaceae	<i>Atriplex powellii</i> var. <i>powellii</i>	<i>A. powellii</i>	Powell's orach	AnnF	Wide	Pres	Unc	Heil 3426 (CARE)	1987	
Chenopodiaceae	<i>Atriplex prostrata</i>	<i>A. patula</i> var. <i>triangularis</i>	thinleaf orach	AnnF	Wide	Pres	Rare	Heil 3528 (CARE)	1987	
Chenopodiaceae	<i>Atriplex saccaria</i> var. <i>saccaria</i>	<i>A. saccaria</i> var. <i>caput-medusae</i>	stalked orach	AnnF	RegEn	Pres	Unc	Heil 3525 (CARE)	1987	
Chenopodiaceae	<i>Atriplex truncata</i>		wedge orach	AnnF	Wide	Pres	Rare	Porter 4114 (CARE)	1986	
Chenopodiaceae	<i>Bassia americana</i>	<i>Kochia americana</i>	greenmolly	PerF	Wide	Pres	Unc	Harrison 1122 (CARE)	1973	
Chenopodiaceae	<i>Bassia hyssopifolia</i>		five-horn smotherweed	AnnF	Intro	Pres	Rare	Fleming 201 (CARE)	1986	Native to Eurasia
Chenopodiaceae	<i>Bassia scoparia</i>	<i>Kochia scoparia</i> , <i>B. sieversiana</i>	summer-cypress	AnnF	Intro	Pres	Com	Meyer 4645 (CARE)	1980	Native to Eurasia
Chenopodiaceae	<i>Chenopodium album</i> var. <i>album</i>	<i>C. album</i>	lambquarter	AnnF	Intro	Pres	Unc	Porter 4363 (BRY, CARE)	1986	Native to Eurasia. Includes report of var. <i>berlandieri</i> from CARE herbarium.
Chenopodiaceae	<i>Chenopodium atrovirens</i>	<i>C. fremontii</i> var. <i>atrovirens</i>	mountain goosefoot	AnnF	Wide	Pres	Unc	Porter 4185 (BRY)	1986	

Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Chenopodiaceae	<i>Chenopodium desiccatum</i>	<i>C. pratericola</i>	desert goosefoot	AnnF	Sparse	Pres	Unc	Porter 4185 (CARE)	1986	
Chenopodiaceae	<i>Chenopodium fremontii</i> var. <i>incanum</i>	<i>C. incanum</i> var. <i>incanum</i> , <i>C. incanum</i> var. <i>occidentale</i>	silvery goosefoot	AnnF	Wide	Pres	Abun	Meyer 4607 (CARE)	1980	
Chenopodiaceae	<i>Chenopodium glaucum</i> var. <i>salinum</i>	<i>C. salinum</i>	oakleaf goosefoot	AnnF	Wide	Pres	Unc	Porter 4116 (CARE)	1986	
Chenopodiaceae	<i>Chenopodium graveolens</i> var. <i>neomexicanum</i>	<i>Teloxys graveolens</i> , <i>Dysphania graveolens</i>	New Mexico goosefoot	AnnF	Periph	Pres	Rare	Fleming 171 (CARE)	1986	
Chenopodiaceae	<i>Chenopodium leptophyllum</i>	narrow-leaf goosefoot		AnnF	Wide	Pres	Unc	Camp 449 (CARE)	1977	
Chenopodiaceae	<i>Corispermum americanum</i>	Includes vars. <i>americanum</i> & <i>rydbergii</i> in <i>Flora of North America</i> (2003)	American bugseed	AnnF	Wide	Pres	Unc	Fleming 663 (CARE)	1988	Includes report of <i>C. villosum</i> by Northern Colorado Plateau Network (in ed.)
Chenopodiaceae	<i>Grayia spinosa</i>	<i>Atriplex spinosa</i> , <i>A. grayi</i>	spiny hopsage	Shrub	Wide	Rep	Unc	Heil et al. (1993), Northern Colorado Plateau Network (in ed.)	2004	Report from CARE Herbarium based on specimen that may have been collected outside the park.
Chenopodiaceae	<i>Halogeton glomeratus</i>		halogeton	AnnF	Intro	Pres	Unc	Harrison 1170 (CARE)	1973	Native to Eurasia
Chenopodiaceae	<i>Krascheninnikovia lanata</i> var. <i>lanata</i>	<i>Ceratoides lanata</i> , <i>Eurotia lanata</i> . Vars. not recognized in <i>Flora of North America</i> (2003).	winterfat	Shrub	Wide	Pres	Abun	Meyer 4652 (CARE)	1980	
Chenopodiaceae	<i>Monolepis nuttalliana</i>		Nuttall's poverty-weed	AnnF	Wide	Pres	Unc	Porter 3461 (CARE)	1986	
Chenopodiaceae	<i>Salsola paulsenii</i>		barbwire Russian thistle	AnnF	Intro	Pres	Unc	Harrison 1334 (BRY)	1973	Native to Eurasia

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Chenopodiaceae	<i>Salsola tragus</i>	<i>S. kali</i> , <i>S. iberica</i> , <i>S. pestifer</i> , <i>S. australis</i>	Russian thistle	AnnF	Intro	Pres	Abun	Andersen CARE V-7 (CARE)	1973	Native to Asia
Chenopodiaceae (Sarcobataceae)	<i>Sarcobatus vermiculatus</i>		greasewood	Shrub	Wide	Pres	Com	Harrison 960 (CARE)	1973	
Chenopodiaceae	<i>Suaeda calceoliformis</i>	<i>S. depressa</i>	broom seepweed	AnnF	Wide	Pres	Unc	Heil 3497 (CARE)	1987	
Chenopodiaceae	<i>Suaeda torreyana</i> var. <i>torreyana</i>	<i>S. moquinii</i> , <i>S. nigra</i> , <i>S. fruticosa</i>	Torrey's seepweed	AnnF	Wide	Pres	Com	Camp 357 (CARE)	1977	Includes report of var. <i>ramosissima</i> from Northern Colorado Plateau Network (in ed.)
Chenopodiaceae	<i>Zuckia brandegei</i> var. <i>arizonica</i>	<i>Z. brandegeei</i> var. <i>arizonica</i>	Arizona siltbush	Shrub	RegEn	Pres	Rare	Meyer 4653 (CARE)	1980	
Chenopodiaceae	<i>Zuckia brandegei</i> var. <i>brandegei</i>	<i>Z. brandegeei</i> var. <i>brandegeei</i> , <i>Atriplex brandegei</i>	Brandegee's siltbush	Shrub	RegEn	Pres	Unc	Harrison 1119 (CARE)	1973	Type locality is San Juan River, San Juan Co, UT (Brandegee s.n. GH)
Chenopodiaceae	<i>Zuckia brandegei</i> var. <i>plummeri</i>	<i>Z. brandegeei</i> var. <i>plummeri</i> , <i>Grayia brandegei</i> var. <i>plummeri</i>	Plummer's siltbush	Shrub	RegEn	Pres	Rare	Porter 5066 (CARE)	1973	Type locality is 15 miles E of Roosevelt, Uintah Co, UT (Stutz 9325 BRY)
Commelinaceae	<i>Tradescantia occidentalis</i>	<i>T. occidentalis</i> var. <i>occidentalis</i>	western spiderwort	PerF	Wide	Pres	Rare	Heil 3580 (CARE)	1987	
Compositae (Asteraceae)	<i>Achillea millefolium</i> var. <i>lanulosa</i>	<i>A. lanulosa</i> , <i>A. millefolium</i> var. <i>occidentalis</i> . Vars. not recognized in <i>Flora of North America</i> (2006)	common yarrow	PerF	Wide	Pres	Unc	Fleming 176 (CARE)	1986	
Compositae (Asteraceae)	<i>Agoseris glauca</i> var. <i>laciniata</i>	<i>A. parviflora</i>	cutleaf agoseris	PerF	Wide	Pres	Rare	Heil 4427 (CARE)	1988	
Compositae (Asteraceae)	<i>Ambrosia acanthicarpa</i>	<i>Franseria acanthicarpa</i>	bur ragweed	AnnF	Wide	Pres	Com	Fleming 193 (CARE)	1970	
Compositae (Asteraceae)	<i>Antennaria microphylla</i>	Includes <i>A. rosea</i>	small-leaf pussyoes	PerF	Wide	Pres	Rare	Porter 3865 (CARE)	1986	



**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Compositae (Asteraceae)	<i>Antennaria parvifolia</i>		common pussytoes	PerF	Wide	Pres	Unc	Meyer 4766 (CARE)	1981	
Compositae (Asteraceae)	<i>Antennaria rosulata</i>		breaks pussytoes	PerF	Wide	Rep	NA	Heil et al. (1993)	NA	Report from CARE Herbarium based on specimen that may have been collected outside the park.
Compositae (Asteraceae)	<i>Arctium minus</i>		burdock	PerF	Intro	Pres	Unc	Meyer 4672 (CARE)	1980	Native to Eurasia
Compositae (Asteraceae)	<i>Artemisia bigelovii</i>		Bigelow's sagebrush	Shrub	Wide	Pres	Abun	Harrison 1108 (CARE)	1966	
Compositae (Asteraceae)	<i>Artemisia campestris</i> var. <i>scouleriana</i>	<i>Oligosporus campestris</i> ssp. <i>pacificus</i> , <i>O. pacificus</i> , <i>A. campestris</i> ssp. <i>pacifica</i>	sand wormwood	PerF	Wide	Pres	Unc	Meyer 4633 (CARE)	1980	
Compositae (Asteraceae)	<i>Artemisia dracunculus</i> var. <i>glauca</i>	<i>Oligosporus dracunculus</i> . Var. not recognized in Cronquist (1994) and <i>Flora of North America</i> (2006)	tarragon	PerF	Wide	Pres	Abun	Porter 4133 (CARE)	1986	
Compositae (Asteraceae)	<i>Artemisia filifolia</i>	<i>Oligosporus filifolius</i>	sand sagebrush	Shrub	Wide	Pres	Unc	Camp 369 (CARE)	1974	
Compositae (Asteraceae)	<i>Artemisia frigida</i>		fringed sagebrush	Shrub	Wide	Pres	Unc	Meyer 4637 (CARE)	1980	
Compositae (Asteraceae)	<i>Artemisia ludoviciana</i> var. <i>albula</i>		Louisiana wormwood	PerF	Wide	Pres	Unc	Fertig & Lesica 21822 (CARE)	2005	
Compositae (Asteraceae)	<i>Artemisia ludoviciana</i> var. <i>mexicana</i>		Louisiana wormwood	PerF	Wide	Pres	Unc	Neese 6961 (BRY)	1978	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Compositae (Asteraceae)	<i>Artemisia nova</i> var. <i>nova</i>	<i>A. arbuscula</i> var. <i>nova</i> , <i>Seriphidium novum</i> . Vars. not recognized in <i>Flora of North America</i> (2006)	black sagebrush	Shrub	Wide	Pres	Unc	Heil 2606 (CARE)	1986	
Compositae (Asteraceae)	<i>Artemisia pygmaea</i>	<i>Seriphidium pygmaeum</i>	pygmy sagebrush	Shrub	Wide	Pres	Unc	Porter 3747 (CARE)	1986	
Compositae (Asteraceae)	<i>Artemisia spinescens</i>	<i>Picrothamnus desertorum</i>	budsage	Shrub	Wide	Pres	Unc	Porter 3744 (CARE)	1986	
Compositae (Asteraceae)	<i>Artemisia tridentata</i> var. <i>tridentata</i>	<i>Seriphidium tridentatum</i> ssp. <i>tridentatum</i>	basin big sagebrush	Shrub	Wide	Pres	Abun	Harrison 1121 (CARE)	1973	
Compositae (Asteraceae)	<i>Artemisia tridentata</i> var. <i>vaseyana</i>	Includes <i>A. tridentata</i> var. <i>pauciflora</i> , <i>Seriphidium vaseyanum</i>	mountain big sagebrush	Shrub	Wide	Rep	Unc	Heil et al. (1993), Northern Colorado Plateau Network (in ed.)	2004	
Compositae (Asteraceae)	<i>Artemisia tridentata</i> var. <i>wyomingensis</i>	<i>Seriphidium tridentatum</i> ssp. <i>wyomingense</i>	Wyoming big sagebrush	Shrub	Wide	Rep	Unc	Northern Colorado Plateau Network (in ed.)	2004	
Compositae (Asteraceae)	<i>Aster ascendens</i>	<i>A. chilensis</i> ssp. <i>adscendens</i> , <i>A. adscendens</i> , <i>Symphotrichum ascendens</i> , <i>Virgularia ascendens</i>	Pacific aster	PerF	Wide	Pres	Abun	Meyer 4667 (CARE)	1980	
Compositae (Asteraceae)	<i>Aster brachyactis</i>	<i>Symphotrichum ciliatum</i> , <i>Brachyactis ciliata</i> ssp. <i>angusta</i>	rayless alkali aster	AnnF	Wide	Pres	Rare	Fleming 192 (CARE)	1986	
Compositae (Asteraceae)	<i>Aster foliaceus</i> var. <i>parryi</i>	<i>Symphotrichum foliaceum</i> var. <i>parryi</i>	Parry's aster	PerF	Wide	Pres	Unc	Meyer 4613 (CARE)	1980	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Compositae (Asteraceae)	<i>Aster frondosus</i>	<i>Symphotrichum frondosum</i> , <i>Brachyactis frondosa</i>	leafy aster	AnnF	Wide	Pres	Rare	Camp 462 (CARE)	1977	
Compositae (Asteraceae)	<i>Aster glaucodes</i>	<i>Herrickia glauca</i> var. <i>glauca</i> , <i>Eurybia glauca</i> , <i>Eucephalus glaucus</i>	blueleaf aster	PerF	Wide	Pres	Unc	Meyer 4681 (CARE)	1980	
Compositae (Asteraceae)	<i>Aster pauciflorus</i>	<i>Almutaster pauciflorus</i>	alkali aster	PerF	Wide	Pres	Com	Camp 464 (CARE)	1977	
Compositae (Asteraceae)	<i>Aster spathulatus</i>	<i>A. occidentalis</i> , <i>Symphotrichum spathulatum</i> var. <i>spathulatum</i>	western aster	PerF	Wide	Pres	Unc	Meyer 4655 (CARE)	1980	
Compositae (Asteraceae)	<i>Aster welshii</i>	<i>Symphotrichum welshii</i>	Welsh's aster	PerF	LocEn	Pres	Rare	Porter 4096 (BRY)	1986	Type locality is Zion Canyon, Zion NP, Washington Co., UT (Welsh & Hays 24379 BRY).
Compositae (Asteraceae)	<i>Baccharis salicina</i>	Includes <i>B. emoryi</i>	Rio Grande seepwillow	Shrub	Wide	Pres	Unc	Heil 2942 (CARE)	1987	
Compositae (Asteraceae)	<i>Bahia dissecta</i>	<i>Amauriopsis dissecta</i>	cutleaf	PerF	Wide	Rep	NA	Heil et al. (1993)	NA	Report from CARE Herbarium based on specimen that may have been collected outside the park.
Compositae (Asteraceae)	<i>Bidens cernua</i>		nodding bur-marigold	PerF	Wide	Pres	Unc	Porter 4160 (CARE)	1986	
Compositae (Asteraceae)	<i>Brickellia atractyloides</i>	<i>B. atractyloides</i> var. <i>atractyloides</i>	spiny brickellbush	Shrub	Wide	Pres	Rare	Porter 3767 (CARE)	1986	Type locality is "Rio Colorado, UT" (Palmer s.n. GH), but is probably from NV or AZ (Welsh et al. 2003)
Compositae (Asteraceae)	<i>Brickellia californica</i>		California brickellbush	Shrub	Wide	Pres	Com	Camp 399 (CARE)	1970	
Compositae (Asteraceae)	<i>Brickellia grandiflora</i>		tassel-flower brickellbush	PerF	Wide	Pres	Unc	Camp 438 (CARE)	1978	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Compositae (Asteraceae)	<i>Brickellia longifolia</i>	<i>B. longifolia</i> var. <i>longifolia</i>	longleaf brickellbush	Shrub	Wide	Pres	Unc	Camp 361 (CARE)	1970	
Compositae (Asteraceae)	<i>Brickellia microphylla</i> var. <i>scabra</i>		rough brickellbush	Shrub	Wide	Pres	Com	Camp 265 (CARE)	1970	
Compositae (Asteraceae)	<i>Brickellia oblongifolia</i> var. <i>linifolia</i>	<i>B. oblongifolia</i>	Mohave brickellbush	Shrub	Wide	Pres	Com	Harrison 918 (CARE)	1973	Type locality of var. <i>linifolia</i> is American Fork, Jordan Valley, Utah Co, UT (Watson 493 YU)
Compositae (Asteraceae)	<i>Centaurea repens</i>	<i>Acroptilon repens</i>	Russian knapweed	PerF	Intro	Pres	Unc	Andersen CARE V-1 (CARE)	2004	UT state noxious weed. Native to Eurasia
Compositae (Asteraceae)	<i>Chaenactis douglasii</i>	Includes vars. <i>douglasii</i> & <i>montana</i>	hoary dusty- maiden	PerF	Wide	Pres	Unc	Meyer 4767 (CARE)	1981	
Compositae (Asteraceae)	<i>Chaenactis stevioides</i>		stevia dusty- maiden	AnnF	Wide	Pres	Unc	Meyer 4720 (CARE)	1981	
Compositae (Asteraceae)	<i>Chaetopappa ericoides</i>	<i>Leucelene ericoides</i> , <i>Aster arenosus</i>	rose-heath	PerF	Wide	Pres	Com	Meyer 4477 (CARE)	1973	
Compositae (Asteraceae)	<i>Chamaechaenactis scaposa</i>	<i>C. scaposa</i> var. <i>parva</i>	Eastwood-plant	PerF	Wide	Pres	Unc	Porter 3829 (CARE)	1981	
Compositae (Asteraceae)	<i>Chrysopsis villosa</i> var. <i>minor</i>	<i>C. villosa</i> var. <i>hispidula</i> , <i>Heterotheca villosa</i> var. <i>hispidula</i> , <i>H. villosa</i> var. <i>minor</i>	hispid golden-aster	PerF	Wide	Pres	Abun	Harrison 1488 (CARE)	1970	
Compositae (Asteraceae)	<i>Chrysothamnus depressus</i>		dwarf rabbitbrush	Shrub	Wide	Pres	Unc	Porter 4140 (CARE)	1986	
Compositae (Asteraceae)	<i>Chrysothamnus Greenei</i>		Greene's rabbitbrush	Shrub	Wide	Pres	Unc	Harrison 1306 (CARE)	1973	
Compositae (Asteraceae)	<i>Chrysothamnus linifolius</i>	<i>Lorandersonia linifolia</i>	spear-leaf rabbitbrush	Shrub	Wide	Pres	Unc	Fleming 137 (CARE)	1986	
Compositae (Asteraceae)	<i>Chrysothamnus nauseosus</i> var. <i>bigelovii</i>	<i>Ericameria nauseosa</i> var. <i>bigelovii</i>	Bigelow's rabbitbrush	Shrub	RegEn	Rep	NA	Heil et al. (1993)	NA	Specimen from CARE Herbarium is too immature to determine to variety.

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Compositae (Asteraceae)	<i>Chrysothamnus nauseosus</i> var. <i>consimilis</i>	<i>Ericameria nauseosa</i> var. <i>consimilis</i> , <i>E. nauseosa</i> var. <i>oreophila</i> , <i>C. nauseosus</i> var. <i>oreophilus</i>	greenish rabbitbrush	Shrub	Wide	Pres	Com	Heil 2861 (CARE)	1977	
Compositae (Asteraceae)	<i>Chrysothamnus nauseosus</i> var. <i>gnaphalodes</i>	<i>C. nauseosus</i> var. <i>hololeucus</i> , <i>Ericameria nauseosa</i> var. <i>hololeuca</i>	graystem rabbitbrush	Shrub	Wide	Pres	Com	Porter 4442 (CARE)	1970	
Compositae (Asteraceae)	<i>Chrysothamnus nauseosus</i> var. <i>graveolens</i>	<i>Ericameria nauseosa</i> var. <i>graveolens</i> , <i>E. nauseosa</i> var. <i>glabrata</i>	glabrate rabbitbrush	Shrub	Wide	Pres	Com	Porter 4249 (BRY)	1986	
Compositae (Asteraceae)	<i>Chrysothamnus nauseosus</i> var. <i>junceus</i>	<i>Ericameria nauseosa</i> var. <i>juncea</i>	rush rabbitbrush	Shrub	RegEn	Pres	Unc	Heil 3599 (CARE)	1986	
Compositae (Asteraceae)	<i>Chrysothamnus nauseosus</i> var. <i>leiospermus</i>	<i>Ericameria nauseosa</i> var. <i>leiosperma</i>	smoothseed rabbitbrush	Shrub	RegEn	Pres	Unc	Fleming 629 (CARE)	1986	Type locality is St. George, Washington Co, UT (Palmer s.n. NY)
Compositae (Asteraceae)	<i>Chrysothamnus nauseosus</i> var. <i>speciosus</i>	<i>C. nauseosus</i> var. <i>albicaulis</i> , <i>Ericameria nauseosa</i> var. <i>speciosa</i>	whitestem rabbitbrush	Shrub	Wide	Rep	NA	Heil et al. (1993)	NA	Reports from CARE Herbarium based on collections from outside the park or misidentified specimens of <i>C. parryi</i> var. <i>nevadensis</i> .
Compositae (Asteraceae)	<i>Chrysothamnus nauseosus</i> var. <i>turbinatus</i>	<i>Ericameria nauseosa</i> var. <i>turbinata</i>	dune rabbitbrush	Shrub	RegEn	Pres	Unc	Fleming 148 (CARE)	1986	Type locality is Canaan Ranch, Kane Co, UT (Jones 6066c POM)
Compositae (Asteraceae)	<i>Chrysothamnus parryi</i> var. <i>nevadensis</i>	<i>Ericameria parryi</i> var. <i>nevadensis</i>	Nevada rabbitbrush	Shrub	Wide	Pres	Unc	Fleming 101 (CARE)	1986	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Compositae (Asteraceae)	<i>Chrysothamnus viscidiflorus</i> var. <i>lanceolatus</i>		lanceleaf rabbitbrush	Shrub	Wide	Pres	Unc	Meyer 4666 (CARE)	1980	
Compositae (Asteraceae)	<i>Chrysothamnus viscidiflorus</i> var. <i>puberulus</i>		puberulent rabbitbrush	Shrub	Wide	Pres	Unc	Fleming 147 (CARE)	1986	
Compositae (Asteraceae)	<i>Chrysothamnus viscidiflorus</i> var. <i>stenophyllus</i>	Included in var. <i>viscidiflorus</i> in Cronquist (1994). Var. not recognized in <i>Flora of North America</i> (2006).	slenderleaf rabbitbrush	Shrub	Wide	Pres	Abun	Fleming 128 (CARE)	1986	
Compositae (Asteraceae)	<i>Chrysothamnus viscidiflorus</i> var. <i>viscidiflorus</i>		green rabbitbrush	Shrub	Wide	Pres	Com	Fleming 137 (BRY)	1986	
Compositae (Asteraceae)	<i>Cirsium calcareum</i> var. <i>bipinnatum</i>	<i>C. arizonicum</i> var. <i>bipinnatum</i> . Var. not recognized in Cronquist (1994)	wingless thistle	PerF	RegEn	Pres	Unc	Porter 4440 (BRY)	1986	CARE material considered "glabrous phase" of <i>C. calcareum</i> var. <i>bipinnatum</i> by D.J. Keil.
Compositae (Asteraceae)	<i>Cirsium calcareum</i> var. <i>calcareum</i>	Included in <i>C. arizonicum</i> var. <i>bipinnatum</i> ( <i>Flora of North America</i> 2006)	Gaineville thistle	PerF	LocEn	Pres	Abun	Meyer 4598 (CARE)	1970	Type locality is Bromide Pass, Henry Mtns, Garfield Co, UT (Jones 5695bh US)
Compositae (Asteraceae)	<i>Cirsium calcareum</i> var. <i>pulchellum</i>	Var. not recognized in Cronquist (1994), included in <i>C. arizonicum</i> var. <i>bipinnatum</i> in <i>Flora of North America</i> 2006)	pretty thistle	PerF	Wide	Pres	Unc	Porter 4232 (CARE)	1986	
Compositae (Asteraceae)	<i>Cirsium neomexicanum</i> var. <i>neomexicanum</i>	Vars. not recognized in <i>Flora of North America</i> (2006)	New Mexico thistle	PerF	Wide	Pres	Unc	Heil 3364 (CARE)	1987	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Compositae (Asteraceae)	<i>Cirsium neomexicanum</i> var. <i>utahense</i>	<i>C. utahense</i> not recognized in <i>Flora of North America</i> (2006), with elements split between <i>C. neomexicanum</i> and <i>C. inamoenum</i> var. <i>inamoenum</i> .	Utah thistle	PerF	RegEn	Pres	Unc	Porter 5167 (CARE)	1987	Type locality is Silver Reef, Washington Co, UT (Jones 5163q GH)
Compositae (Asteraceae)	<i>Cirsium scariosum</i> var. <i>scariosum</i>		elk thistle	PerF	Wide	Rep	Rare	Northern Colorado Plateau Network (in ed.)	2004	
Compositae (Asteraceae)	<i>Cirsium undulatum</i> var. <i>undulatum</i>	<i>C. undulatum</i>	wavy-leaved thistle	PerF	Wide	Pres	Unc	Harrison 1174 (CARE)	1973	
Compositae (Asteraceae)	<i>Cirsium vulgare</i>		bull thistle	PerF	Intro	Pres	Unc	Meyer 4621 (CARE)	1980	Native to Europe
Compositae (Asteraceae)	<i>Conyza canadensis</i> var. <i>glabrata</i>	Vars. not recognized in <i>Flora of North America</i> (2006)	Canadian horseweed	AnnF	Wide	Pres	Unc	Meyer 4676 (CARE)	1980	
Compositae (Asteraceae)	<i>Crepis runcinata</i> var. <i>glauca</i>		glaucous hawkbeard	PerF	Wide	Pres	Unc	Porter 3969 (CARE)	1986	
Compositae (Asteraceae)	<i>Dicoria brandegei</i>	<i>D. canescens</i> ssp. <i>brandegei</i> . Vars. not recognized in <i>Flora of North America</i> (2006)	Brandegee's sandplant	AnnF	RegEn	Pres	Rare	Fleming 508 (CARE)	1987	
Compositae (Asteraceae)	<i>Dyssodia papposa</i>		pappose glandweed	AnnF	Intro	Pres	Unc	Fleming 116 (CARE)	1986	Native to W North America
Compositae (Asteraceae)	<i>Enceliopsis nudicaulis</i> var. <i>nudicaulis</i>	<i>E. nudicaulis</i>	nakedstem	PerF	Wide	Pres	Unc	Harrison 816 (CARE)	1973	Type locality is "Southern Utah" (Bishop s.n. GH)

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Compositae (Asteraceae)	<i>Erigeron abajoensis</i>	Includes <i>E. awapensis</i> according to some authors	Abajo daisy	PerF	LocEn	Pres	Rare	Heil 3515 (CARE)	1987	Type locality is Abajo Mtns, San Juan Co, UT (Rydberg & Garrett 9755 NY). USFS: Region 4 Sensitive
Compositae (Asteraceae)	<i>Erigeron aphanactis</i> var. <i>congestus</i>		congested hairy daisy	PerF	Disj	Pres	Rare	Heil 4378 (CARE)	1980	
Compositae (Asteraceae)	<i>Erigeron argentatus</i>		silver daisy	PerF	Wide	Pres	Rare	Meyer 4545 (CARE)	1980	
Compositae (Asteraceae)	<i>Erigeron bellidialstrum</i>	<i>E. bellidialstrum</i> var. <i>bellidialstrum</i>	pretty daisy	AnnF	Wide	Pres	Rare	Fleming 502 (CARE)	1987	
Compositae (Asteraceae)	<i>Erigeron caespitosus</i>		tufted fleabane	PerF	Wide	Pres	Unc	Clark.s.n. (CARE)	1986	
Compositae (Asteraceae)	<i>Erigeron compactus</i> var. <i>consimilis</i>	<i>E. consimilis</i>	San Rafael daisy	PerF	RegEn	Pres	Unc	Barnes & Harper 4007 (CARE)	1980	
Compositae (Asteraceae)	<i>Erigeron divergens</i> var. <i>cinereus</i>	<i>E. tracyi</i> , <i>E. colomexicanus</i>	spreading daisy	PerF	Wide	Pres	Abun	Meyer 4481 (CARE)	1980	
Compositae (Asteraceae)	<i>Erigeron eatonii</i>	<i>E. eatonii</i> var. <i>eatonii</i>	Eaton's daisy	PerF	Wide	Pres	Rare	Porter 3886 (CARE)	1986	
Compositae (Asteraceae)	<i>Erigeron flagellaris</i>		trailing daisy	PerF	Wide	Pres	Unc	Meyer 4463 (CARE)	1980	
Compositae (Asteraceae)	<i>Erigeron lonchophyllus</i>	<i>Trimorpha lonchophylla</i>	longleaf daisy	PerF	Wide	Pres	Unc	Porter 4159 (CARE)	1986	
Compositae (Asteraceae)	<i>Erigeron maguirei</i>	Includes var. <i>harrisonii</i>	Maguire's daisy	PerF	LocEn	Pres	Unc	Welsh & Welsh 21178 (BRY)	1982	Type locality is San Rafael Swell, Emery Co, UT (Maguire 18459 NY). Type locality of var. <i>harrisonii</i> is 1 mile NE of Fruita, Capitol Reef NP, Wayne Co, UT (Welsh & Welsh 21178 BRY). USFWS: Threatened



**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Compositae (Asteraceae)	<i>Erigeron pulcherrimus</i>		basin daisy	PerF	Wide	Pres	Unc	Meyer 4741 (CARE)	1981	
Compositae (Asteraceae)	<i>Erigeron pumilus</i> var. <i>concinus</i>	<i>E. concinnus</i> var. <i>concinus</i> , includes var. <i>subglaber</i>	Navajo fleabane	PerF	Wide	Pres	Abun	Porter 3557 (CARE)	1981	
Compositae (Asteraceae)	<i>Erigeron pumilus</i> var. <i>condensatus</i>	<i>E. concinnus</i> var. <i>condensatus</i>	vernal daisy	PerF	Wide	Pres	Unc	Meyer 4709 (CARE)	1981	
Compositae (Asteraceae)	<i>Erigeron speciosus</i> var. <i>macranthus</i>	<i>E. speciosus</i>	aspen daisy	PerF	Wide	Pres	Rare	Heil 2609 (CARE)	1986	
Compositae (Asteraceae)	<i>Erigeron utahensis</i> var. <i>sparsiflorus</i>	<i>E. sparsiflorus</i>	slenderleaf daisy	PerF	RegEn	Pres	Rare	Heil 2937 (CARE)	1986	Type locality is Willow Creek, San Juan Co, UT (Eastwood 48 CAS)
Compositae (Asteraceae)	<i>Erigeron utahensis</i> var. <i>utahensis</i>	<i>E. utahensis</i>	Utah daisy	PerF	RegEn	Pres	Abun	Harrison 1347 (CARE)	1971	Type locality is Kanab, Kane Co, UT (Thompson s.n. GH)
Compositae (Asteraceae)	<i>Euthamia occidentalis</i>	<i>Solidago occidentalis</i>	western goldenrod	PerF	Wide	Pres	Unc	Fleming 509 (CARE)	1987	
Compositae (Asteraceae)	<i>Gaillardia pinnatifida</i>		Hopi blanketflower	PerF	Wide	Pres	Unc	Meyer 4505 (CARE)	1980	
Compositae (Asteraceae)	<i>Gaillardia spathulata</i>		basin blanketflower	PerF	RegEn	Pres	Abun	Camp 454 (CARE)	1970	Type locality is Rabbit Valley, Wayne Co, UT (Ward 401 GH)
Compositae (Asteraceae)	<i>Glyptoleura marginata</i>		crustweed	AnnF	Wide	Pres	Rare	Camp 542 (CARE)	1978	
Compositae (Asteraceae)	<i>Gnaphalium wrightii</i>	<i>G. canescens</i> , <i>Pseudognaphalium canescens</i>	Wright's cudweed	PerF	Sparse	Pres	Rare	Harper, Van Buren, & Aanderud 97-25 (BRY)	1997	
Compositae (Asteraceae)	<i>Grindelia squarrosa</i> var. <i>quasiperennis</i>	Included in <i>G. hirsutula</i> in <i>Flora of North America</i> (2006)	curly-cup gumweed	PerF	Periph	Pres	Unc	Harrison 1194 (CARE)	1973	
Compositae (Asteraceae)	<i>Gutierrezia microcephala</i>		thread snakeweed	Shrub	Wide	Pres	Unc	Fleming 131 (CARE)	1986	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Compositae (Asteraceae)	<i>Gutierrezia sarothrae</i>		broom snakeweed	Shrub	Wide	Pres	Abun	Harrison 1219 (CARE)	1973	
Compositae (Asteraceae)	<i>Haplopappus acaulis</i> var. <i>acaulis</i>	<i>Stenotus acaulis</i> var. <i>acaulis</i>	stemless goldenweed	PerF	Wide	Pres	Rare	Porter 5170 (CARE)	1987	
Compositae (Asteraceae)	<i>Haplopappus armerioides</i> var. <i>armerioides</i>	<i>Stenotus armerioides</i> var. <i>armerioides</i>	thrift goldenweed	PerF	Wide	Pres	Com	Harrison 989 (CARE)	1973	
Compositae (Asteraceae)	<i>Haplopappus rusbyi</i>	<i>H. drummondii</i> , <i>Isocoma rusbyi</i> , <i>I. drummondii</i>	Rusby's goldenbush	Shrub	Wide	Pres	Rare	Fleming 506 (CARE)	1987	
Compositae (Asteraceae)	<i>Helianthella microcephala</i>		purpledisk sunflower	PerF	RegEn	Pres	Unc	Harms s.n. (CARE)	2005	Type locality is Abajo Mtns, San Juan Co, UT (Newberry s.n. GH)
Compositae (Asteraceae)	<i>Helianthus annuus</i> var. <i>lenticularis</i>	Ssp. not recognized in <i>Flora of North America</i> (2006)	common sunflower	AnnF	Wide	Pres	Unc	Swancara 47 (CARE)	1958	
Compositae (Asteraceae)	<i>Helianthus anomalus</i>	Includes <i>H. deserticola</i>	sand sunflower	AnnF	RegEn	Rep	NA	Heil et al. (1993)	NA	Report from CARE Herbarium based on specimen that may have been collected outside the park. Type locality is desert S of Hanksville, Wayne Co, UT (Stanton 328 US).
Compositae (Asteraceae)	<i>Helianthus nuttallii</i>	<i>H. nuttallii</i> ssp. <i>nuttallii</i>	Nuttall's sunflower	PerF	Wide	Pres	Rare	Meyer 4654 (CARE)	1980	
Compositae (Asteraceae)	<i>Helianthus petiolaris</i> ssp. <i>fallax</i>	Includes var. <i>petiolaris</i>	prairie sunflower	AnnF	Wide	Pres	Unc	Harrison s.n. (CARE)	1973	
Compositae (Asteraceae)	<i>Hymenopappus filifolius</i> var. <i>cinereus</i>	<i>H. filifolius</i> var. <i>lugens</i> , <i>H. filifolius</i> var. <i>pauciflorus</i> , <i>H. filifolius</i> var. <i>megacephalus</i> , <i>H. filifolius</i> var. <i>tomentosus</i>	common hyalineherb	PerF	Wide	Pres	Abun	Camp 418 (CARE)	1973	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Compositae (Asteraceae)	<i>Hymenoxys acaulis</i> var. <i>arizonica</i>	<i>Tetraneuris acaulis</i> var. <i>arizonica</i>	Arizona hymenoxys	PerF	Wide	Pres	Abun	Meyer 4558 (CARE)	1971	
Compositae (Asteraceae)	<i>Hymenoxys acaulis</i> var. <i>caespitosa</i>	<i>H. acaulis</i> var. <i>lanata</i> , <i>Tetraneuris acaulis</i> var. <i>caespitosa</i> , <i>T. brevifolia</i>	lanate hymenoxys	PerF	Wide	Rep	NA	Heil et al. (1993)	NA	Specimen has not been relocated
Compositae (Asteraceae)	<i>Hymenoxys acaulis</i> var. <i>ivesiana</i>	<i>H. argentea</i> var. <i>ivesiana</i> , <i>Tetraneuris hymenoxys ivesiana</i>	Canyonlands hymenoxys	PerF	Wide	Pres	Unc	Meyer 4509 (CARE)	1973	
Compositae (Asteraceae)	<i>Hymenoxys acaulis</i> var. <i>nana</i>	<i>H. depressa</i> , <i>Tetraneuris acaulis</i> var. <i>nana</i>	low hymenoxys	PerF	LocEn	Pres	Unc	Heil 2685 (CARE)	1971	Type locality is E of the Muddy River, San Rafael Reef, Emery Co, UT (Atwood & Goodrich 8652 BRY). USFWS: former C2 candidate
Compositae (Asteraceae)	<i>Hymenoxys richardsonii</i> var. <i>floribunda</i>	<i>Picardenia richardsonii</i> var. <i>floribunda</i>	Colorado rubber-plant	PerF	Wide	Pres	Abun	Harrison 988 (CARE)	1971	
Compositae (Asteraceae)	<i>Iva axillaris</i>	<i>I. axillaris</i> var. <i>axillaris</i> . Vars. not recognized in <i>Flora of North America</i> (2006).	poverty-weed	PerF	Wide	Pres	Unc	Meyer 4683 (CARE)	1974	
Compositae (Asteraceae)	<i>Iva xanthifolia</i>	<i>Cyclachaena xanthifolia</i>	marsh-elder	AnnF	Wide	Pres	Rare	Fleming 698 (CARE)	1988	
Compositae (Asteraceae)	<i>Lactuca serriola</i>		prickly lettuce	AnnF	Intro	Pres	Com	Meyer 4673 (CARE)	1980	Native to Europe
Compositae (Asteraceae)	<i>Lygodesmia grandiflora</i> var. <i>arizonica</i>	<i>L. arizonica</i>	Arizona rush-pink	PerF	RegEn	Pres	Unc	Porter 3773 (CARE)	1986	
Compositae (Asteraceae)	<i>Lygodesmia grandiflora</i> var. <i>dianthopsis</i>	<i>L. dianthopsis</i>	western rush-pink	PerF	RegEn	Rep	Unc	Northern Colorado Plateau Network (in ed.)	2004	Type locality is Great Salt Lake islands, UT (Watson 707 GH)

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Compositae (Asteraceae)	<i>Lygodesmia grandiflora</i> var. <i>grandiflora</i>	<i>L. grandiflora</i>	showy rush-pink	PerF	Wide	Pres	Unc	Heil 3359 (CARE)	1973	
Compositae (Asteraceae)	<i>Lygodesmia spinosa</i>	<i>Stephanomeria spinosa</i> , <i>Pleiacanthus spinosus</i>	thorny wirelettuce	AnnF	Wide	Pres	Unc	Meyer 4650 (CARE)	1970	
Compositae (Asteraceae)	<i>Machaeranthera canescens</i> var. <i>aristata</i>	<i>M. linearis</i> , <i>M. rigida</i> , <i>M. canescens</i> var. <i>vacans</i> , <i>Dieteria canescens</i> var. <i>aristata</i>	aristate aster	PerF	RegEn	Pres	Unc	Porter 4428 (CARE)	1986	Type locality is Willow Creek, San Juan Co., UT (Eastwood 45 CAS)
Compositae (Asteraceae)	<i>Machaeranthera canescens</i> var. <i>canescens</i>	<i>Aster canescens</i> , <i>Dieteria canescens</i> var. <i>canescens</i>	hoary aster	PerF	Wide	Pres	Com	Camp 419 (CARE)	1970	
Compositae (Asteraceae)	<i>Machaeranthera grindelioides</i> var. <i>grindelioides</i>	<i>Haplopappus nuttallii</i> , <i>Xanthisma grindelioides</i> var. <i>grindelioides</i>	gumweed aster	PerF	Wide	Pres	Unc	Meyer 4579 (CARE)	1971	
Compositae (Asteraceae)	<i>Machaeranthera tanacetifolia</i>		tansyleaf aster	AnnF	Wide	Pres	Com	Barnes & Harper 4000 (CARE)	2004	
Compositae (Asteraceae)	<i>Malacothrix glabrata</i>	<i>M. californica</i> var. <i>glabrata</i>	filiform desert-dandelion	AnnF	Wide	Pres	Unc	Fertig & Lesica 21820 (CARE)	1988	
Compositae (Asteraceae)	<i>Malacothrix sonchoides</i>		sowthistle desert-dandelion	AnnF	Wide	Pres	Unc	Harrison 1063 (CARE)	1958	
Compositae (Asteraceae)	<i>Oxytenia acerosa</i>	<i>Iva acerosa</i>	copperweed	Shrub	Wide	Pres	Unc	Harrison 1461 (CARE)	1974	
Compositae (Asteraceae)	<i>Parthenium ligulatum</i>	<i>Bolophyta ligulata</i> , <i>P. alpinum</i> var. <i>ligulatum</i>	low feverfew	PerF	RegEn	Pres	Unc	Meyer 4560 (CARE)	1980	Type locality is 10 miles S of Theodore, Duchesne Co, UT (Jones s.n. POM)
Compositae (Asteraceae)	<i>Petroradia pumila</i> var. <i>pumila</i>	<i>Solidago petradoria</i>	rock-goldenrod	PerF	Wide	Pres	Unc	Heil & Mietty 4655 (BRY)	1986	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Compositae (Asteraceae)	<i>Platyschkuhria integrifolia</i> var. <i>desertorum</i>	<i>Bahia nudicaulis</i> var. <i>desertorum</i>	desert bahia	PerF	RegEn	Pres	Unc	Porter 5080 (CARE)	1973	Type locality is Cisco, Grand Co, UT (Jones s.n. US)
Compositae (Asteraceae)	<i>Psilostrophe sparsiflora</i>		greenstem paperflower	PerF	RegEn	Pres	Abun	Meyer 4747 (CARE)	1966	Type locality is "S Utah" (Thompson s.n. GH)
Compositae (Asteraceae)	<i>Senecio douglasii</i> var. <i>longilobus</i>	<i>S. longilobus</i> , <i>S. flaccidus</i> var. <i>flaccidus</i> , <i>S. flaccidus</i> var. <i>douglasii</i>	Douglas' groundsel	PerF	Wide	Pres	Unc	Harrison 1126 (CARE)	1973	
Compositae (Asteraceae)	<i>Senecio multilobatus</i>	<i>Packera multilobata</i>	basin groundsel	PerF	Wide	Pres	Com	Porter 4664 (CARE)	1970	Type locality is Uinta River, Uintah Co, UT (Fremont 549 GH)
Compositae (Asteraceae)	<i>Senecio spartioides</i> var. <i>multicapitatus</i>	<i>S. multicapitatus</i> . Vars. not recognized in <i>Flora of North America</i> (2006)	many-headed groundsel	PerF	Wide	Pres	Unc	Camp 456 (CARE)	1977	
Compositae (Asteraceae)	<i>Senecio spartioides</i> var. <i>spartioides</i>	<i>S. spartioides</i> . Vars. not recognized in <i>Flora of North America</i> (2006)	broom groundsel	PerF	Wide	Pres	Unc	Heil 4615 (CARE)	1988	
Compositae (Asteraceae)	<i>Senecio streptanthifolius</i> var. <i>streptanthifolius</i>	<i>Packera streptanthifolia</i> var. <i>streptanthifolia</i> . Vars. not recognized in <i>Flora of North America</i> (2006)	Rocky Mountain groundsel	PerF	Wide	Rep	NA	Heil et al. (1993)	NA	Reports from CARE Herbarium based on collections from outside the park.
Compositae (Asteraceae)	<i>Solidago canadensis</i> var. <i>salebrosa</i>	<i>S. lepida</i> var. <i>salebrosa</i>	Canadian goldenrod	PerF	Wide	Pres	Com	Meyer 4620 (CARE)	1980	
Compositae (Asteraceae)	<i>Solidago simplex</i>	<i>S. spathulata</i> , includes vars. <i>nana</i> & <i>simplex</i>	coast goldenrod	PerF	Wide	Pres	Unc	Porter 3951 (CARE)	1986	
Compositae (Asteraceae)	<i>Solidago velutina</i>	<i>S. sparsiflora</i> , <i>S. velutina</i> var. <i>sparsiflora</i>	three-nerve goldenrod	PerF	Wide	Pres	Unc	Heil 2938 (CARE)	1986	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Compositae (Asteraceae)	<i>Sonchus asper</i>		spiny-leaf sow-thistle	AnnF	Intro	Pres	Unc	Porter 4100 (CARE)	1986	Native to Europe
Compositae (Asteraceae)	<i>Stephanomeria exigua</i>	<i>S. exigua</i> sp. <i>exigua</i>	white-plume wirelettuce	AnnF	Wide	Pres	Com	Heil 3332 (CARE)	1980	
Compositae (Asteraceae)	<i>Stephanomeria runcinata</i>		desert wirelettuce	PerF	Wide	Pres	Rare	Heil s.n. (CARE)	1987	
Compositae (Asteraceae)	<i>Stephanomeria tenuifolia</i> var. <i>tenuifolia</i>	<i>S. minor</i> var. <i>minor</i> . Vars. not recognized in <i>Flora of North America</i> (2006)	slender wirelettuce	PerF	Wide	Pres	Com	Harrison 1493 (CARE)	1970	
Compositae (Asteraceae)	<i>Taraxacum officinale</i>		common dandelion	PerF	Intro	Pres	Unc	Lindahl s.n. (CARE)	1976	Native to Eurasia
Compositae (Asteraceae)	<i>Tetradymia canescens</i>		spineless horsebrush	Shrub	Wide	Pres	Unc	Lichtardt 504 (CARE)	1985	
Compositae (Asteraceae)	<i>Tetradymia glabrata</i>		littleleaf horsebrush	Shrub	Wide	Pres	Unc	Porter 5039 (BRY)	1987	
Compositae (Asteraceae)	<i>Tetradymia spinosa</i>	<i>T. spinosa</i> var. <i>spinosa</i>	shortspine horsebrush	Shrub	Wide	Pres	Unc	Porter 3817 (CARE)	1986	
Compositae (Asteraceae)	<i>Thelesperma subnudum</i> var. <i>alpinum</i>	<i>T. windhamii</i> , included in <i>T. pubescens</i> by some authors. Vars. not recognized in <i>Flora of North America</i> (2006).	alpine greenthread	PerF	LocEn	Pres	Rare	Clark s.n. (CARE)	2000	Type locality is 3 miles E of Bicknell, Wayne Co, UT (Atwood & Thompson 7646a BRY). USFS: Region 4 Sensitive, UT BLM: Sensitive, USFWS: former C2 candidate
Compositae (Asteraceae)	<i>Thelesperma subnudum</i> var. <i>subnudum</i>	Vars. not recognized in <i>Flora of North America</i> (2006).	scapose greenthread	PerF	Wide	Pres	Abun	Harrison 911 (CARE)	1971	Type locality is "Southern Utah" (Parry 109 GH)
Compositae (Asteraceae)	<i>Thymophylla pentachaeta</i> var. <i>belenidium</i>	<i>Dyssodia pentachaeta</i> var. <i>belenidium</i>	scale glandweed	PerF	Wide	Pres	Unc	Meyer 4723 (CARE)	1980	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Compositae (Asteraceae)	<i>Townsendia annua</i>		annual townsendia	AnnF	Wide	Pres	Unc	Meyer 4694 (CARE)	1981	Type locality is Cottonwood Wash, 1 1/2 mi N of Bluff, San Juan Co, UT (Maguire 13509 GH)
Compositae (Asteraceae)	<i>Townsendia aprica</i>	Includes <i>T. jonesii</i> var. <i>lutea</i> according to some authors	Last Chance townsendia	PerF	LocEn	Pres	Unc	Meyer 4702 (CARE)	1981	Type locality is 6 miles S of Fremont Jct., Sevier Co, UT (Reveal & Welsh 721 BRY). USFWS: Threatened
Compositae (Asteraceae)	<i>Townsendia exscapa</i>		stemless townsendia	PerF	Wide	Pres	Unc	Heil 4369 (CARE)	1988	
Compositae (Asteraceae)	<i>Townsendia incana</i>		hoary townsendia	PerF	Wide	Pres	Com	Harrison 1033 (CARE)	1970	
Compositae (Asteraceae)	<i>Tragopogon dubius</i>	<i>T. dubius</i> var. <i>major</i>	yellow salsify	PerF	Intro	Pres	Unc	Fleming 383 (CARE)	1987	Native to Europe
Compositae (Asteraceae)	<i>Vanclvea stylosa</i>	<i>Chrysothamnus stylosa</i>	resinbush	Shrub	RegEn	Pres	Unc	Heil 2929 (CARE)	1986	Type locality is near Epsom Creek, San Juan Co, UT (Eastwood 36 CAS)
Compositae (Asteraceae)	<i>Vernonia marginata</i>		plains ironweed	PerF	Intro	Pres	Rare	Fleming 693 (CARE)	1988	Native to C North America
Compositae (Asteraceae)	<i>Viguiera multiflora</i> var. <i>multiflora</i>	<i>Heliomeris multiflora</i> var. <i>multiflora</i>	showy goldeneye	PerF	Wide	Pres	Rare	Fleming 113 (CARE)	1986	
Compositae (Asteraceae)	<i>Wyethia scabra</i>	<i>Scabrethia scabra</i> ssp. <i>scabra</i>	rough mule's-ears	PerF	Wide	Pres	Com	Harrison 937 (CARE)	1970	
Compositae (Asteraceae)	<i>Xanthium strumarium</i> var. <i>canadense</i>	<i>X. pensylvanicum</i> , <i>X. saccharatum</i> . Vars. not recognized in <i>Flora of North America</i> (2006).	rough cocklebur	AnnF	Wide	Pres	Unc	Fleming 87 (CARE)	1986	



Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Compositae (Asteraceae)	<i>Xylorhiza confertifolia</i>	<i>Machaeranthera confertifolia</i>	Henrieville woodyaster	PerF	LocEn	Pres	Rare	Harrison 877 (CARE)	1973	Type locality is 11 miles NE of Henrieville, Garfield Co, UT (Cronquist 9164 NY). USFWS: 3C
Compositae (Asteraceae)	<i>Xylorhiza tortifolia</i> var. <i>imberbis</i>	<i>Machaeranthera tortifolia</i> var. <i>imberbis</i>	hurtleaf woodyaster	PerF	RegEn	Pres	Unc	Porter 2376 (CARE)	1978	Type locality is E bank of Green River W of Moab (Cronquist 8994 NY)
Compositae (Asteraceae)	<i>Xylorhiza venusta</i>	<i>Machaeranthera venusta</i>	Cisco woodyaster	PerF	RegEn	Pres	Rare	Porter 3480 (CARE)	1986	Type locality is Cisco, Grand Co, UT (Jones s.n. POM)
Convulvaceae	<i>Convolvulus arvensis</i>		field bindweed	PerF	Intro	Pres	Unc	Harrison 1373 (CARE)	1974	Utah state noxious weed. Native to Eurasia
Convulvaceae	<i>Cuscuta pentagona</i>	Includes reports of <i>C. glabrior</i>	field dodder	AnnF	Wide	Pres	Unc	Lehnert s.n. (CARE)	1958	
Convulvaceae	<i>Evolvulus nuttallianus</i>		evolvulus	PerF	Wide	Pres	Unc	Meyer 4476 (CARE)	1980	
Cornaceae	<i>Cornus sericea</i> var. <i>sericea</i>	<i>C. stolonifera</i> , <i>Swida sericea</i>	red-osier dogwood	Shrub	Wide	Pres	Unc	Meyer 4678 (CARE)	1980	
Crassulaceae	<i>Sedum lanceolatum</i>	<i>Amerosedum lanceolatum</i> , Includes spp. <i>lanceolatum</i> & <i>subalpinum</i>	lance-leaved stonecrop	PerF	Wide	Pres	Unc	Heil 2530 (CARE)	1987	
Crossosomataceae	<i>Glossopetalon spinescens</i> var. <i>microphyllum</i>		small-leaved greasebush	Shrub	RegEn	Pres	Unc	Porter 5180 (CARE)	1987	Includes reports of var. <i>meionandrum</i> from Northern Colorado Plateau Network (in ed.). Type locality is Left Fork Sawtooth Canyon, House Range, Millard Co, UT (Holmgren & Holmgren 11292 NY).

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Cruciferae (Brassicaceae)	<i>Alyssum minus</i> var. <i>micranthum</i>	<i>A. parviflorum</i> var. <i>micranthum</i> , <i>A. simplex</i>	European madwort	AnnF	Intro	Pres	Rare	Meyer 4537 (CARE)	1980	Native to Eurasia
Cruciferae (Brassicaceae)	<i>Arabis demissa</i>	<i>Boechea demissa</i> var. <i>languida</i> , <i>B. demissa</i> var. <i>demissa</i> , <i>B. oxylobula</i>	nodding rock cress	PerF	Wide	Pres	Unc	Heil 4365 (CARE)	1988	Type locality of var. <i>russeola</i> is 18 miles N of Vernal, Uintah Co, UT (Rollins 1757 GH). USFWS: 3C
Cruciferae (Brassicaceae)	<i>Arabis drummondii</i>	<i>Boechea angustifolia</i> , <i>B. drummondii</i> , <i>B. stricta</i>	Drummond's rockcress	PerF	Wide	Pres	Rare	Meyer 4778 (CARE)	1981	
Cruciferae (Brassicaceae)	<i>Arabis hirsuta</i>	Includes vars. <i>glabrata</i> & <i>pyncocarpa</i>	hairy rockcress	PerF	Wide	Pres	Unc	Meyer 4759 (CARE)	1981	
Cruciferae (Brassicaceae)	<i>Arabis holboellii</i> var. <i>fendleri</i>	<i>Boechea fendleri</i> , <i>A. fendleri</i>	Fendler's rockcress	PerF	Wide	Pres	Unc	Porter 3869 (BRY)	1986	CARE specimen part of a mixed collection with <i>A. drummondii</i> .
Cruciferae (Brassicaceae)	<i>Arabis holboellii</i> var. <i>pinetorum</i>	<i>Boechea holboellii</i> var. <i>pinetorum</i> . Name may be misapplied, according to Holmgren et al. (2005)	Holboell's rockcress	PerF	Wide	Pres	Rare	Goodrich & Atwood 16571 (BRY)	1982	
Cruciferae (Brassicaceae)	<i>Arabis holboellii</i> var. <i>secunda</i>	<i>A. holboellii</i> var. <i>retrofracta</i> , <i>Boechea holboellii</i> var. <i>secunda</i> , <i>B. retrofracta</i>	Holboell's rockcress	PerF	Wide	Pres	Rare	Fleming BC320 (CARE)	1987	
Cruciferae (Brassicaceae)	<i>Arabis perennans</i> var. <i>perennans</i>	<i>Boechea perennans</i>	perennial rockcress	PerF	Wide	Pres	Unc	Meyer 4530 (CARE)	1973	
Cruciferae (Brassicaceae)	<i>Arabis pulchra</i> var. <i>pallens</i>	<i>Boechea pulchra</i> var. <i>pallens</i>	desert rockcress	PerF	Wide	Pres	Unc	Harrison 837 (CARE)	1971	Type locality is Westwater, Grand Co, UT (Jones s.n. US)
Cruciferae (Brassicaceae)	<i>Arabis selbyi</i>	<i>Boechea selbyi</i> var. <i>selbyi</i>	Selby's rockcress	PerF	Wide	Pres	Com	Porter 4658 (CARE)	1987	

Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Cruciferae (Brassicaceae)	<i>Capsella bursa-pastoris</i>		shepherd's-purse	AnnF	Intro	Pres	Unc	Meyer 4462 (CARE)	1980	Native to Europe
Cruciferae (Brassicaceae)	<i>Cardamine cordifolia</i> var. <i>cordifolia</i>	<i>C. cordifolia</i>	heartleaf bittercress	PerF	Wide	Rep	NA	Meyer (1982)	NA	Specimen has not been relocated
Cruciferae (Brassicaceae)	<i>Cardaria draba</i>	<i>Lepidium draba</i> , <i>C. draba</i> var. <i>draba</i>	whitetop	PerF	Intro	Pres	Rare	Meyer 4526 (CARE)	1980	Native to Europe
Cruciferae (Brassicaceae)	<i>Caulanthus crassicaulis</i> var. <i>glaber</i>		smooth spindlestem	PerF	RegEn	Pres	Rare	Heil 3430 (CARE)	1987	Type locality is Sink Valley (near Alton), Kane Co, UT (Jones s.n. POM)
Cruciferae (Brassicaceae)	<i>Chorispora tenella</i>		blue mustard	AnnF	Intro	Pres	Unc	Meyer 4451 (CARE)	1980	Native to Asia
Cruciferae (Brassicaceae)	<i>Descurainia californica</i>		California tansy-mustard	PerF	Wide	Pres	Rare	Meyer 4774 (CARE)	1981	
Cruciferae (Brassicaceae)	<i>Descurainia incana</i> var. <i>sonnei</i>	<i>D. richardsonii</i> var. <i>sonnei</i> , <i>D. incana</i> var. <i>incana</i> , <i>D. incana</i> ssp. <i>incana</i> , <i>D. incana</i> var. <i>incana</i>	mountain tansy-mustard	AnnF	Wide	Pres	Unc	Harrison 1801 (BRY)	1938	Specimen has not been relocated
Cruciferae (Brassicaceae)	<i>Descurainia pinnata</i> var. <i>intermedia</i>	Included in <i>D. pinnata</i> var. <i>osmiarum</i> by some authors	western tansy-mustard	AnnF	Wide	Pres	Unc	Harrison 1801 (BRY)	1938	
Cruciferae (Brassicaceae)	<i>Descurainia pinnata</i> var. <i>osmiarum</i>	<i>D. pinnata</i> ssp. <i>halictorum</i>	western tansy-mustard	AnnF	Wide	Pres	Unc	Harrison 868 (CARE)	1973	
Cruciferae (Brassicaceae)	<i>Descurainia sophia</i>		flixweed	AnnF	Intro	Pres	Abun	Meyer 4461 (CARE)	1980	Native to Europe
Cruciferae (Brassicaceae)	<i>Diathyrea wislizenii</i>	<i>Dimorphocarpa wislizenii</i>	spectacle-pod	AnnF	Wide	Pres	Unc	Camp 550 (CARE)	1978	
Cruciferae (Brassicaceae)	<i>Draba aurea</i>		golden draba	PerF	Wide	Pres	Rare	Heil 3571 (CARE)	1987	
Cruciferae (Brassicaceae)	<i>Draba cuneifolia</i> var. <i>cuneifolia</i>	<i>D. cuneifolia</i>	wedgeleaf draba	AnnF	Wide	Pres	Unc	Porter 3469 (CARE)	1986	

Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Cruciferae (Brassicaceae)	<i>Draba reptans</i>		dwarf draba	AnnF	Wide	Rep	Unc	Northern Colorado Plateau Network (2007, in ed.)	2004	
Cruciferae (Brassicaceae)	<i>Draba stenoloba</i> var. <i>nana</i>	<i>D. albertina</i>	slender whitlow-grass	PerF	Wide	Pres	Rare	Heil 4373 (CARE)	1988	
Cruciferae (Brassicaceae)	<i>Erysimum asperum</i> var. <i>purshii</i>	<i>E. asperum</i> var. <i>asperum</i> , <i>E. capitatum</i> var. <i>purshii</i> . Included in var. <i>capitatum</i> in Holmgren et al. (2005)	sand dune wallflower	PerF	Wide	Pres	Rare	Heil 4442 (CARE)	1988	Type locality is near the Great Salt Lake, Salt Lake Co., UT (Carrington s.n.)
Cruciferae (Brassicaceae)	<i>Erysimum inconspicuum</i>		shy wallflower	PerF	Wide	Pres	Unc	Meyer 4779 (CARE)	1981	
Cruciferae (Brassicaceae)	<i>Hutchinsia procumbens</i>	<i>Hornungia procumbens</i> , <i>Hymenolobus procumbens</i>	ovalpurse	AnnF	Wide	Pres	Rare	Fleming 588 (CARE)	1988	
Cruciferae (Brassicaceae)	<i>Lepidium densiflorum</i> var. <i>densiflorum</i>		prairie pepperwort	AnnF	Wide	Pres	Unc	Meyer 4540 (CARE)	1980	
Cruciferae (Brassicaceae)	<i>Lepidium densiflorum</i> var. <i>ramosum</i>	Includes var. <i>macrocarpum</i>	prairie pepperwort	AnnF	Wide	Pres	Unc	Fleming 622 (CARE)	1988	
Cruciferae (Brassicaceae)	<i>Lepidium montanum</i> var. <i>jonesii</i>		Jones' pepperwort	PerF	Wide	Pres	Com	Swancara 35 (CARE)	1958	Type locality is St. George, Washington Co., UT (Jones 1636 NY)
Cruciferae (Brassicaceae)	<i>Lepidium perfoliatum</i>		clasping pepperwort	AnnF	Intro	Pres	Rare	Fleming 559 (CARE)	1988	Native to Europe
Cruciferae (Brassicaceae)	<i>Malcolmia africana</i>		African mustard	AnnF	Intro	Pres	Unc	Meyer 4460 (CARE)	1980	Native to Africa
Cruciferae (Brassicaceae)	<i>Nasturtium officinale</i>	<i>Rorippa nasturtium-aquaticum</i>	watercress	PerF	Intro	Pres	Unc	Porter 4409 (CARE)	1986	Native to Europe

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Cruciferae (Brassicaceae)	<i>Physaria acutifolia</i> var. <i>acutifolia</i>	<i>P. australis</i>	sharp-leaf twinpod	PerF	Wide	Pres	Com	Harrison 959 (CARE)	1971	
Cruciferae (Brassicaceae)	<i>Physaria acutifolia</i> var. <i>purpurea</i>	Included in <i>P. grahamii</i> by Holmgren et al. (2005)	purple twinpod	PerF	LocEn	Pres	Rare	Heil 4371 (CARE)	1988	Type locality is Sego Canyon, about 5 miles N of Thompson, Grand Co, UT (Welsh 6902 BRY). USFWS: 3C
Cruciferae (Brassicaceae)	<i>Physaria intermedia</i>	<i>Lesquerella intermedia</i> , <i>L. alpina</i> var. <i>intermedia</i>	Watson's bladderpod	PerF	Wide	Pres	Abun	Meyer 4754 (CARE)	1971	
Cruciferae (Brassicaceae)	<i>Physaria ludoviciana</i>	<i>Lesquerella ludoviciana</i>	silver bladderpod	PerF	Wide	Pres	Unc	Camp 534 (CARE)	1978	
Cruciferae (Brassicaceae)	<i>Physaria newberryi</i>	<i>P. newberryi</i> var. <i>racemosa</i>	Newberry's twinpod	PerF	RegEn	Pres	Unc	Fleming s.n. (CARE)	1988	
Cruciferae (Brassicaceae)	<i>Physaria rectipes</i>	<i>Lesquerella rectipes</i>	Colorado Plateau bladderpod	PerF	RegEn	Pres	Abun	Meyer 4548 (CARE)	1980	
Cruciferae (Brassicaceae)	<i>Physaria wardii</i>	<i>Lesquerella wardii</i> . Included in <i>P. kingii</i> var. <i>parvifolia</i> by Holmgren et al. (2005)	Ward's bladderpod	PerF	RegEn	Pres	Rare	Fleming 610 (CARE)	1988	Type locality is Aquarius Plateau, Garfield Co, UT (Ward 589 GH)
Cruciferae (Brassicaceae)	<i>Rorippa islandica</i> var. <i>glabra</i>	<i>R. palustris</i> var. <i>fernaldiana</i> , <i>R. palustris</i> var. <i>glabra</i>	smooth yellowcress	PerF	Wide	Rep	NA	Heil et al. (1993)	NA	Reports from CARE Herbarium based on collections from outside the park.
Cruciferae (Brassicaceae)	<i>Rorippa tenerrima</i>		low yellowcress	AnnF	Wide	Pres	Unc	Porter 4119 (CARE)	1986	
Cruciferae (Brassicaceae)	<i>Schoenocrambe barnebyi</i>	<i>Thelypodopsis barnebyi</i>	Barneby's reed-mustard	PerF	LocEn	Pres	Unc	Fleming 324 (CARE)	1987	Type locality is Sycamore Butte, San Rafael Swell, Emery Co, UT (Welsh 20345 BRY). USFWS: Endangered
Cruciferae (Brassicaceae)	<i>Schoenocrambe linifolia</i>	<i>Sisymbrium linifolium</i>	flax-leaved plainsmustard	PerF	Wide	Pres	Rare	Meyer 4561 (CARE)	1971	
Cruciferae (Brassicaceae)	<i>Sisymbrium altissimum</i>		tumble mustard	AnnF	Intro	Pres	Com	Porter 4134 (CARE)	1986	Native to Europe

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Cruciferae (Brassicaceae)	<i>Stanleya integrifolia</i>	<i>S. pinnata</i> var. <i>integrifolia</i>	smoothleaf prince's-plume	PerF	Wide	Pres	Rare	Fertig 22196 (CARE)	1986	
Cruciferae (Brassicaceae)	<i>Stanleya pinnata</i>	<i>S. pinnata</i> var. <i>pinnata</i>	prince's-plume	PerF	Wide	Pres	Abun	Nelson 9172 (CARE)	1958	
Cruciferae (Brassicaceae)	<i>Stanleya viridiflora</i>		green prince's- plume	PerF	Wide	Pres	Com	Meyer 4610 (CARE)	1980	
Cruciferae (Brassicaceae)	<i>Streptanthella longirostris</i>		long-beak fiddle- mustard	AnnF	Wide	Pres	Abun	Meyer 4695 (CARE)	1971	
Cruciferae (Brassicaceae)	<i>Streptanthus cordatus</i>	<i>S. cordatus</i> var. <i>cordatus</i>	heart-leaf jewelflower	PerF	Wide	Pres	Unc	Porter 3473 (CARE)	1986	
Cruciferae (Brassicaceae)	<i>Thelypodopsis divaricata</i>		candelabra thelypody	PerF	RegEn	Pres	Unc	Porter 2421 (CARE)	1986	Type locality is 10 miles E of Hite and ca 75 miles W of Blanding, San Juan Co, UT (Cronquist 9033 GH)
Cruciferae (Brassicaceae)	<i>Thelypodium integrifolium</i> var. <i>integrifolium</i>		entire-leaf thelypody	PerF	Wide	Pres	Unc	Porter 4290 (CARE)	1986	
Cupressaceae	<i>Juniperus communis</i> var. <i>depressa</i>	<i>J. communis</i> ssp. <i>alpina</i>	common juniper	Shrub	Wide	Pres	Unc	Porter 3847 (CARE)	1986	
Cupressaceae	<i>Juniperus osteosperma</i>	<i>Sabina osteosperma</i>	Utah juniper	Shrub	Wide	Pres	Abun	Harrison 803 (CARE)	1973	
Cupressaceae	<i>Juniperus scopulorum</i>	<i>Sabina scopulorum</i>	Rocky Mountain juniper	Tree	Wide	Pres	Unc	Meyer 4698 (CARE)	1981	
Cupressaceae	<i>Thuja occidentalis</i>		white cedar	Tree	Intro	Pres	Unc	Fleming 516 (CARE)	1987	Native to E North America
Cyperaceae	<i>Carex athrostachya</i>		slender-beaked sedge	PerG	Wide	Pres	Unc	Fleming s.n. (CARE)	1987	
Cyperaceae	<i>Carex aurea</i>	<i>C. garberi</i>	golden sedge	PerG	Wide	Pres	Abun	Meyer 4574 (CARE)	1980	
Cyperaceae	<i>Carex douglasii</i>		Douglas' sedge	PerG	Wide	Pres	Rare	Meyer 4452 (CARE)	1980	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Cyperaceae	<i>Carex duriuscula</i>	<i>C. eleocharis</i> , <i>C. stenophylla</i> , <i>C. stenophylla</i> ssp. <i>eleocharis</i>	narrowleaf sedge	PerG	Wide	Rep	Unc	Heil et al. (1993), Northern Colorado Plateau Network (in ed.)	2004	Reports from CARE Herbarium based on collections from outside the park.
Cyperaceae	<i>Carex filifolia</i>	<i>C. filifolia</i> var. <i>filifolia</i>	threadleaf sedge	PerG	Wide	Pres	Unc	Heil 3512 (CARE)	1987	
Cyperaceae	<i>Carex geophila</i>	Not included in <i>Flora of North America</i> (2002) for UT	White Mountain sedge	PerG	Sparse	Pres	Unc	Fleming BC314 (BRY)	1987	
Cyperaceae	<i>Carex hystericina</i>	<i>C. hystericina</i>	bottlebrush sedge	PerG	Wide	Pres	Rare	Meyer 4728 (CARE)	1981	
Cyperaceae	<i>Carex microptera</i>	<i>C. microptera</i> var. <i>microptera</i> , <i>C. festivella</i> , <i>C. macloviana</i> var. <i>microptera</i> , includes <i>C. limnophila</i>	small-wing sedge	PerG	Wide	Pres	Unc	Heil 3327 (CARE)	1986	
Cyperaceae	<i>Carex nebrascensis</i>		Nebraska sedge	PerG	Wide	Pres	Unc	Meyer 4465 (CARE)	1980	
Cyperaceae	<i>Carex occidentalis</i>		western sedge	PerG	Wide	Pres	Rare	Heil 3320 (CARE)	1987	
Cyperaceae	<i>Carex pellita</i>	<i>C. lanuginosa</i>	woolly sedge	PerG	Wide	Pres	Com	Meyer 4715 (CARE)	1980	
Cyperaceae	<i>Carex praegracilis</i>		blackcreeper sedge	PerG	Wide	Pres	Unc	Heil 3303 (CARE)	1987	
Cyperaceae	<i>Carex rossii</i>	<i>C. deflexa</i> var. <i>boottii</i> , <i>C. brevipes</i> , <i>C. pityophila</i>	Ross' sedge	PerG	Wide	Pres	Unc	Heil 3543 (CARE)	1987	



Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Cyperaceae	<i>Carex vallicola</i>		valley sedge	PerG	Wide	Rep	Unc	Heil et al. (1993), Northern Colorado Plateau Network (in ed.)	2004	Reports from CARE Herbarium based on collections from outside the park.
Cyperaceae	<i>Cyperus squarrosus</i>	<i>C. aristatus</i>	bearded flat-sedge	AnnG	Wide	Pres	Rare	Camp 363 (CARE)	1977	
Cyperaceae	<i>Eleocharis acicularis</i>		slender spikerush	PerG	Wide	Pres	Com	Heil 3401 (CARE)	1987	
Cyperaceae	<i>Eleocharis palustris</i>	Includes <i>E. macrostachya</i> , <i>E. erythropoda</i> , & <i>E. uniglumis</i>	common spikerush	PerG	Wide	Pres	Abun	Meyer 4596 (CARE)	1980	
Cyperaceae	<i>Eleocharis quinqueflora</i>	<i>E. pauciflora</i> , includes <i>E. suksdorfiana</i>	few-flower spikerush	PerG	Wide	Pres	Rare	Porter 3979 (CARE)	1986	
Cyperaceae	<i>Scirpus acutus</i>	<i>Schoenoplectus acutus</i> var. <i>occidentalis</i> , <i>Schoenoplectus acutus</i> var. <i>acutus</i> , <i>Schoenoplectus lacustris</i> sp. <i>acutus</i>	hardstem bulrush	PerG	Wide	Pres	Unc	Fleming 200 (CARE)	1986	
Cyperaceae	<i>Scirpus americanus</i>	<i>Scirpus olinyi</i> , <i>Schoenoplectus americanus</i>	American bulrush	PerG	Wide	Pres	Unc	Meyer 4606 (CARE)	1980	
Cyperaceae	<i>Scirpus maritimus</i>	<i>Scirpus maritimus</i> var. <i>paludosus</i> , <i>Schoenoplectus maritimus</i> , <i>Bolboschoenus maritimus</i> var. <i>paludosus</i>	alkali bulrush	PerG	Wide	Pres	Rare	Meyer 4569 (CARE)	1980	
Cyperaceae	<i>Scirpus microcarpus</i>		panicled bulrush	PerG	Wide	Rep	NA	Meyer (1982)	NA	Specimen has not been relocated

Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Cyperaceae	<i>Scirpus pungens</i> var. <i>longispicatus</i>	<i>Scirpus pungens</i> var. <i>polyphyllus</i> , <i>Schoenoplectus</i> <i>pungens</i> var. <i>longispicatus</i> , <i>Schoenoplectus</i> <i>pungens</i> var. <i>polyphyllus</i> , <i>Schoenoplectus</i> <i>pungens</i> var. <i>pungens</i>	three-square bulrush	PerG	Wide	Pres	Com	Porter 3540 (CARE)	1986	
Ebenaceae	<i>Diospyros virginiana</i>		common persimmon	Tree	Intro	Pres	Unc	Porter 4355 (CARE)	1986	Native to E North America
Elaeagnaceae	<i>Elaeagnus angustifolia</i>		Russian olive	Tree	Intro	Pres	Unc	Harrison 1123 (CARE)	1973	Native to Europe
Elaeagnaceae	<i>Shepherdia argentea</i>		silver buffaloberry	Shrub	Wide	Pres	Unc	Fleming 173 (CARE)	1986	
Elaeagnaceae	<i>Shepherdia canadensis</i>		Canada buffaloberry	Shrub	Wide	Pres	Unc	Heil 3285 (CARE)	1987	
Elaeagnaceae	<i>Shepherdia rotundifolia</i>		roundleaf buffaloberry	Shrub	RegEn	Pres	Abun	Harrison 820 (CARE)	1958	Type locality is upper valley of the Virgin, Kane Co, UT (Siler s.n. ISC)
Ephedraceae	<i>Ephedra torreyana</i>		Torrey's ephedra	Shrub	Wide	Pres	Abun	Harrison 812 (CARE)	1973	
Ephedraceae	<i>Ephedra viridis</i> var. <i>viridis</i>	<i>E. viridis</i>	green ephedra	Shrub	Wide	Pres	Abun	Swancara 32 (CARE)	1958	
Ephedraceae	<i>Ephedra viridis</i> var. <i>viscida</i>	<i>E. cutleri</i>	Cutler's ephedra	Shrub	RegEn	Pres	Unc	Harrison 890 (BRY)	1973	
Equisetaceae	<i>Equisetum arvense</i>		field horsetail	Fern	Wide	Pres	Unc	Harrison 854 (CARE)	1973	
Equisetaceae	<i>Equisetum hyemale</i> var. <i>affine</i>	<i>Hippochaete hyemalis</i> ssp. <i>affinis</i> , <i>E. praealtum</i>	tall scouring-rush	Fern	Wide	Pres	Unc	Heil 2752 (BRY)	1971	
Equisetaceae	<i>Equisetum laevigatum</i>	<i>Hippochaeta laevigata</i> , <i>E. kansanum</i>	smooth scouring-rush	Fern	Wide	Pres	Unc	Fleming BC-337 (CARE)	1971	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Ericaceae	<i>Arctostaphylos patula</i>	<i>A. patula</i> ssp. <i>platyphylla</i>	greenleaf manzanita	Shrub	Wide	Pres	Unc	Lehnert s.n. (CARE)	1958	
Euphorbiaceae	<i>Chamaesyce fendleri</i>	<i>Euphorbia fendleri</i>	Fendler's spurge	PerF	Wide	Pres	Abun	Harrison 1180 (CARE)	1970	
Euphorbiaceae	<i>Chamaesyce glyptosperma</i>	<i>Euphorbia glyptosperma</i>	ridge-seeded spurge	AnnF	Wide	Pres	Abun	Meyer 4636 (CARE)	1980	
Euphorbiaceae	<i>Chamaesyce parryi</i>	<i>Euphorbia parryi</i>	Parry's spurge	AnnF	Wide	Pres	Rare	Camp 377 (CARE)	1977	Type locality is St. George, Washington Co, UT (Parry 247 MO)
Euphorbiaceae	<i>Euphorbia brachycera</i>	<i>E. robusta</i> , <i>E. brachycera</i> var. <i>robusta</i> , <i>Tithymalus brachyceras</i>	shorthorn spurge	PerF	Wide	Pres	Abun	Meyer 4580 (CARE)	1980	
Euphorbiaceae	<i>Tragia ramosa</i>	<i>T. stylaris</i>	noseburn	PerF	Sparse	Rep	NA	Meyer (1982)	NA	Specimen has not been relocated
Fagaceae	<i>Quercus gambelii</i> var. <i>gambelii</i>	<i>Q. gambelii</i>	Gambel oak	Tree	Wide	Pres	Com	Fleming 177 (CARE)	1986	
Fagaceae	<i>Quercus welshii</i>	<i>Q. havardii</i> var. <i>tuckeri</i> , <i>Q. undulata</i>	shinnery oak	Shrub	RegEn	Pres	Unc	Meyer 4510 (CARE)	1980	Type locality of <i>Q. havardii</i> var. <i>tuckeri</i> is Low Pass E of Kents Lake, San Juan Co, UT (Welsh & Higgins 23630 BRY)
Fumariaceae	<i>Corydalis aurea</i> var. <i>occidentalis</i>	<i>C. curvisiliqua</i> ssp. <i>occidentalis</i>	golden corydalis	PerF	Wide	Pres	Unc	Heil 3324 (CARE)	1987	
Gentianaceae	<i>Centaureum exaltatum</i>		Great Basin centaury	PerF	Wide	Pres	Rare	Meyer 4641 (CARE)	1980	
Gentianaceae	<i>Gentiana affinis</i> var. <i>affinis</i>	<i>Pneumonanthe affinis</i>	Rocky Mountain gentian	PerF	Wide	Pres	Rare	Fleming 103 (CARE)	1986	
Gentianaceae	<i>Gentianella heterosepala</i>	<i>G. amarella</i> var. <i>heterosepala</i>	Engelmann's gentian	PerF	Wide	Pres	Rare	Heil 3562 (CARE)	1987	Type locality is northern slope Uinta Mtns, UT (Engelmann s.n. MO)

*Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.*

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Gentianaceae	<i>Swertia albomarginata</i>	<i>Frasera albomarginata</i>	white-margined swertia	PerF	Wide	Pres	Unc	Meyer 4740 (CARE)	1981	Type locality is near St. George, Washington Co, UT (Palmer s.n. US)
Gentianaceae	<i>Swertia radiata</i>	<i>Frasera speciosa</i>	elkweed	PerF	Wide	Pres	Rare	Heil 3563 (CARE)	1987	
Geraniaceae	<i>Erodium cicutarium</i>		stork's-bill	AnnF	Intro	Pres	Abun	Fleming 554 (CARE)	1988	Native to Europe
Geraniaceae	<i>Geranium caespitosum</i> var. <i>marginale</i>	<i>G. atropurpureum</i> var. <i>cowenii</i> , <i>G. atropurpureum</i> , <i>G. caespitosum</i> ssp. <i>atropurpureum</i> , <i>G. parryi</i>	small-leaf geranium	PerF	Wide	Pres	Unc	Meyer 4581 (CARE)	1980	Type locality of var. <i>marginale</i> is Aquarius Plateau, head of Poison Creek, Garfield Co, UT (Rydberg & Carlton 7401 NY)
Geraniaceae	<i>Geranium richardsonii</i>		Richardson's crane's-bill	PerF	Wide	Rep	Unc	Northern Colorado Plateau Network (in ed.)	2004	
Gramineae (Poaceae)	<i>Agropyron cristatum</i>	<i>A. cristatum</i> var. <i>cristatum</i> , <i>A. cristatum</i> ssp. <i>pectinatum</i> , <i>A. pectinatum</i> , <i>A. sibiricum</i> , <i>A. desertorum</i> , <i>A. fragile</i> , <i>A. mongolicum</i>	crested wheatgrass	PerG	Intro	Pres	Unc	Harrison 1127 (CARE)	1973	Native to Eurasia.
Gramineae (Poaceae)	<i>Agrostis exarata</i>		spike bentgrass	PerG	Wide	Pres	Rare	Meyer 4587 (CARE)	1980	
Gramineae (Poaceae)	<i>Agrostis stolonifera</i>	<i>A. alba</i> , <i>A. gigantea</i>	redtop	PerG	Intro	Pres	Com	Porter 5188 (CARE)	1974	Native to Eurasia and Africa
Gramineae (Poaceae)	<i>Alopecurus aequalis</i>	<i>A. aequalis</i> var. <i>aequalis</i>	shortawn foxtail	PerG	Wide	Pres	Rare	Heil 4433 (CARE)	1988	
Gramineae (Poaceae)	<i>Andropogon gerardii</i> var. <i>chrysocomus</i>	<i>A. hallii</i>	Hall's bluestem	PerG	Wide	Pres	Unc	Porter 4408 (BRY)	1986	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Gramineae (Poaceae)	<i>Andropogon gerardii</i> var. <i>gerardii</i>	<i>A. gerardii</i>	big bluestem	PerG	Wide	Pres	Unc	Markham s.n. (BRY)	1938	
Gramineae (Poaceae)	<i>Andropogon glomeratus</i> var. <i>scabriglumis</i>		bushy bluestem	PerG	Periph	Pres	Rare	Fleming 504 (CARE)	1987	
Gramineae (Poaceae)	<i>Aristida adscensionis</i>		sixweeks three-awn	AnnG	Periph	Pres	Rare	Lichthardt 401 (CARE)	1984	
Gramineae (Poaceae)	<i>Aristida purpurea</i>	<i>A. glauca</i> , <i>A. purpurea</i> var. <i>fendleriana</i> , <i>A. purpurea</i> var. <i>longiseta</i> , <i>A. fendleriana</i>	purple three-awn	PerG	Wide	Pres	Abun	Nelson 9170 (CARE)	1958	
Gramineae (Poaceae)	<i>Avena fatua</i> var. <i>sativa</i>	<i>A. sativa</i>	oats	AnnG	Intro	Rep	NA	Heil et al. (1993)	NA	Specimen has not been relocated. Native to Eurasia
Gramineae (Poaceae)	<i>Bothriochloa springfieldii</i>		Springfield's bluestem	PerG	Sparse	Pres	Rare	Harrison 11881 (BRY)	1951	
Gramineae (Poaceae)	<i>Bouteloua barbata</i>	<i>Chondrosom barbatum</i> , Includes vars. <i>barbata</i> & <i>rothrockii</i>	sixweeks grama	AnnG	Wide	Pres	Unc	Fleming 143 (CARE)	1986	
Gramineae (Poaceae)	<i>Bouteloua curtipendula</i>	Includes vars. <i>curtipendula</i> & <i>caespitosa</i>	sideoats grama	PerG	Wide	Pres	Unc	Heil 2699 (BRY)	1940	
Gramineae (Poaceae)	<i>Bouteloua eriopoda</i>	<i>Chondrosom eriopodum</i>	black grama	PerG	Wide	Pres	Unc	Camp 352 (CARE)	1977	
Gramineae (Poaceae)	<i>Bouteloua gracilis</i>	<i>Chondrosom gracile</i>	blue grama	PerG	Wide	Pres	Abun	Swancara 6 (CARE)	1958	
Gramineae (Poaceae)	<i>Bromus anomalus</i>	<i>Bromus frondosus</i> , <i>Bromopsis porteri</i> . Material ascribed to <i>B. anomalus</i> in regional floras is mostly <i>B. porteri</i> or <i>B. lanatipes</i> .	nodding brome	PerG	Wide	Rep	Unc	Northern Colorado Plateau Network (in ed.)	2004	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Gramineae (Poaceae)	<i>Bromus catharticus</i>	<i>B. willdenowii</i> , <i>B. catharticus</i> var. <i>catharticus</i>	rescue grass	AnnG	Intro	Pres	Unc	Meyer 4457 (CARE)	1980	Native to South America
Gramineae (Poaceae)	<i>Bromus ciliatus</i>	<i>Bromopsis canadensis</i> . Includes vars. <i>ciliatus</i> & <i>richardsonii</i>	fringed brome	PerG	Wide	Rep	Unc	Northern Colorado Plateau Network (in ed.)	2004	
Gramineae (Poaceae)	<i>Bromus inermis</i> var. <i>inermis</i>	<i>Bromopsis inermis</i>	smooth brome	PerG	Intro	Pres	Abun	Meyer 4453 (CARE)	1980	Native to Eurasia
Gramineae (Poaceae)	<i>Bromus japonicus</i>	<i>B. arvensis</i> . Includes <i>B. commutatus</i>	Japanese chess	AnnG	Intro	Pres	Unc	Porter 3983 (CARE)	1986	Native to Eurasia
Gramineae (Poaceae)	<i>Bromus rubens</i>		red brome	AnnG	Intro	Pres	Unc	Fertig & Lesica 21821 (CARE)	2005	Native to Eurasia
Gramineae (Poaceae)	<i>Bromus tectorum</i>	<i>Anisantha tectorum</i>	cheatgrass	AnnG	Intro	Pres	Abun	Porter 2506 (CARE)	1986	Native to Eurasia
Gramineae (Poaceae)	<i>Calamagrostis scopulorum</i>		Jones' reedgrass	PerG	Wide	Pres	Unc	Porter 5197 (CARE)	1987	Type locality is Springdale, Washington Co, UT (Jones 6075 POM)
Gramineae (Poaceae)	<i>Calamagrostis stricta</i>	<i>C. neglecta</i> , <i>C. inexpansa</i>	slimstem reedgrass	PerG	Wide	Pres	Rare	Fleming 666 (CARE)	1986	
Gramineae (Poaceae)	<i>Cenchrus longispinus</i>		field sandbur	AnnG	Wide	Pres	Unc	Meyer 4685 (CARE)	1980	
Gramineae (Poaceae)	<i>Dactylis glomerata</i>		orchard grass	PerG	Intro	Pres	Unc	Harrison 1352 (CARE)	1974	Native to Eurasia and Africa
Gramineae (Poaceae)	<i>Distichlis spicata</i>	<i>D. spicata</i> var. <i>stricta</i> , <i>D. stricta</i>	desert saltgrass	PerG	Wide	Pres	Unc	Erdman 2870 (CARE)	1965	
Gramineae (Poaceae)	<i>Echinochloa crus-galli</i>	Welsh et al. (2003) include <i>E. microstachya</i> ( <i>E. muricata</i> var. <i>microstachya</i> )	barnyard-grass	AnnG	Intro	Pres	Rare	Meyer 4625 (CARE)	1980	Native to Eurasia
Gramineae (Poaceae)	<i>Elymus canadensis</i>	<i>E. canadensis</i> var. <i>canadensis</i>	Canada wildrye	PerG	Wide	Pres	Unc	Fowler, May, & Hak 458 (CARE)	1980	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Gramineae (Poaceae)	<i>Elymus elymoides</i>	<i>E. elymoides</i> var. <i>elymoides</i> , <i>Sitanion hystrix</i>	squirreltail	PerG	Wide	Pres	Abun	Harrison 874 (CARE)	1973	
Gramineae (Poaceae)	<i>Elymus junceus</i>	<i>Psathyrostachys juncea</i>	Russian wildrye	PerG	Intro	Pres	Unc	Fleming BC326 (CARE)	1987	Native to Russia
Gramineae (Poaceae)	<i>Elymus lanceolatus</i>	<i>E. lanceolatus</i> var. <i>lancoelatus</i> , <i>Agropyron dasystachyum</i> var. <i>dasystachyum</i> . Includes var. <i>riparium</i> , <i>A. albicans</i> var. <i>albicans</i> , <i>A. albicans</i> var. <i>griffithsii</i>	thickspike wheatgrass	PerG	Wide	Pres	Unc	Heil 2590 (CARE)	1986	
Gramineae (Poaceae)	<i>Elymus repens</i>	<i>Agropyron repens</i> , <i>Elytrigia repens</i>	quackgrass	PerG	Intro	Pres	Unc	Porter 4003 (CARE)	1986	Utah state noxious weed. Native to Eurasia
Gramineae (Poaceae)	<i>Elymus salinus</i>	<i>E. salina</i> , <i>E. ambiguus</i> , <i>Leymus salinus</i> , <i>L. salina</i> , <i>L. ambiguus</i>	Salina wildrye	PerG	Wide	Pres	Abun	Meyer 4751 (CARE)	1981	Type locality is top of Salina Pass, Sevier Co, UT (Jones 5447 POM)
Gramineae (Poaceae)	<i>Elymus smithii</i>	<i>Agropyron smithii</i> , <i>Pascopyrum smithii</i> . Includes vars. <i>smithii</i> & <i>palmeri</i>	western wheatgrass	PerG	Wide	Pres	Unc	Meyer 4665 (CARE)	1980	
Gramineae (Poaceae)	<i>Elymus spicatus</i>	<i>Agropyron spicatum</i> , <i>Pseudoroegneria spicata</i> . Includes ssp. <i>inermis</i> & <i>spicata</i>	bluebunch wheatgrass	PerG	Wide	Pres	Unc	Porter 3965 (CARE)	1986	



**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Gramineae (Poaceae)	<i>Elymus trachycaulus</i>	<i>E. trachycaulus</i> , var. <i>trachycaulus</i> , <i>E. alaskanus</i> ssp. <i>latiglumis</i> , <i>Agropyron caninum</i> , <i>A. subsecundum</i> , <i>A. trachycaulum</i> , <i>A. latiglume</i>	slender wheatgrass	PerG	Wide	Pres	Com	Meyer 4464 (CARE)	1980	
Gramineae (Poaceae)	<i>Elymus x saundersii</i>	x <i>Agrositanion saundersii</i> . Hybrid of <i>E. trachycaulus</i> x <i>E. elymoides</i>	Saunders' wheatgrass	PerG	Sparse	Pres	Rare	Meyer 4472 (CARE)	1980	
Gramineae (Poaceae)	<i>Enneapogon desvauxii</i>		spike pappusgrass	PerG	Sparse	Pres	Unc	Camp 402 (CARE)	1977	
Gramineae (Poaceae)	<i>Eragrostis pectinacea</i>		tufted lovegrass	AnnG	Wide	Pres	Rare	Heil 3582 (CARE)	1987	
Gramineae (Poaceae)	<i>Erioneuron pilosum</i>		hairy tridens	PerG	Wide	Pres	Unc	Meyer 4497 (CARE)	1980	
Gramineae (Poaceae)	<i>Erioneuron pulchellum</i>	<i>Dasyochloa pulchella</i>	fluffgrass	PerG	Wide	Pres	Unc	Porter 5356 (CARE)	1988	
Gramineae (Poaceae)	<i>Festuca arundinacea</i>	<i>Lolium arundinaceum</i> , <i>Schedonorus phoenix</i> , <i>S. arundinaceus</i>	tall fescue	PerG	Intro	Pres	Unc	Meyer 4576 (CARE)	1980	Native to Europe
Gramineae (Poaceae)	<i>Festuca octoflora</i>	Includes vars. <i>glauca</i> , <i>hirtella</i> , & <i>octoflora</i> , <i>Vulpia octoflora</i>	sixweeks fescue	AnnG	Wide	Pres	Unc	Porter 2519 (CARE)	1986	
Gramineae (Poaceae)	<i>Festuca ovina</i> var. <i>saximontana</i>	<i>F. ovina</i> var. <i>rydbergii</i> , <i>F. saximontana</i> var. <i>saximontana</i>	Rocky Mountain fescue	PerG	Wide	Pres	Unc	Meyer 4575 (CARE)	1980	
Gramineae (Poaceae)	<i>Festuca sororia</i>		ravine fescue	PerG	Sparse	Pres	Rare	Porter 5104 (CARE)	1987	
Gramineae (Poaceae)	<i>Glyceria striata</i>	Includes <i>G. elata</i>	fowl mannagrass	PerG	Wide	Pres	Rare	Heil 4432 (CARE)	1988	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Gramineae (Poaceae)	<i>Hilaria jamesii</i>	<i>Pleuraphis jamesii</i>	galleta	PerG	Wide	Pres	Abun	Nelson 9555 (CARE)	1970	
Gramineae (Poaceae)	<i>Hordeum jubatum</i>	<i>Critesion jubatum</i>	foxtail barley	PerG	Wide	Pres	Abun	Heil 3354 (CARE)	1987	
Gramineae (Poaceae)	<i>Hordeum murinum</i>	<i>H. murinum</i> ssp. <i>leporinum</i> , <i>H. leporinum</i> , <i>H. glaucum</i> , <i>Critesion glaucum</i>	rabbit barley	AnnG	Intro	Pres	Unc	Fleming BC313 (CARE)	1987	Native to Europe
Gramineae (Poaceae)	<i>Hordeum pusillum</i>	<i>Critesion pusillum</i>	little barley	AnnG	Wide	Pres	Unc	Porter 2508 (CARE)	1986	
Gramineae (Poaceae)	<i>Koeleria macrantha</i>	<i>K. cristata</i> , <i>K. pyramidata</i> , <i>K. nitida</i>	junegrass	PerG	Wide	Pres	Unc	Meyer 4773 (CARE)	1981	
Gramineae (Poaceae)	<i>Lolium perenne</i>		perennial ryegrass	PerG	Intro	Pres	Unc	Heil 3400 (CARE)	1986	Native to Eurasia and Africa
Gramineae (Poaceae)	<i>Lycurus phleoides</i>	<i>L. setosus</i>	wolftail	PerG	Wide	Pres	Unc	Fleming 526 (CARE)	1987	
Gramineae (Poaceae)	<i>Muhlenbergia andina</i>		foxtail muhly	PerG	Wide	Pres	Abun	Camp 433 (CARE)	1977	
Gramineae (Poaceae)	<i>Muhlenbergia asperifolia</i>		scratchgrass	PerG	Wide	Pres	Com	Porter 4073 (CARE)	1986	
Gramineae (Poaceae)	<i>Muhlenbergia pauciflora</i>	Includes reports of <i>M. arsenei</i>	New Mexican muhly	PerG	Wide	Pres	Unc	Meyer 4671 (CARE)	1980	
Gramineae (Poaceae)	<i>Muhlenbergia pungens</i>		sandhill muhly	PerG	Wide	Pres	Abun	Camp 423 (CARE)	1977	
Gramineae (Poaceae)	<i>Muhlenbergia racemosa</i>		green muhly	PerG	Wide	Pres	Rare	Porter 4265 (BRY)	1986	
Gramineae (Poaceae)	<i>Muhlenbergia thurberi</i>	Includes <i>M. curtifolia</i>	Thurber's muhly	PerG	Wide	Pres	Unc	Meyer 4442 (CARE)	1980	Type locality of <i>M. curtifolia</i> is between Kanab & Carmel, Kane Co, UT (Jones 6077j; US)
Gramineae (Poaceae)	<i>Munroa squarrosa</i>	<i>Monroa squarrosa</i>	false buffalograss	AnnG	Wide	Pres	Unc	Camp 396 (CARE)	1977	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Gramineae (Poaceae)	<i>Oryzopsis micrantha</i>	<i>Piptatherum micranthum</i>	littelseed ricegrass	PerG	Wide	Pres	Unc	Porter 5116 (CARE)	1987	
Gramineae (Poaceae)	<i>Panicum acuminatum</i>	<i>P. occidentale</i> , <i>P. tennesseense</i> , <i>P. huachucae</i> , <i>Dichanthelium acuminatum</i> ssp. <i>fasciculatum</i> , <i>D. lanuginosum</i> var. <i>fasciculatum</i>	bundle panicgrass	PerG	Wide	Pres	Rare	Meyer 4716 (CARE)	1981	
Gramineae (Poaceae)	<i>Panicum capillare</i>	<i>P. capillare</i> var. <i>occidentale</i>	witchgrass	AnnG	Wide	Pres	Unc	Fleming 117 (CARE)	1986	
Gramineae (Poaceae)	<i>Panicum miliaceum</i>	<i>P. miliaceum</i> ssp. <i>rudérale</i>	broomcorn panicgrass	AnnG	Intro	Pres	Unc	Lichthardt 402 (CARE)	1984	Native to Asia
Gramineae (Poaceae)	<i>Panicum oligoanthos</i> var. <i>scribnerianum</i>	<i>Dichanthelium oligoanthos</i> var. <i>scribnerianum</i>	Scribner panicgrass	PerG	Sparse	Pres	Unc	Fleming 528 (CARE)	1987	
Gramineae (Poaceae)	<i>Panicum virgatum</i>		switchgrass	PerG	Wide	Pres	Unc	Camp 259 (CARE)	1977	
Gramineae (Poaceae)	<i>Phleum pratense</i>		timothy	PerG	Intro	Pres	Com	Meyer 4688 (CARE)	1980	Native to Eurasia
Gramineae (Poaceae)	<i>Phragmites australis</i>	<i>P. communis</i>	common reed	PerG	Wide	Pres	Com	Harrison 1192 (CARE)	1973	
Gramineae (Poaceae)	<i>Poa bigelovii</i>		Bigelow's bluegrass	AnnG	Wide	Pres	Rare	Fleming 584a (CARE)	1988	
Gramineae (Poaceae)	<i>Poa compressa</i>		Canada bluegrass	PerG	Intro	Pres	Unc	Porter 4271 (CARE)	1986	Native to Eurasia
Gramineae (Poaceae)	<i>Poa fendleriana</i>	<i>P. longiligula</i> , <i>P. fendleriana</i> ssp. <i>longiligula</i> ; includes reports of <i>P. cusickii</i> & <i>P. epilis</i>	muttongrass	PerG	Wide	Pres	Abun	Harrison 836 (CARE)	1973	
Gramineae (Poaceae)	<i>Poa palustris</i>		fowl bluegrass	PerG	Wide	Pres	Rare	Porter 4170 (CARE)	1986	
Gramineae (Poaceae)	<i>Poa pratensis</i>	<i>P. agassizensis</i>	Kentucky bluegrass	PerG	Intro	Pres	Com	Meyer 4663 (CARE)	1980	Native to Europe

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Gramineae (Poaceae)	<i>Poa secunda</i>	Includes <i>P. gracillima</i> , <i>P. juncifolia</i> , <i>P. sandbergii</i> , <i>P. canbyi</i> , <i>P. scabrella</i> , <i>P. nevadensis</i> , <i>P. ampla</i> , and all vars. of <i>P. secunda</i>	Sandberg's bluegrass	PerG	Wide	Pres	Unc	Meyer 4507 (CARE)	1980	
Gramineae (Poaceae)	<i>Polypogon monspeliensis</i>		rabbitfoot-grass	AnnG	Intro	Pres	Unc	Meyer 4600 (CARE)	1980	Native to Eurasia and Africa
Gramineae (Poaceae)	<i>Polypogon semiverticillatus</i>	<i>Agrostis semiverticillata</i> , <i>P. viridis</i>	water polyogon	PerG	Intro	Pres	Unc	Meyer 4718 (CARE)	1981	Native to Eurasia and Africa
Gramineae (Poaceae)	<i>Puccinellia distans</i>		weeping alkaligrass	PerG	Intro	Pres	Unc	Porter 5162 (CARE)	1987	Native to Eurasia
Gramineae (Poaceae)	<i>Puccinellia nuttalliana</i>	<i>P. airoides</i>	Nuttall's alkaligrass	PerG	Wide	Pres	Unc	Meyer 4570 (CARE)	1980	
Gramineae (Poaceae)	<i>Schedonardus paniculatus</i>		tumblegrass	PerG	Sparse	Pres	Unc	Fleming 119 (CARE)	1986	
Gramineae (Poaceae)	<i>Schizachne purpurascens</i>		false melic	PerG	Sparse	Pres	Rare	Fleming 156 (CARE)	1986	
Gramineae (Poaceae)	<i>Schizachyrium scoparium</i>	<i>Andropogon scoparius</i> , <i>S. scoparium</i> var. <i>neomexicanum</i>	little bluestem	PerG	Wide	Pres	Unc	Fleming 167 (CARE)	1986	
Gramineae (Poaceae)	<i>Setaria glauca</i>	<i>S. pumila</i> ssp. <i>pumila</i> , <i>Pennisetum glaucum</i>	yellow bristlegrass	AnnG	Intro	Pres	Com	Meyer 4670 (CARE)	1980	Native to Eurasia
Gramineae (Poaceae)	<i>Setaria viridis</i>		green bristlegrass	AnnG	Intro	Pres	Com	Meyer 4644 (CARE)	1980	Native to Eurasia
Gramineae (Poaceae)	<i>Spartina gracilis</i>		alkali cordgrass	PerG	Wide	Pres	Unc	Meyer 4682 (CARE)	1980	
Gramineae (Poaceae)	<i>Sphenopholis obtusata</i>	<i>S. obtusata</i> var. <i>obtusata</i>	prairie wedgegrass	PerG	Wide	Pres	Rare	Camp 1677 (CARE)	1977	
Gramineae (Poaceae)	<i>Sporobolus airoides</i> var. <i>airoides</i>	<i>S. airoides</i>	alkali sacaton	PerG	Wide	Pres	Abun	Harrison 1010 (CARE)	1973	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Gramineae (Poaceae)	<i>Sporobolus contractus</i>		spike dropseed	PerG	Wide	Pres	Com	Meyer 4589 (CARE)	1980	
Gramineae (Poaceae)	<i>Sporobolus cryptandrus</i>		sand dropseed	PerG	Wide	Pres	Abun	Fleming 165 (CARE)	1986	
Gramineae (Poaceae)	<i>Sporobolus flexuosus</i>		mesa dropseed	PerG	Wide	Pres	Com	Heil 2948 (BRY)	1986	
Gramineae (Poaceae)	<i>Sporobolus giganteus</i>		giant dropseed	PerG	Wide	Pres	Unc	Camp 349 (CARE)	1977	
Gramineae (Poaceae)	<i>Stipa arida</i>	<i>Achnatherum aridum</i>	Mormon needlegrass	PerG	Wide	Pres	Unc	Meyer 4746 (CARE)	1981	Type locality is near Milford, Beaver Co, UT (Jones 2106)
Gramineae (Poaceae)	<i>Stipa comata</i> var. <i>comata</i>	<i>Hesperostipa comata</i> var. <i>comata</i>	needle-and-thread	PerG	Wide	Pres	Abun	Fertig & Lesica 21813 (CARE)	1938	
Gramineae (Poaceae)	<i>Stipa coronata</i> var. <i>parishii</i>	<i>Achnatherum coronatum</i> , A. <i>parishii</i> ssp. <i>parishii</i> , S. <i>parishii</i>	crested needlegrass	PerG	Wide	Pres	Rare	Porter 5168 (CARE)	1986	
Gramineae (Poaceae)	<i>Stipa hymenoides</i>	<i>Oryzopsis hymenoides</i> , <i>Achnatherum hymenoides</i>	Indian ricegrass	PerG	Wide	Pres	Abun	Swancara 7 (CARE)	1958	
Gramineae (Poaceae)	<i>Stipa lettermanii</i>	<i>Achnatherum lettermanii</i>	Letterman's needlegrass	PerG	Wide	Rep	Unc	Northern Colorado Plateau Network (in ed.)	2004	
Gramineae (Poaceae)	<i>Stipa neomexicana</i>	<i>Hesperostipa neomexicana</i>	New Mexico feathergrass	PerG	Wide	Pres	Rare	Harrison 914 (CARE)	1973	
Gramineae (Poaceae)	<i>Stipa pinetorum</i>	<i>Achnatherum pinetorum</i>	pine needlegrass	PerG	Wide	Pres	Unc	Lighthardt 503 (CARE)	1985	Type locality is Panguitch Lake, Garfield Co, UT (Jones 6023 POM)

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Gramineae (Poaceae)	<i>Stipa scribneri</i>	<i>Achnatherum scribneri</i>	Scribner needlegrass	PerG	Periph	Pres	Unc	Porter 4083 (CARE)	1986	Photos of specimen from CARE confirmed by Mary Barkworth, 2005. First reported for UT in Cronquist et al. (1977), but not recognized in Welsh et al. (2003).
Gramineae (Poaceae)	<i>Stipa speciosa</i>	<i>Achnatherum speciosum, Jarava speciosa</i>	desert needlegrass	PerG	Wide	Pres	Com	Camp 545 (CARE)	1978	
Gramineae (Poaceae)	<i>Stipa x bloomeri</i>	<i>Stiporyzopsis x bloomeri, Achnatherum x bloomeri</i> . Hybrids between <i>S. hymenoides</i> and other <i>Stipa</i> species except <i>S. comata</i>	Bloomer's ricegrass	PerG	Wide	Pres	Rare	Porter 3531 (CARE)	1986	
Gramineae (Poaceae)	<i>Zea mays</i>		maize	AnnG	Intro	Pres	Unc	Fleming 194 (CARE)	1986	Native to Central America
Hippuridaceae	<i>Hippuris vulgaris</i>		common mare's-tail	PerF	Wide	Pres	Rare	Porter 4107 (CARE)	1986	
Hydrophyllaceae	<i>Nama retrorsum</i>		Howell's nama	AnnF	RegEn	Rep	NA	Heil et al. (1993)	NA	Report from CARE Herbarium based on collections from outside the park. US FWS: Category 3C
Hydrophyllaceae	<i>Phacelia crenulata</i> var. <i>corrugata</i>	Var. not recognized in Cronquist et al. (1984)	corrugate phacelia	AnnF	Wide	Pres	Com	Harrison 1143 (CARE)	1973	
Hydrophyllaceae	<i>Phacelia demissa</i> var. <i>demissa</i>	<i>P. demissa</i>	brittle phacelia	AnnF	RegEn	Pres	Com	Nelson 9567 (CARE)	1971	
Hydrophyllaceae	<i>Phacelia ivesiana</i>		Ives' phacelia	AnnF	Wide	Pres	Com	Meyer 4444 (CARE)	1980	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Hydrophyllaceae	<i>Phacelia rafaensis</i>	Included in <i>P. constancei</i> by some authors	San Rafael phacelia	PerF	RegEn	Pres	Unc	Meyer 4708 (CARE)	1972	Type locality is Fruita, Capitol Reef NP, Wayne Co, UT (Atwood & Higgins 1834 BRY)
Iridaceae	<i>Iris missouriensis</i>		Rocky Mountain iris	PerF	Wide	Pres	Rare	Heil 2753 (CARE)	1986	
Iridaceae	<i>Sisyrinchium demissum</i>		blue-eyed grass	PerF	Wide	Pres	Unc	Harrison 1452 (CARE)	1974	
Juglandaceae	<i>Juglans nigra</i>		black walnut	Tree	Intro	Pres	Unc	Harrison 1382 (CARE)	1974	Native to E North America
Juglandaceae	<i>Juglans regia</i>		English walnut	Tree	Intro	Pres	Unc	Swancara 34 (CARE)	1958	Native to Eurasia
Juncaceae	<i>Juncus alpinus</i>	<i>J. alpinoarticulatus</i>	northern rush	PerG	Wide	Pres	Unc	Porter 4274 (CARE)	1986	
Juncaceae	<i>Juncus arcticus</i>	<i>J. arcticus</i> var. <i>balticus</i> , <i>J. arcticus</i> ssp. <i>ater</i> , <i>J. balticus</i> var. <i>montanus</i> ; includes var. <i>mexicanus</i>	Baltic rush	PerG	Wide	Pres	Abun	Porter 2517 (CARE)	1986	
Juncaceae	<i>Juncus bufonius</i>	Includes vars. <i>bufonius</i> , <i>occidentalis</i> , <i>halophilus</i> , & <i>ambiguus</i>	toad rush	AnnG	Wide	Pres	Unc	Fleming BC363 (CARE)	1986	
Juncaceae	<i>Juncus ensifolius</i> var. <i>brunnescens</i>	Included in <i>J. ensifolius</i> var. <i>montanus</i> by some authors; <i>J. saximontanus</i> forma <i>brunnescens</i>	Tracy's rush	PerG	Wide	Pres	Unc	Meyer 4635 (CARE)	1980	
Juncaceae	<i>Juncus ensifolius</i> var. <i>montanus</i>	<i>J. saximontanus</i> , Includes <i>J. tracyi</i> , <i>J. xiphoides</i>	mountain rush	PerG	Wide	Pres	Unc	Meyer 4605 (CARE)	1980	
Juncaceae	<i>Juncus longistylus</i>		longstyle rush	PerG	Wide	Pres	Unc	Porter 3980 (CARE)	1986	



**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Juncaceae	<i>Juncus tenuis</i>	Includes vars. <i>dudleyi</i> , <i>congestus</i> , & <i>tenuis</i> , <i>J. dudleyi</i>	poverty rush	PerG	Wide	Pres	Unc	Porter 4284 (CARE)	1986	
Juncaceae	<i>Juncus torreyi</i>		Torrey's rush	PerG	Wide	Pres	Unc	Porter 4268 (CARE)	1986	
Juncaceae	<i>Triglochin concinnum</i> var. <i>debilis</i>	Included in <i>T. maritima</i> by some recent authors	low arrowgrass	PerG	Wide	Pres	Unc	Harms 192 (CARE)	2005	Type locality of var. <i>debilis</i> is Johnson Canyon, Kane Co, UT (Jones 5289 POM)
Juncaginaceae	<i>Triglochin maritima</i>	<i>T. maritima</i> var. <i>elata</i> . Includes <i>T. concinnum</i>	seaside arrowgrass	PerG	Wide	Pres	Unc	Meyer 4597 (CARE)	1980	
Labiatae (Lamiaceae)	<i>Hedeoma drummondii</i>		mock pennyroyal	PerF	Wide	Pres	Unc	Porter 5094 (CARE)	1987	
Labiatae (Lamiaceae)	<i>Lycopus asper</i>		rough bugleweed	PerF	Wide	Pres	Rare	Heil 3491 (CARE)	1987	
Labiatae (Lamiaceae)	<i>Marrubium vulgare</i>		common horehound	PerF	Intro	Pres	Unc	Heil 4430 (CARE)	1988	Native to Eurasia
Labiatae (Lamiaceae)	<i>Mentha arvensis</i> var. <i>glabrata</i>	<i>M. arvensis</i> var. <i>canadensis</i>	field mint	PerF	Wide	Pres	Unc	Meyer 4615 (CARE)	1980	
Labiatae (Lamiaceae)	<i>Mentha piperita</i>	<i>M. x piperita</i> . Hybrid of <i>M. aquatica</i> x <i>M. spicata</i> .	peppermint	PerF	Intro	Pres	Unc	Meyer 4643 (CARE)	1980	Native to Europe.
Labiatae (Lamiaceae)	<i>Mentha spicata</i>		spearmint	PerF	Intro	Pres	Unc	Lehnert s.n. (CARE)	1958	Native to Europe
Labiatae (Lamiaceae)	<i>Monarda odoratissima</i>	<i>M. odoratissima</i> var. <i>glauc</i> , <i>M. glauca</i>	stinking horsemint	PerF	Wide	Rep	NA	Heil et al. (1993)	NA	Reports from CARE Herbarium based on collections from outside the park.
Labiatae (Lamiaceae)	<i>Nepeta cataria</i>		catnip	PerF	Intro	Pres	Unc	Meyer 4680 (CARE)	1980	Native to Europe
Labiatae (Lamiaceae)	<i>Poliomintha incana</i>		purple sage	Shrub	Wide	Pres	Unc	Camp 556 (CARE)	1978	
Labiatae (Lamiaceae)	<i>Salvia reflexa</i>		annual sage	PerF	Sparse	Pres	Unc	Meyer 4642 (CARE)	1980	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Labiatae (Lamiaceae)	<i>Scutellaria galericulata</i>	<i>S. galericulata</i> var. <i>epilobifolia</i>	little skullcap	PerF	Wide	Pres	Rare	Porter 5099 (CARE)	1987	
Labiatae (Lamiaceae)	<i>Stachys palustris</i> var. <i>pilosa</i>	<i>S. pilosa</i> var. <i>pilosa</i>	hairy hedge-nettle	PerF	Wide	Pres	Rare	Meyer 4614 (CARE)	1980	
Leguminosae (Fabaceae)	<i>Astragalus agrestis</i>	<i>A. dasygloTTis</i>	field milkvetch	PerF	Wide	Pres	Rare	Heil 3569 (CARE)	1987	
Leguminosae (Fabaceae)	<i>Astragalus amphioxys</i> var. <i>amphioxys</i>		crescent milkvetch	PerF	Wide	Pres	Unc	Porter 2364 (CARE)	1973	
Leguminosae (Fabaceae)	<i>Astragalus amphioxys</i> var. <i>vespertinus</i>		Sheldon's milkvetch	PerF	RegEn	Pres	Unc	Neese 11317 (BRY)	1982	
Leguminosae (Fabaceae)	<i>Astragalus asclepiadoides</i>		milkweed milkvetch	PerF	RegEn	Pres	Unc	Harrison 1027 (CARE)	1973	Type locality is Cisco, Grand Co, UT (Jones s.n. POM)
Leguminosae (Fabaceae)	<i>Astragalus barnebyi</i>	<i>A. desperatus</i> var. <i>conspicuus</i>	Barneby's milkvetch	PerF	RegEn	Pres	Rare	Fleming 620 (CARE)	1988	USFWS: 3C
Leguminosae (Fabaceae)	<i>Astragalus brandegei</i>		Brandegee's milkvetch	PerF	RegEn	Pres	Unc	Fleming 640 (CARE)	1986	USFWS: former C2 candidate
Leguminosae (Fabaceae)	<i>Astragalus calycosus</i> var. <i>calycosus</i>	<i>A. calycosus</i>	Torrey's milkvetch	PerF	Wide	Pres	Rare	Barnes & Harper 3880 (CARE)	1988	
Leguminosae (Fabaceae)	<i>Astragalus ceramicus</i> var. <i>ceramicus</i>		painted milkvetch	PerF	Wide	Pres	Com	Meyer 4445 (CARE)	1971	
Leguminosae (Fabaceae)	<i>Astragalus coltonii</i> var. <i>coltonii</i>		Colton's milkvetch	PerF	RegEn	Pres	Unc	Meyer 4501 (CARE)	1980	Type locality is Castle Gate, Carbon Co, UT (Jones s.n. POM)
Leguminosae (Fabaceae)	<i>Astragalus consobrinus</i>	<i>A. castaneiformis</i> var. <i>consobrinus</i>	Bicknell milkvetch	PerF	LocEn	Pres	Unc	Nelson 9581 (CARE)	1971	Type locality is near Bicknell, Wayne Co, UT (Ripley & Barneby 8605 CAS). USFS: Region 4 Sensitive
Leguminosae (Fabaceae)	<i>Astragalus convallarius</i> var. <i>convallarius</i>	<i>A. diversifolius</i> var. <i>campestris</i>	lesser rushy milkvetch	PerF	Wide	Pres	Unc	Porter 3967 (CARE)	1971	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Leguminosae (Fabaceae)	<i>Astragalus desperatus</i> var. <i>petrophilus</i>		rockloving milkvetch	PerF	LocEn	Pres	Unc	Meyer 4440 (CARE)	1971	Type locality is San Rafael Swell, Emery Co, UT (Jones s.n. POM)
Leguminosae (Fabaceae)	<i>Astragalus episcopus</i>	<i>A. episcopus</i> var. <i>episcopus</i>	bishop's milkvetch	PerF	RegEn	Pres	Unc	Nelson 9570 (CARE)	1971	Type locality is "southern Utah", Kane Co?, UT (Bishop s.n. GH)
Leguminosae (Fabaceae)	<i>Astragalus flavus</i> var. <i>argillosus</i>	Not recognized by many authorities	clay milkvetch	PerF	LocEn	Pres	Rare	Fleming 309 (CARE)	1971	Type locality is Green River, Emery Co, UT (Jones s.n. POM)
Leguminosae (Fabaceae)	<i>Astragalus flavus</i> var. <i>flavus</i>	<i>A. flavus</i> var. <i>candicans</i>	yellow milkvetch	PerF	Wide	Pres	Unc	Heil 4356 (CARE)	1988	Type locality of var. <i>candicans</i> is near Richfield, Sevier Co, UT (Ward 246 GH)
Leguminosae (Fabaceae)	<i>Astragalus harrissonii</i>		Harrison's milkvetch	PerF	LocEn	Pres	Unc	Meyer 4529 (CARE)	1961	Type locality is near Fruita, Capitol Reef NP, Wayne Co, UT (Barneby 13131 CAS). USFWS: 3C
Leguminosae (Fabaceae)	<i>Astragalus kentrophyta</i> var. <i>elatus</i>		tall kentrophyta	PerF	Wide	Pres	Com	Heil 4649 (CARE)	1988	
Leguminosae (Fabaceae)	<i>Astragalus laccoliticus</i>	<i>A. chamaeleuce</i> var. <i>laccoliticus</i>	laccolite milkvetch	PerF	LocEn	Pres	Rare	Fleming 617 (CARE)	1988	Type locality is Cottrell's Ranch, Henry Mtns., Garfield Co, UT (Jones 5658q POM)
Leguminosae (Fabaceae)	<i>Astragalus lentiginosus</i> var. <i>palans</i>		straggling milkvetch	PerF	RegEn	Pres	Unc	Harrison 830 (CARE)	1973	Type locality is Montezuma Canyon, San Juan Co, UT (Eastwood s.n. POM)
Leguminosae (Fabaceae)	<i>Astragalus lonchocarpus</i>		great rushy milkvetch	PerF	Wide	Pres	Com	Meyer 4467 (CARE)	1980	Type locality is "southern Utah", (Parry 32 ISC)

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Leguminosae (Fabaceae)	<i>Astragalus malacoides</i>		Kaiparowits milkvetch	PerF	LocEn	Pres	Unc	Meyer 4518 (CARE)	1980	Type locality is Kaiparowits Plateau, S of Willow Tank, Kane Co, UT (Harrison 9069 US). USFWS: 3C
Leguminosae (Fabaceae)	<i>Astragalus moencoppensis</i>		Moenkopi milkvetch	PerF	RegEn	Pres	Unc	Porter 3527 (CARE)	1986	
Leguminosae (Fabaceae)	<i>Astragalus mollissimus</i> var. <i>thompsoniae</i>		woolly milkvetch	PerF	Wide	Pres	Com	Nelson 9481 (CARE)	1971	Type locality is Kanab, Kane Co, UT (Thompson s.n. GH)
Leguminosae (Fabaceae)	<i>Astragalus musiniensis</i>		Ferron milkvetch	PerF	RegEn	Pres	Unc	Harrison 822 (CARE)	1973	Type locality is 2 miles S of Ferron, Emery Co, UT (Jones 5454a POM)
Leguminosae (Fabaceae)	<i>Astragalus nuttallianus</i> var. <i>micranthiformis</i>		small-flowered milkvetch	AnnF	RegEn	Pres	Rare	Camp 533 (CARE)	1977	
Leguminosae (Fabaceae)	<i>Astragalus pardalinus</i>		panther milkvetch	PerF	LocEn	Pres	Unc	Porter 3812 (CARE)	1986	Type locality is Cedar Mountain, Emery Co, UT (Jones s.n. NY). USFWS: 3C
Leguminosae (Fabaceae)	<i>Astragalus pattersonii</i>		Patterson's milkvetch	PerF	RegEn	Pres	Unc	Welsh & Neese 23445 (BRY)	1985	
Leguminosae (Fabaceae)	<i>Astragalus praelongus</i> var. <i>praelongus</i>		stinking milkvetch	PerF	Wide	Pres	Unc	Nelson 9495 (CARE)	1971	
Leguminosae (Fabaceae)	<i>Astragalus sabulorum</i>		gravel milkvetch	AnnF	Wide	Pres	Unc	Fleming 645 (CARE)	1988	
Leguminosae (Fabaceae)	<i>Astragalus sesquiflorus</i>		sandstone milkvetch	PerF	RegEn	Pres	Unc	Porter 3796 (CARE)	1986	Type locality is "southern Utah" (near Kanab), Kane Co, UT (Bishop s.n. GH)
Leguminosae (Fabaceae)	<i>Astragalus tenellus</i>		pulse milkvetch	PerF	Wide	Pres	Unc	Meyer 4776 (CARE)	1981	

*Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.*

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Leguminosae (Fabaceae)	<i>Astragalus wardii</i>		Ward's milkvetch	PerF	RegEn	Rep	NA	Heil et al. (1993)	NA	Report from the CARE Herbarium based on specimen that may have been collected outside of the park. Type locality is Aquarius Plateau, Garfield Co, UT (Ward 424 GH)
Leguminosae (Fabaceae)	<i>Astragalus woodruffii</i>		Woodruff's milkvetch	PerF	LocEn	Pres	Rare	Heil 2737 (CARE)	1971	Type locality is San Rafael Swell, Emery Co, UT (Jones s.n. POM). USFWS: 3C
Leguminosae (Fabaceae)	<i>Astragalus zionis</i> var. <i>zionis</i>		Zion milkvetch	PerF	RegEn	Pres	Unc	Porter 2394 (BRY)	1986	Type locality is Springdale, Washington Co, UT (Jones 5259 POM)
Leguminosae (Fabaceae)	<i>Dalea flavescens</i> var. <i>flavescens</i>	<i>D. flavescens</i>	Kanab prairie-clover	PerF	RegEn	Pres	Unc	Meyer 4735 (CARE)	1981	Type locality is "Kanab" (but probably from farther east (Thompson s.n. GH)
Leguminosae (Fabaceae)	<i>Dalea oligophylla</i>	<i>Petalostemon candidum</i> , <i>P. occidentale</i> , <i>D. candida</i> var. <i>oligophylla</i>	white prairie-clover	PerF	Wide	Pres	Unc	Heil 2857 (CARE)	1986	
Leguminosae (Fabaceae)	<i>Gleditsia triacanthos</i>		honey locust	Tree	Intro	Pres	Unc	Swancara 22 (CARE)	1958	Native to E North America
Leguminosae (Fabaceae)	<i>Glycyrrhiza lepidota</i>	<i>G. lepidota</i> var. <i>lepidota</i>	Nuttall's licorice	PerF	Wide	Pres	Unc	Meyer 4657 (CARE)	1980	
Leguminosae (Fabaceae)	<i>Hedysarum boreale</i> var. <i>boreale</i>	Includes var. <i>pabulare</i>	northern sweetvetch	PerF	Wide	Pres	Unc	Harrison 898 (CARE)	1973	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Leguminosae (Fabaceae)	<i>Lathyrus brachycalyx</i> var. <i>zionis</i>		Zion sweetpea	PerF	RegEn	Pres	Unc	Fleming 585 (CARE)	1980	Type locality is 10 miles E of Zion NP, Kane Co, UT (Hitchcock 19013 isotype NY)
Leguminosae (Fabaceae)	<i>Lupinus argenteus</i> var. <i>argenteus</i>		silvery lupine	PerF	Wide	Pres	Unc	Harrison 1026	1973	
Leguminosae (Fabaceae)	<i>Lupinus argenteus</i> var. <i>rubricaulis</i>		subalpine lupine	PerF	Wide	Pres	Unc	Meyer 4772 (CARE)	1973	
Leguminosae (Fabaceae)	<i>Lupinus caudatus</i> var. <i>utahensis</i>	<i>L. caudatus</i> ssp. <i>caudatus</i> , <i>L. argenteus</i> var. <i>utahensis</i>	Utah lupine	PerF	Wide	Pres	Unc	Harrison 899 (CARE)	1973	
Leguminosae (Fabaceae)	<i>Lupinus pusillus</i> var. <i>intermontanus</i>		Great Basin lupine	AnnF	Wide	Pres	Com	Fleming 566 (CARE)	1988	
Leguminosae (Fabaceae)	<i>Lupinus pusillus</i> var. <i>pusillus</i>		dwarf lupine	AnnF	Wide	Pres	Com	Harrison 1015 (CARE)	1971	
Leguminosae (Fabaceae)	<i>Lupinus sericeus</i> var. <i>sericeus</i>	Vars. not recognized in Barneby (1989)	silky lupine	PerF	Wide	Pres	Unc	Heil 3544 (CARE)	1987	
Leguminosae (Fabaceae)	<i>Medicago lupulina</i>		black medick	AnnF	Intro	Pres	Unc	Porter 4092 (CARE)	1986	Native to Europe
Leguminosae (Fabaceae)	<i>Medicago sativa</i>	<i>M. sativa</i> var. <i>sativa</i>	alfalfa	PerF	Intro	Pres	Com	Harrison 4664 (CARE)	1974	Native to Europe
Leguminosae (Fabaceae)	<i>Melilotus alba</i>	<i>M. albus</i> . Included in <i>M. officinalis</i> by some authors	white sweet-clover	AnnF	Intro	Pres	Com	Swancara 24 (CARE)	1958	Native to Europe
Leguminosae (Fabaceae)	<i>Melilotus officinalis</i>		yellow sweet-clover	PerF	Intro	Pres	Com	Harrison 1457 (CARE)	1958	Native to Europe
Leguminosae (Fabaceae)	<i>Oxytropis borealis</i> var. <i>australis</i>	<i>O. viscida</i>	southern locoweed	PerF	RegEn	Pres	Unc	Porter 3863 (CARE)	1986	Type locality is E of Hogan Pass, Sevier Co, UT (Weish, Isely, & Moore 6452 BR)
Leguminosae (Fabaceae)	<i>Oxytropis deflexa</i> var. <i>sericea</i>		nodding locoweed	PerF	Wide	Pres	Rare	Heil 3570 (CARE)	1987	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Leguminosae (Fabaceae)	<i>Oxytropis lambertii</i> var. <i>bigelovii</i>	Includes var. <i>lambertii</i>	Lambert's locoweed	PerF	Wide	Pres	Unc	Nelson 9494 (CARE)	1971	
Leguminosae (Fabaceae)	<i>Oxytropis oreophila</i> var. <i>juniperina</i>		Bicknell locoweed	PerF	RegEn	Pres	Unc	Meyer 4750 (CARE)	1971	Type locality is 1 mile E of Bicknell, Wayne Co, UT (Weish & Moore 13828 BRY)
Leguminosae (Fabaceae)	<i>Peteria thompsoniae</i>		Thompson's peteria	PerF	RegEn	Pres	Rare	Porter 3772 (CARE)	1986	Type locality is Kanab, Kane Co, UT (Thompson s.n. GH)
Leguminosae (Fabaceae)	<i>Psoralidium juncea</i>		rush scurfpea	PerF	RegEn	Pres	Rare	Meyer 4719 (CARE)	1981	Type locality is Epsom Creek, San Juan Co, UT (Eastwood 21 CAS)
Leguminosae (Fabaceae)	<i>Psoralidium lanceolatum</i> var. <i>lanceolatum</i>	<i>Psoralea lanceolata</i> . Vars. not recognized in Barneby (1989)	lemon scurf-pea	PerF	Wide	Pres	Com	Barnes & Harper 3965 (CARE)	2004	
Leguminosae (Fabaceae)	<i>Psoralidium lanceolatum</i> var. <i>stenophyllum</i>	Vars. not recognized in Barneby (1989)	slenderleaf scurfpea	PerF	RegEn	Pres	Rare	Heil 3414 (CARE)	1973	Type locality is near Wilson Mesa, Grand Co, UT (Rydberg & Garrett 8367 NY)
Leguminosae (Fabaceae)	<i>Psorothamnus fremontii</i>		Fremont's indigo-bush	Shrub	Wide	Pres	Unc	Meyer 4725 (CARE)	1981	
Leguminosae (Fabaceae)	<i>Psorothamnus thompsoniae</i> var. <i>thompsoniae</i>		Thompson's indigo-bush	Shrub	LocEn	Rep	Rare	Northern Colorado Plateau Network (in ed.)	2004	Type locality in N AZ, near Kanab, or along the Colorado River in SE UT or AZ (Thompson s.n. US). USFWS: 3C
Leguminosae (Fabaceae)	<i>Robinia pseudoacacia</i>		black locust	Tree	Intro	Pres	Unc	Porter 4346 (CARE)	1986	Native to E North America
Leguminosae (Fabaceae)	<i>Thermopsis montana</i>	<i>T. pinetorum</i> , <i>T. rhombifolia</i> var. <i>montana</i> ; includes <i>T. rhombifolia</i> var. <i>ovata</i>	montane golden pea	PerF	Wide	Pres	Unc	Meyer 4446 (CARE)	1971	



**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Leguminosae (Fabaceae)	<i>Trifolium fragiferum</i>		strawberry clover	PerF	Intro	Pres	Rare	Fleming 671 (CARE)	1988	Native to Europe
Leguminosae (Fabaceae)	<i>Trifolium pratense</i>		red clover	PerF	Intro	Pres	Unc	Meyer 4687 (CARE)	1980	Native to Europe
Leguminosae (Fabaceae)	<i>Trifolium repens</i>		white clover	PerF	Intro	Pres	Unc	Meyer 4679 (CARE)	1980	Native to Europe
Leguminosae (Fabaceae)	<i>Vicia americana</i> var. <i>americana</i>		American vetch	PerF	Wide	Pres	Unc	Meyer 4771 (CARE)	1980	
Leguminosae (Fabaceae)	<i>Wisteria sinensis</i>		Chinese wisteria	PerF	Intro	Pres	Unc	Porter 4217 (CARE)	1986	Native to China
Lentibulariaceae	<i>Utricularia vulgaris</i>	<i>U. macrorhiza</i>	common bladderwort	PerF	Wide	Pres	Com	Porter 5361 (CARE)	1988	
Liliaceae (Alliaceae)	<i>Allium cernuum</i>	Includes vars. <i>cernuum</i> & <i>obtusum</i>	nodding onion	PerF	Wide	Pres	Unc	Fleming 152 (CARE)	1986	
Liliaceae (Alliaceae)	<i>Allium</i> <i>macropetalum</i>		San Juan onion	PerF	Wide	Pres	Unc	Porter 2366 (CARE)	1971	
Liliaceae (Alliaceae)	<i>Allium nevadense</i>	Includes <i>A. atrorubens</i> var. <i>cristatum</i> in Welsh et al. (2003)	Nevada onion	PerF	Wide	Pres	Rare	Harrison 876 (CARE)	1973	
Liliaceae (Themidaceae)	<i>Androstephium breviflorum</i>	<i>Brodiaea paysonii</i>	pink funnel-lily	PerF	Wide	Pres	Unc	Meyer 4549 (CARE)	1980	Type locality is near Kanab, Kane Co, UT (Thompson s.n.)
Liliaceae (Asparagaceae)	<i>Asparagus officinalis</i>		asparagus	PerF	Intro	Pres	Unc	Swancara 39 (CARE)	1958	Native to Eurasia
Liliaceae (Calochortaceae)	<i>Calochortus aureus</i>		golden mariposa	PerF	RegEn	Pres	Unc	Harrison 873 (CARE)	1973	Type locality is near Kanab, Kane Co, UT (Thompson s.n. US)
Liliaceae (Calochortaceae)	<i>Calochortus nuttallii</i>		sego-lily	PerF	Wide	Pres	Unc	Taylor s.n. (CARE)	1968	State flower of Utah
Liliaceae (Anthericaceae)	<i>Eremocrinum albomarginatum</i>		sand lily	PerF	RegEn	Pres	Rare	Porter 4673 (BRY)	1987	Type locality is near Green River, Emery Co, UT (Jones s.n. POM)
Liliaceae	<i>Fritillaria atropurpurea</i>		leopard-lily	PerF	Wide	Pres	Rare	Heil 4426 (CARE)	1988	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Liliaceae (Convallariaceae or Ruscaceae)	<i>Smilacina stellata</i>	<i>Maianthemum stellatum</i>	starry false Solomon's-seal	PerF	Wide	Pres	Unc	Meyer 4454 (CARE)	1980	
Liliaceae (Melanthiaceae)	<i>Zigadenus elegans</i>	<i>Anticlea elegans</i>	mountain death camas	PerF	Wide	Pres	Unc	Heil 3550 (CARE)	1987	
Linaceae	<i>Linum aristatum</i>	<i>Mesynium aristatum</i>	broomflax	AnnF	Wide	Pres	Unc	Meyer 4612 (CARE)	1970	
Linaceae	<i>Linum perenne</i> <i>ssp. lewisii</i>	<i>L. lewisii</i> var. <i>lewisii</i> , <i>Adenolinum lewisii</i>	blue flax	PerF	Wide	Pres	Unc	Heil 3102 (BRY)	1987	
Linaceae	<i>Linum puberulum</i>	<i>Mesynium puberulum</i>	downy flax	AnnF	Wide	Pres	Unc	Porter 3783 (CARE)	1986	
Loasaceae	<i>Mentzelia albicaulis</i>	<i>Acrolasia albicaulis</i> , <i>A. gracilis</i> , <i>M. obscura</i>	white-stem blazingstar	AnnF	Wide	Pres	Abun	Nelson 9487 (CARE)	1971	
Loasaceae	<i>Mentzelia marginata</i>	<i>M. marginata</i> var. <i>marginata</i> , <i>M. cronquistii</i> . Includes var. <i>cronquistii</i> in Welsh et al. 2003	Colorado stickleaf	PerF	RegEn	Pres	Unc	Porter 4443 (CARE)	1986	Type locality is 10 miles E of Hite, San Juan Co, UT (Cronquist 9030 NY)
Loasaceae	<i>Mentzelia multiflora</i>	<i>M. multiflora</i> var. <i>multiflora</i> , <i>Nuttallia multiflora</i>	desert stickleaf	PerF	Wide	Pres	Unc	Heil 2860 (BRY)	1986	
Loasaceae	<i>Mentzelia pterosperma</i>	<i>Nuttallia pterosperma</i>	wing-seed stickleaf	PerF	Wide	Pres	Unc	Meyer 4504 (CARE)	1980	Type locality is Willow Creek, San Juan Co, UT (Eastwood 31 CAS)
Malvaceae	<i>Hibiscus syriacus</i>		rose-of-sharon	Shrub	Intro	Pres	Unc	Porter 4213 (CARE)	1986	Native to Asia
Malvaceae	<i>Malva neglecta</i>		common mallow	AnnF	Intro	Pres	Unc	Meyer 4686 (CARE)	1980	Native to Eurasia
Malvaceae	<i>Sphaeralcea coccinea</i>	Includes ssp. <i>coccinea</i> , <i>elata</i> , & <i>dissecta</i>	scarlet globemallow	PerF	Wide	Pres	Abun	Harrison 835 (CARE)	1971	
Malvaceae	<i>Sphaeralcea grossulariifolia</i>	<i>S. grossulariifolia</i> var. <i>grossulariifolia</i>	gooseberry-leaf globemallow	PerF	Wide	Pres	Unc	Heil 4385 (CARE)	1986	
Malvaceae	<i>Sphaeralcea parvifolia</i>		small-leaf globemallow	PerF	Wide	Pres	Abun	Harrison 1124 (CARE)	1971	

Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Monotropaceae (Ericaceae)	<i>Pterospora andromedea</i>		woodland pinedrops	PerF	Wide	Pres	Unc	Heil 2599 (CARE)	1986	
Moraceae	<i>Maclura pomifera</i>		Osage orange	Tree	Intro	Pres	Unc	Fleming 514 (CARE)	1987	Native to E North America
Moraceae	<i>Morus alba</i>		white mulberry	Tree	Intro	Pres	Unc	Harrison 1404 (CARE)	1974	Native to China
Nyctaginaceae	<i>Abronia fragrans</i>	<i>A. elliptica</i> , <i>A. fragrans</i> var. <i>elliptica</i> , <i>A. nana</i> var. <i>harrisii</i>	fragrant sand-verbena	PerF	Wide	Pres	Abun	Harrison 1286 (CARE)	1971	
Nyctaginaceae	<i>Abronia nana</i>	<i>A. nana</i> var. <i>nana</i>	low sand-verbena	PerF	RegEn	Pres	Unc	Porter 3512 (CARE)	1986	Type locality is near Beaver City, Beaver Co, UT (Palmer 404)
Nyctaginaceae	<i>Allionia incarnata</i>	<i>A. incarnata</i> var. <i>incarnata</i>	trailing four-o'clock	PerF	Wide	Pres	Unc	Camp 358 (CARE)	1977	
Nyctaginaceae	<i>Mirabilis linearis</i> var. <i>decipiens</i>	<i>M. decipiens</i>	New Mexico umbrellawort	PerF	Sparse	Pres	Rare	Heil 3529 (CARE)	1987	
Nyctaginaceae	<i>Mirabilis linearis</i> var. <i>linearis</i>	<i>Oxybaphus linearis</i> , <i>O. decumbens</i>	narrowleaf four-o'clock	PerF	Wide	Pres	Abun	Heil 3365 (CARE)	1987	
Nyctaginaceae	<i>Mirabilis multiflora</i>	Includes vars. <i>multiflora</i> , <i>pubescens</i> , & <i>glandulosa</i>	showy four-o'clock	PerF	Wide	Pres	Abun	Harrison 913 (CARE)	1958	
Nyctaginaceae	<i>Mirabilis oxybaphoides</i>		spreading four-o'clock	PerF	Wide	Pres	Unc	Camp 439 (CARE)	1970	
Nyctaginaceae	<i>Tripterocalyx micranthus</i>	<i>Abronia micrantha</i> , <i>T. pedunculatus</i>	small-flower sandpuffs	AnnF	Wide	Pres	Unc	Harrison 1169 (CARE)	1973	
Oleaceae	<i>Fraxinus americana</i>		white ash	Tree	Intro	Pres	Unc	Porter 4229 (CARE)	1986	Native to E North America
Oleaceae	<i>Fraxinus anomala</i>		singleleaf ash	Shrub	Wide	Pres	Abun	Harrison 1184 (CARE)	1958	Type locality is Labyrinth Canyon, San Juan Co, UT (Newberry s.n. NY)
Oleaceae	<i>Fraxinus pennsylvanica</i>	<i>Fraxinus pennsylvanica</i> var. <i>lanceolata</i>	green ash	Tree	Intro	Pres	Unc	Porter 4351 (CARE)	1986	Native to E North America

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Oleaceae	<i>Syringa vulgaris</i>		common lilac	Shrub	Intro	Pres	Unc	Porter 4353 (CARE)	1986	Native to Europe
Onagraceae	<i>Calylophus lavandulifolius</i>	<i>C. hartwegii</i> ssp. <i>lavandulifolius</i>	lavender-leaf sundrops	PerF	Wide	Pres	Unc	Heil 3122 (CARE)	1971	
Onagraceae	<i>Camissonia eastwoodiae</i>		Eastwood's camissonia	AnnF	RegEn	Pres	Unc	Meyer 4710 (CARE)	1981	
Onagraceae	<i>Camissonia scapoidea</i> var. <i>scapoidea</i>	<i>Oenothera scapoidea</i> . Includes ssp. <i>brachycarpa</i>	Paiute suncup	AnnF	Wide	Pres	Abun	Harrison s.n. (CARE)	1973	
Onagraceae	<i>Camissonia walkeri</i>		Walker's camissonia	AnnF	Wide	Pres	Unc	Porter 3493 (CARE)	1986	Type locality is Paradox Valley, Montrose Co, CO
Onagraceae	<i>Epilobium angustifolium</i> var. <i>canescens</i>	<i>Chamerion angustifolium</i> var. <i>canescens</i> , <i>C. angustifolium</i> ssp. <i>circumvagum</i> , <i>C. danielsii</i>	fireweed	PerF	Wide	Rep	NA	Heil et al. (1993)	NA	Reports from CARE Herbarium based on collections from outside the park.
Onagraceae	<i>Epilobium ciliatum</i>	<i>E. ciliatum</i> var. <i>ciliatum</i> , <i>E. watsonii</i> , <i>E. adenocaulon</i>	northern willow-herb	PerF	Wide	Pres	Unc	Meyer 4618 (CARE)	1980	
Onagraceae	<i>Epilobium hornemannii</i> var. <i>hornemannii</i>	<i>E. hornemannii</i>	Hornemann's willow-herb	PerF	Wide	Pres	Unc	Heil 3494 (CARE)	1987	
Onagraceae	<i>Gaura parviflora</i>	<i>G. mollis</i>	small-flowered gaura	AnnF	Wide	Pres	Unc	Fleming 86 (CARE)	1986	
Onagraceae	<i>Gayophytum ramosissimum</i>		branching groundsmoke	AnnF	Wide	Pres	Unc	Meyer 4768 (CARE)	1981	
Onagraceae	<i>Oenothera albicaulis</i>		white-stem evening-primrose	AnnF	Wide	Pres	Unc	Harrison 966 (CARE)	1973	
Onagraceae	<i>Oenothera caespitosa</i> var. <i>marginata</i>	<i>O. caespitosa</i> var. <i>marginata</i>	long-tube evening-primrose	PerF	Wide	Pres	Abun	Camp 539 (CARE)	1978	
Onagraceae	<i>Oenothera caespitosa</i> var. <i>navajoensis</i>		Paria evening-primrose	PerF	RegEn	Pres	Unc	Harrison 1061 (CARE)	1971	Type locality is Paria River, Kane Co, UT (Cronquist 10202 MO)

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Onagraceae	<i>Oenothera coronopifolia</i>		hairy-throat evening-primrose	PerF	Wide	Pres	Rare	Heil 3534 (CARE)	1987	
Onagraceae	<i>Oenothera elata</i>	<i>O. elata</i> ssp. <i>hirsutissima</i> , <i>O. hookeri</i>	western evening-primrose	PerF	Wide	Rep	Unc	Heil et al. (1993), Northern Colorado Plateau Network (in ed.)	2004	Reports from CARE Herbarium based on collections from outside the park or misidentified specimens of <i>O. longissima</i> .
Onagraceae	<i>Oenothera howardii</i>	<i>O. brachycarpa</i>	bronze evening-primrose	PerF	Wide	Pres	Rare	Heil 3144 (CARE)	1980	Type locality is Dugway, Tooele Co, UT (Jones s.n. RM)
Onagraceae	<i>Oenothera longissima</i>		Bridges evening-primrose	PerF	RegEn	Pres	Rare	Swancara 38 (CARE)	1958	Type locality is Armstrong & White canyons (Natural Bridges NM), San Juan Co, UT (Rydberg & Garrett 9410 NY)
Onagraceae	<i>Oenothera pallida</i> var. <i>pallida</i>	Includes var. <i>runcinata</i>	pale evening-primrose	PerF	Wide	Pres	Abun	Harrison 930 (CARE)	1958	
Orchidaceae	<i>Corallorhiza maculata</i>	<i>C. maculata</i> var. <i>maculata</i>	spotted coral-root	PerF	Wide	Rep	Rare	Heil et al. (1993), Northern Colorado Plateau Network (in ed.)	2004	Reports from CARE Herbarium based on collections from outside the park.
Orchidaceae	<i>Epipactis gigantea</i>		giant helleborine	PerF	Wide	Pres	Unc	Meyer 4609 (CARE)	1980	
Orchidaceae	<i>Habenaria hyperborea</i>	<i>Limnorchis hyperborea</i> , Includes <i>Platanthera aquilonis</i> , <i>P. huronensis</i>	northern bog orchid	PerF	Wide	Pres	Unc	Porter 4056 (CARE)	1986	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Orchidaceae	<i>Habenaria sparsiflora</i> var. <i>sparsiflora</i>	<i>Platanthera sparsiflora</i> . Vars. not recognized in <i>Flora of North America</i> (2002)	slender bog orchid	PerF	Wide	Pres	Rare	Heil 3549 (CARE)	1987	
Orchidaceae	<i>Habenaria zothecina</i>	<i>Platanthera zothecina</i> , <i>Limnorchis zothecina</i>	alcove bog-orchid	PerF	RegEn	Pres	Rare	Heil 3586 (CARE)	1987	Type locality is ca 1 mile N of Moab, Grand Co, UT (Welsh & Higgins 23269 BRY). UT BLM: Sensitive, USFWS: former C2 candidate
Orchidaceae	<i>Spiranthes romanzoffiana</i> var. <i>diluvialis</i>	<i>S. diluvialis</i>	Ute ladies'-tresses	PerF	Sparse	Ext	NA	Porter 4112 (CARE)	1977	Reported by Northern Colorado Plateau Network (in ed.). USFWS: Threatened
Orobanchaceae	<i>Orobanche fasciculata</i>	<i>Aphyllon fasciculatum</i>	clustered broomrape	PerF	Wide	Pres	Unc	Porter 3777 (CARE)	1986	
Orobanchaceae	<i>Orobanche ludoviciana</i> var. <i>cooperi</i>	Includes <i>O. multiflora</i> from UT Flora (1993), <i>O. cooperi</i>	Cooper's broomrape	PerF	Wide	Pres	Unc	Meyer 4632 (CARE)	1980	
Papaveraceae	<i>Argemone munita</i> var. <i>rotundata</i>		armed prickly-poppy	PerF	Wide	Rep	NA	Meyer (1982)	NA	Specimen has not been relocated
Pinaceae	<i>Picea engelmannii</i>		Engelmann spruce	Tree	Wide	Pres	Unc	Porter 3891 (CARE)	1986	
Pinaceae	<i>Picea pungens</i>		blue spruce	Tree	Wide	Pres	Unc	Porter 3942 (CARE)	1986	State tree of Utah and Colorado
Pinaceae	<i>Pinus edulis</i>		two-needle pinyon	Tree	Wide	Pres	Abun	Harrison 801 (CARE)	1973	
Pinaceae	<i>Pinus flexilis</i>		limber pine	Tree	Wide	Rep	NA	NAU Herbarium	NA	Specimen has not been relocated
Pinaceae	<i>Pinus longaeva</i>	<i>P. aristata</i>	western bristlecone pine	Tree	Wide	Pres	Unc	Porter 4143 (CARE)	1986	
Pinaceae	<i>Pinus ponderosa</i> var. <i>scopulorum</i>		ponderosa pine	Tree	Wide	Pres	Com	Fleming BC322 (CARE)	1987	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Pinaceae	<i>Pseudotsuga menziesii</i> var. <i>glauca</i>		Douglas-fir	Tree	Wide	Pres	Unc	Fleming BC323 (CARE)	1987	
Plantaginaceae	<i>Plantago lanceolata</i>		English plantain	PerF	Intro	Pres	Unc	Porter 4222 (CARE)	1986	Native to Eurasia
Plantaginaceae	<i>Plantago major</i>	Includes "native" var. <i>pachyphylla</i>	common plantain	PerF	Intro	Pres	Unc	Meyer 4668 (CARE)	1980	Mostly native to Europe. Type locality of the native phase var. <i>pachyphylla</i> is Salt Lake City, Salt Lake Co, UT (Jones 1030 POM)
Plantaginaceae	<i>Plantago patagonica</i>	Includes vars. <i>patagonica</i> , <i>gnaphaloides</i> , <i>spinulosa</i> , and <i>breviscapa</i>	woolly plantain	AnnF	Wide	Pres	Com	Harrison 1065 (CARE)	1973	
Polemoniaceae	<i>Eriastrum sparsiflorum</i>	<i>E. sparsiflorum</i> var. <i>wilcoxii</i> , <i>E. wilcoxii</i>	few-flower eriastrum	AnnF	Wide	Pres	Rare	Porter 2410 (CARE)	1986	
Polemoniaceae	<i>Gilia caespitosa</i>	<i>Aliciella caespitosa</i>	Rabbit Valley gilia	PerF	LocEn	Pres	Rare	Heil 2552 (CARE)	1986	Type locality is Rabbit Valley, Wayne Co, UT (Ward 575 US). USFS Region 4: Sensitive, USFWS: former Category 1 Candidate
Polemoniaceae	<i>Gilia imperialis</i>	<i>G. latifolia</i> var. <i>imperialis</i> , <i>Aliciella latifolia</i> ssp. <i>imperialis</i>	cataract gilia	AnnF	LocEn	Pres	Rare	Heil 2749 (CARE)	1986	Type locality is Cataract Canyon N of Imperial Canyon, San Juan Co, UT (Welsh 22507 BRY). UT BLM: Sensitive
Polemoniaceae	<i>Gilia inconspicua</i>	Includes vars. <i>inconspicua</i> & <i>sinuata</i> , <i>G. ophthalmoidea</i> , <i>G. sinuata</i> , <i>G. clokeyi</i> , <i>G. transmontana</i>	shy gilia	AnnF	Wide	Pres	Abun	Meyer 4493 (CARE)	1980	



**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Polemoniaceae	<i>Gilia leptomeria</i> var. <i>leptomeria</i>	<i>Aliciella leptomeria</i>	common gilia	AnnF	Wide	Pres	Abun	Harrison 987 (CARE)	1973	
Polemoniaceae	<i>Gilia leptomeria</i> var. <i>micromeria</i>	<i>G. micromeria</i> , <i>Aliciella micromeria</i>	common gilia	AnnF	Wide	Pres	Rare	Fertig & Lesica 21814 (CARE)	2005	
Polemoniaceae	<i>Gilia subnuda</i>	<i>Aliciella subnuda</i>	carmine gilia	PerF	RegEn	Pres	Abun	Nelson 9182 (CARE)	1970	
Polemoniaceae	<i>Gilia tenuis</i>	<i>Aliciella tenuis</i>	Mussentuchit gilia	PerF	LocEn	Pres	Rare	Clark & Clark s.n. (CARE)	1995	Type locality is head of Mussentuchit Creek, Sevier Co, UT (Neese, Smith, & Shaw 18025 BRY). UT BLM: Sensitive, USFWS: former C2 candidate
Polemoniaceae	<i>Ipomopsis aggregata</i> var. <i>aggregata</i>	<i>Gilia aggregata</i> var. <i>aggregata</i>	scarlet gilia	PerF	Wide	Pres	Abun	Taylor s.n. (CARE)	1968	
Polemoniaceae	<i>Ipomopsis congesta</i> var. <i>frutescens</i>	<i>Gilia congesta</i> var. <i>frutescens</i>	shrubby gilia	PerF	RegEn	Pres	Unc	Meyer 4594 (CARE)	1980	Type locality is Springdale, Washington Co, UT (Jones 5247 NY)
Polemoniaceae	<i>Ipomopsis gunnisonii</i>	<i>Gilia gunnisonii</i>	Gunnison's gilia	AnnF	RegEn	Pres	Unc	Meyer 4729 (CARE)	1981	Type locality is "sand banks of the Green River", UT (Cruetzfeldt s.n. NY)
Polemoniaceae	<i>Ipomopsis longiflora</i>	<i>Gilia longiflora</i>	long-flowered gilia	PerF	Wide	Pres	Unc	Lichthardt 501 (CARE)	1971	
Polemoniaceae	<i>Ipomopsis polycladon</i>	<i>Gilia polycladon</i>	spreading gilia	AnnF	Wide	Pres	Unc	Meyer 4478 (CARE)	1980	
Polemoniaceae	<i>Ipomopsis pumila</i>	<i>Gilia pumila</i>	dwarf gilia	AnnF	Wide	Pres	Unc	Meyer 4565 (CARE)	1980	
Polemoniaceae	<i>Ipomopsis roseata</i>	<i>Gilia roseata</i>	San Rafael gilia	PerF	RegEn	Pres	Unc	Meyer 4491 (CARE)	1980	
Polemoniaceae	<i>Leptodactylon caespitosum</i>	<i>Linanthus caespitosus</i>	matted prickly-phlox	PerF	Sparse	Pres	Rare	Porter 3947 (CARE)	1986	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Polemoniaceae	<i>Leptodactylon pungens</i>	<i>Leptodactylon pungens</i> var. <i>pungens</i> , <i>Linanthus pungens</i>	prickly-phlox	Shrub	Wide	Pres	Unc	Meyer 4546 (CARE)	1980	
Polemoniaceae	<i>Leptodactylon watsonii</i>	<i>Linanthus watsonii</i>	Watson's prickly-phlox	PerF	Wide	Pres	Rare	Heil 3425 (CARE)	1987	Type locality is Cottonwood Canyon, Salt Lake Co, UT (Watson s.n. GH)
Polemoniaceae	<i>Phlox austromontana</i> var. <i>austromontana</i>	Var. not recognized in Cronquist et al. (1984)	desert phlox	PerF	Wide	Pres	Unc	Meyer 4433 (CARE)	1970	Type locality is Beaver Dam Mtns, Washington Co, UT (Fremont 447 US)
Polemoniaceae	<i>Phlox hoodii</i> var. <i>canescens</i>	Includes ssp. <i>glabrata</i> , <i>hoodii</i> , & <i>viscidula</i>	carpet phlox	PerF	Wide	Pres	Unc	Porter 4662 (CARE)	1987	
Polemoniaceae	<i>Phlox longifolia</i>	Includes vars. <i>longifolia</i> & <i>stansburyi</i>	long-leaf phlox	PerF	Wide	Pres	Unc	Meyer 4503 (CARE)	1971	
Polemoniaceae	<i>Phlox pulvinata</i>	<i>P. sibirica</i> sp. <i>pulvinata</i> , <i>P. caespitosa</i>	cushion phlox	PerF	Wide	Rep	Rare	Northern Colorado Plateau Network (in ed.)	2004	
Polygalaceae	<i>Polygala subspinosa</i>	<i>P. subspinosa</i> var. <i>subspinosa</i>	cushion milkwort	PerF	Wide	Pres	Unc	Harrison 875 (CARE)	1968	
Polygonaceae	<i>Eriogonum alatum</i>	<i>E. alatum</i> var. <i>alatum</i> , <i>Pterogonum alatum</i>	winged wild buckwheat	PerF	Wide	Pres	Abun	Porter 3948 (CARE)	1986	
Polygonaceae	<i>Eriogonum bicolor</i>		pretty wild buckwheat	PerF	RegEn	Pres	Unc	Camp 554 (CARE)	1973	Type locality is Thompson's Springs, Grand Co, UT (Jones s.n. POM)
Polygonaceae	<i>Eriogonum cernuum</i> var. <i>cernuum</i>	Vars. not recognized in <i>Flora of North America</i> (2005)	nodding wild buckwheat	AnnF	Wide	Pres	Abun	Harrison 1183 (CARE)	1973	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Polygonaceae	<i>Eriogonum corymbosum</i> var. <i>aureum</i>	Includes var. <i>glutinatum</i> in Welsh et al. 2003	golden wild buckwheat	Shrub	RegEn	Pres	Rare	Harrison 1300 (CARE)	1970	Type locality is St. George, Washington Co, UT (Jones 6091 POM). Considered a local endemic restricted to the Shivwits area of Washington Co in <i>Flora of North America</i> (2005).
Polygonaceae	<i>Eriogonum corymbosum</i> var. <i>corymbosum</i>	Includes var. <i>velutinum</i> and <i>E. lancifolium</i> in Welsh et al. 2003	crisp-leaf wild buckwheat	Shrub	Wide	Pres	Abun	Harrison 1323 (CARE)	1970	
Polygonaceae	<i>Eriogonum corymbosum</i> var. <i>heilii</i>		Heil's wild buckwheat	Shrub	LocEn	Pres	Rare	Clark & Groebner 3 (NY)	1988	CARE material previously documented as <i>E. corymbosum</i> var. <i>revealianum</i> . Type locality is Thousand Lake Mtn., head of Red Canyon, Wayne Co, UT (Reveal 8543 NY)
Polygonaceae	<i>Eriogonum corymbosum</i> var. <i>orbiculatum</i>		rimrock wild buckwheat	Shrub	RegEn	Pres	Unc	Fleming 184 (BRY)	1986	Type locality is Green River, Emery Co, UT (Jones s.n. POM)
Polygonaceae	<i>Eriogonum deflexum</i>	<i>E. deflexum</i> var. <i>deflexum</i>	skeletonweed wild buckwheat	AnnF	Wide	Pres	Unc	Fleming 163 (CARE)	1986	
Polygonaceae	<i>Eriogonum flexum</i>	<i>Stenogonum flexum</i>	bent wild buckwheat	AnnF	RegEn	Pres	Com	Porter 3737 (CARE)	1986	
Polygonaceae	<i>Eriogonum gordonii</i>		Gordon's wild buckwheat	AnnF	Wide	Pres	Unc	Porter 3926 (CARE)	1986	
Polygonaceae	<i>Eriogonum hookeri</i>		Hooker's wild buckwheat	AnnF	Wide	Pres	Com	Harrison 1104 (CARE)	1958	Type locality is American Fork Canyon, Utah Co., Utah (Watson 1033 US)

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Polygonaceae	<i>Eriogonum inflatum</i> var. <i>fusiforme</i>	<i>E. fusiforme</i>	Grand Valley desert trumpet	AnnF	RegEn	Pres	Unc	Harrison 919 (BRY)	1968	Previous reports of <i>E. inflatum</i> var. <i>inflatum</i> may belong here.
Polygonaceae	<i>Eriogonum inflatum</i> var. <i>inflatum</i>	<i>E. inflatum</i>	desert trumpet	PerF	Wide	Pres	Unc	Harrison 919 (CARE)	1973	
Polygonaceae	<i>Eriogonum leptocladdon</i> var. <i>leptocladdon</i>		sand wild buckwheat	Shrub	RegEn	Pres	Unc	Heil 2855 (CARE)	1986	Type locality is Green River, Emery Co, UT (Cruzeffeldt s.n. NY)
Polygonaceae	<i>Eriogonum leptocladdon</i> var. <i>ramosissimum</i>		San Juan wild buckwheat	Shrub	RegEn	Pres	Abun	Heil 2854 (CARE)	1977	Type locality is near Butler Wash, San Juan Co, UT (Eastwood 134 CAS)
Polygonaceae	<i>Eriogonum leptophyllum</i>		slenderleaf wild buckwheat	Shrub	RegEn	Pres	Unc	Fleming 199 (San Juan College)	1986	
Polygonaceae	<i>Eriogonum microthecum</i> var. <i>simpsonii</i>	<i>E. microthecum</i> var. <i>foliosum</i> . Welsh et al. (2003) include <i>E. phoeniceum</i>	slender wild buckwheat	PerF	Wide	Pres	Abun	Harrison 1304 (CARE)	1970	
Polygonaceae	<i>Eriogonum ovalifolium</i>	<i>E. ovalifolium</i> var. <i>ovalifolium</i>	cushion wild buckwheat	PerF	Wide	Pres	Unc	Harrison 1227 (CARE)	1973	
Polygonaceae	<i>Eriogonum palmerianum</i>		Palmer's wild buckwheat	AnnF	Wide	Pres	Rare	Camp 5317 (CARE)	1978	
Polygonaceae	<i>Eriogonum racemosum</i> var. <i>racemosum</i>	<i>E. racemosum</i>	redroot wild buckwheat	PerF	Wide	Pres	Unc	Fleming 107 (CARE)	1986	
Polygonaceae	<i>Eriogonum shockleyi</i>	Includes vars. <i>longilobum</i> & <i>shockleyi</i>	Shockley's wild buckwheat	PerF	Wide	Pres	Unc	Harrison 883 (CARE)	1973	Type locality of var. <i>longilobum</i> is near Price, Carbon Co, UT (Jones 5590j POM)

Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Polygonaceae	<i>Eriogonum tumulosum</i>		Woodside wild buckwheat	PerF	RegEn	Pres	Rare	Fleming 6398 (CARE)	1988	Type locality is Red Plateau SW of Woodside, Emery Co, UT (Ripley & Barneby 8678 CAS). USFWS: 3C
Polygonaceae	<i>Eriogonum umbellatum</i> var. <i>subaridum</i>		arid wild buckwheat	PerF	Wide	Pres	Unc	Fleming 146 (CARE)	1986	
Polygonaceae	<i>Eriogonum wetherillii</i>		Wetherill's wild buckwheat	AnnF	RegEn	Pres	Unc	Fleming 189 (CARE)	1986	Type locality is along the San Juan River, San Juan Co, UT (Eastwood 124 CAS)
Polygonaceae	<i>Polygonum aviculare</i>	<i>P. arenastrum</i> , <i>P. aviculare</i> sp. <i>aviculare</i>	yard knotweed	AnnF	Intro	Pres	Unc	Meyer 4646 (CARE)	1980	Native to Eurasia
Polygonaceae	<i>Polygonum douglasii</i> var. <i>johnstonii</i>	<i>P. sawatchense</i> var. <i>sawatchense</i>	Sawatch knotweed	AnnF	Wide	Pres	Unc	Porter 5166 (CARE)	1987	
Polygonaceae	<i>Polygonum lapathifolium</i>	<i>Persicaria lapathifolia</i>	willow-weed	AnnF	Intro	Pres	Unc	Meyer 4624 (CARE)	1980	Native to Eurasia
Polygonaceae	<i>Rumex crispus</i>		curly dock	PerF	Intro	Pres	Com	Meyer 4571 (CARE)	1980	Native to Eurasia
Polygonaceae	<i>Rumex hymenosepalus</i>		canaigre dock	PerF	Wide	Pres	Unc	Porter 3532 (CARE)	1986	
Polygonaceae	<i>Rumex maritimus</i> var. <i>fueginus</i>	<i>R. fueginus</i>	golden dock	AnnF	Wide	Pres	Unc	Porter 4113 (CARE)	1986	
Polygonaceae	<i>Rumex salicifolius</i> ssp. <i>triangulivalvis</i>	<i>R. mexicanus</i> , <i>R. salicifolius</i> var. <i>mexicanus</i> , <i>R. utahensis</i> , <i>R. triangulivalvis</i> var. <i>mexicanus</i> , <i>Rumex triangulivalvis</i> var. <i>montigenitus</i>	willow dock	PerF	Wide	Pres	Unc	Meyer 4623 (CARE)	1980	
Polypodiaceae (Adiantaceae)	<i>Adiantum capillus-veneris</i>		southern maidenhair fern	Fern	Wide	Pres	Unc	Fleming 228 (BRY)	1987	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Polypodiaceae (Adiantaceae)	<i>Cheilanthes feei</i>		slender lip-fern	Fern	Wide	Pres	Unc	Nelson 9190 (CARE)	1970	
Polypodiaceae (Aspleniaceae)	<i>Cystopteris fragilis</i>	Includes <i>C. utahensis</i> , <i>C. reevesiana</i> , & <i>C. tenuis</i>	brittle bladder fern	Fern	Wide	Pres	Rare	Heil 3568 (CARE)	1987	Type locality of <i>C. utahensis</i> is Negro Bill Canyon, Grand Co, UT (Windham & Windham 90-282)
Polypodiaceae (Aspleniaceae)	<i>Dryopteris filix-mas</i>		male fern	Fern	Wide	Pres	Rare	Spence & Mason 4137 (CARE)	1990	
Polypodiaceae (Adiantaceae, Sinopteridaceae)	<i>Pellaea limitanea</i>	<i>Argyroschisma limitanea</i> ssp. <i>limitanea</i> , <i>Notholanea limitanea</i>	border cloak-fern	Fern	Periph	Pres	Rare	Fleming 181 (CARE)	1986	
Polypodiaceae (Aspleniaceae, Woodsiaceae)	<i>Woodsia oregana</i>	<i>W. oregana</i> ssp. <i>oregana</i>	Oregon woodsia	Fern	Periph	Pres	Unc	Porter 4180 (CARE)	1986	
Portulacaceae	<i>Portulaca oleracea</i>		common purslane	AnnF	Intro	Pres	Unc	Meyer 4647 (CARE)	1980	Native to E North America
Portulacaceae	<i>Talinum brevifolium</i>	<i>Pheimeranthus brevifolius</i>	sausageleaf talinum	PerF	Wide	Pres	Rare	Harrison 1335 (CARE)	1974	
Potamogetonaceae	<i>Potamogeton filiformis</i> var. <i>occidentalis</i>	<i>Stuckenia filiformis</i> var. <i>occidentalis</i>	slenderleaf pondweed	PerF	Wide	Pres	Unc	Heil 3490 (CARE)	1980	
Primulaceae	<i>Androsace septentrionalis</i>	Includes ssp. <i>puberulenta</i> , <i>subumbellata</i> , & var. <i>subulifera</i>	pygmy-flower rock-jasmine	AnnF	Wide	Pres	Unc	Meyer 4775 (CARE)	1981	
Primulaceae (Myrsinaceae)	<i>Glaux maritima</i>		sea-milkwort	PerF	Wide	Pres	Unc	Welsh & Neese 23451a (BRY)	1939	
Primulaceae	<i>Primula specuicola</i>		cave primrose	PerF	RegEn	Pres	Rare	Camp s.n. (CARE)	1977	Type locality is along San Juan River near Bluff, San Juan Co, UT (Rydberg 9882 NY). USFWS: 3C

*Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.*

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Ranunculaceae (Helleboraceae)	<i>Aconitum columbianum</i> var. <i>columbianum</i>	Includes var. <i>ochroleucum</i>	Columbian monkshood	PerF	Wide	Rep	NA	Heil et al. (1993)	NA	Reports from CARE Herbarium based on collections from outside the park.
Ranunculaceae (Helleboraceae)	<i>Actaea rubra</i>	<i>A. rubra</i> ssp. <i>arguta</i>	red baneberry	PerF	Wide	Rep	Unc	Northern Colorado Plateau Network (in ed.)	2004	
Ranunculaceae (Helleboraceae)	<i>Aquilegia corulea</i>	<i>A. caerulea</i> , includes vars. <i>ochroleuca</i> & <i>pinetorum</i>	Colorado columbine	PerF	Wide	Pres	Unc	Heil 3561 (CARE)	1986	
Ranunculaceae (Helleboraceae)	<i>Aquilegia micrantha</i>		alcove columbine	PerF	RegEn	Pres	Rare	Porter 4679 (BRY)	1987	Type locality is Bluff, San Juan Co, UT (Wetherill s.n. CAS)
Ranunculaceae	<i>Clematis columbiana</i>	<i>C. columbiana</i> var. <i>columbiana</i> , <i>C. pseudoalpina</i> , <i>Atragene columbiana</i>	Columbian virgin's-bower	PerF	Wide	Pres	Unc	Meyer 4757 (CARE)	1981	
Ranunculaceae	<i>Clematis ligusticifolia</i>		white virgin's-bower	PerF	Wide	Pres	Unc	Swancara 16 (CARE)	1958	
Ranunculaceae (Helleboraceae)	<i>Delphinium andersonii</i> var. <i>scaposum</i>	<i>D. scaposum</i>	pale larkspur	PerF	Wide	Pres	Unc	Harrison 901 (CARE)	1973	
Ranunculaceae	<i>Ranunculus cymbalaria</i>	<i>Halimolobos cymbalaria</i> ssp. <i>saximontana</i> , <i>R. cymbalaria</i> var. <i>cymbalaria</i> . Vars. not recognized in <i>Flora of North America</i> (1997)	marsh buttercup	PerF	Wide	Pres	Unc	Meyer 4561 (CARE)	1980	
Ranunculaceae	<i>Ranunculus sceleratus</i> var. <i>multifidus</i>	<i>Hecatonia scelerata</i>	blister buttercup	AnnF	Wide	Pres	Unc	Heil 3522 (CARE)	1987	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Ranunculaceae	<i>Ranunculus testiculatus</i>	<i>Ceratocephala orthoceras</i> , <i>C. testiculata</i>	bur buttercup	AnnF	Intro	Pres	Rare	Fleming BC282 (CARE)	1987	Native to Eurasia
Ranunculaceae (Thalictraceae)	<i>Thalictrum fendleri</i>		Fendler's meadow-rue	PerF	Wide	Pres	Unc	Porter 3860 (CARE)	1986	
Ranunculaceae (Thalictraceae)	<i>Thalictrum sparsiflorum</i>	<i>T. sparsiflorum</i> var. <i>saximontanum</i>	few-flower meadow-rue	PerF	Wide	Rep	Rare	Northern Colorado Plateau Network (in ed.)	2004	
Rhamnaceae	<i>Ceanothus fendleri</i>		Fendler's mountain-lilac	Shrub	Wide	Pres	Unc	Porter 3887 (CARE)	1986	
Rhamnaceae	<i>Rhamnus betulifolia</i>	<i>Frangula betulifolia</i>	birchleaf buckthorn	Shrub	Wide	Pres	Unc	Meyer 4713 (CARE)	1981	
Rosaceae	<i>Amelanchier alnifolia</i>		Saskatoon serviceberry	Shrub	Wide	Pres	Unc	Nelson 9482 (CARE)	1970	
Rosaceae	<i>Amelanchier utahensis</i>		Utah serviceberry	Shrub	Wide	Pres	Abun	Harrison 1378 (CARE)	1966	Type locality is Toquerville, Washington Co, UT (Jones 1716 GH)
Rosaceae	<i>Cercocarpus intricatus</i>	<i>C. ledifolius</i> var. <i>intricatus</i>	dwarf mountain mahogany	Shrub	Wide	Pres	Abun	Harrison 834 (CARE)	1958	Type locality is American Fork Canyon, Utah Co, UT (Watson 314 US)
Rosaceae	<i>Cercocarpus ledifolius</i> var. <i>intermontanus</i>	<i>C. ledifolius</i> var. <i>intercedens</i>	curl-leaf mountain mahogany	Shrub	Wide	Pres	Unc	Porter 3959 (CARE)	1986	Type locality is ca 10 km E of Oak City, Millard Co, UT (Holmgren & Holmgren 11298 NY)
Rosaceae	<i>Cercocarpus montanus</i>		alder-leaf mountain mahogany	Shrub	Wide	Pres	Unc	Porter 3856 (CARE)	1986	
Rosaceae	<i>Coleogyne ramosissima</i>		blackbrush	Shrub	Wide	Pres	Unc	Camp 538 (CARE)	1978	
Rosaceae	<i>Cydonia oblonga</i>		quince	Tree	Intro	Pres	Unc	Fleming BC-288 (CARE)	1987	Native to SW Asia



**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Rosaceae	<i>Fallugia paradoxa</i>		Apache plume	Shrub	Wide	Pres	Abun	Nelson 9589 (CARE)	1958	
Rosaceae	<i>Fragaria virginiana</i>	Includes <i>spp. glauca</i> & <i>platypetala</i>	Virginia strawberry	PerF	Wide	Rep	Unc	Heil et al. (1993), Northern Colorado Plateau Network (in ed.)	2004	
Rosaceae	<i>Holodiscus dumosus</i>	<i>H. discolor</i>	bush oceanspray	Shrub	Wide	Pres	Unc	Nelson 9839 (CARE)	1971	
Rosaceae	<i>Malus floribunda</i>		showy crabapple	Tree	Intro	Pres	Unc	Porter 4216 (CARE)	1986	Native to Japan
Rosaceae	<i>Malus pumila</i>	<i>Pyrus malus</i>	common apple	Tree	Intro	Pres	Unc	Harrison 1369 (CARE)	1973	Native to Eurasia
Rosaceae	<i>Malus sylvestris</i>		crabapple	Tree	Intro	Pres	Unc	Fleming 515 (CARE)	1987	Native to Eurasia
Rosaceae	<i>Petrophytum caespitosum</i>	<i>Spiraea caespitosa</i>	rock spiraea	PerF	Wide	Pres	Unc	Camp 269 (CARE)	1977	
Rosaceae	<i>Physocarpus alternans</i>		dwarf ninebark	Shrub	Wide	Pres	Unc	Meyer 4512 (CARE)	1980	
Rosaceae	<i>Potentilla anserina</i>	<i>Argentina anserina</i>	silverweed	PerF	Wide	Rep	Rare	Northern Colorado Plateau Network (in ed.)	2004	
Rosaceae	<i>Potentilla concinna</i> var. <i>bicrenata</i>	<i>P. bicrenata</i>	bicrenate cinquefoil	PerF	Wide	Pres	Unc	Fleming BC317 (CARE)	1987	
Rosaceae	<i>Potentilla crinita</i>		hair-tuft cinquefoil	PerF	Wide	Pres	Unc	Heil 3535 (CARE)	1987	
Rosaceae	<i>Potentilla gracilis</i> var. <i>pulcherrima</i>	<i>P. pulcherrima</i>	beautiful cinquefoil	PerF	Wide	Pres	Unc	Meyer 4769 (CARE)	1981	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Rosaceae	<i>Potentilla hippiana</i>	<i>P. hippiana</i> var. <i>hippiana</i>	woolly cinquefoil	PerF	Wide	Rep	Unc	Heil et al. (1993), Northern Colorado Plateau Network (in ed.)	2004	Reports from CARE Herbarium based on unidentified specimens of <i>P. crinita</i> or on collections from outside the park.
Rosaceae	<i>Potentilla pennsylvanica</i>		Pennsylvania cinquefoil	PerF	Wide	Pres	Unc	Heil 3566 (CARE)	1987	
Rosaceae	<i>Prunus armeniaca</i>	<i>Armeniaca vulgaris</i>	apricot	Tree	Intro	Pres	Unc	Porter 4214 (CARE)	1986	Native to China
Rosaceae	<i>Prunus avium</i>		sweet cherry	Tree	Intro	Pres	Unc	Harrison 853 (CARE)	1973	Native to Eurasia
Rosaceae	<i>Prunus cerasifera</i>		flowering plum	Tree	Intro	Pres	Unc	Porter 4348 (CARE)	1986	Native to Asia
Rosaceae	<i>Prunus cerasus</i>		sour cherry	Tree	Intro	Pres	Unc	Porter 4357 (CARE)	1986	Native to Eurasia
Rosaceae	<i>Prunus domestica</i>		common plum	Tree	Intro	Pres	Unc	Porter 4225 (CARE)	1986	Native to Eurasia
Rosaceae	<i>Prunus dulcis</i>		almond	Tree	Intro	Pres	Unc	Porter 4358 (CARE)	1986	Native to Old World
Rosaceae	<i>Prunus persica</i>		peach	Tree	Intro	Pres	Unc	Porter 4359 (CARE)	1986	Native to China
Rosaceae	<i>Purshia mexicana</i> var. <i>stansburyana</i>	<i>P. stansburyana</i> , <i>Cowania mexicana</i>	cliff-rose	Shrub	Wide	Pres	Abun	Nelson 9588 (CARE)	1970	
Rosaceae	<i>Purshia tridentata</i>		antelope bitterbrush	Shrub	Wide	Pres	Com	Meyer 4753 (CARE)	1981	
Rosaceae	<i>Pyrus communis</i>		common pear	Tree	Intro	Pres	Unc	Harrison 852 (CARE)	1973	Native to Eurasia
Rosaceae	<i>Rosa woodsii</i>	<i>R. woodsii</i> var. <i>ultramontana</i> , Includes <i>R. manca</i>	Woods' rose	Shrub	Wide	Pres	Com	Fleming BC375 (CARE)	1971	
Rubiaceae	<i>Galium aparine</i> var. <i>echinospermon</i>	<i>G. spurium</i>	cleavers	AnnF	Wide	Pres	Unc	Meyer 4711 (CARE)	1981	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Rubiaceae	<i>Galium multiflorum</i> var. <i>multiflorum</i>	<i>G. multiflorum</i>	shrubby bedstraw	PerF	Wide	Pres	Unc	Porter 2424 (CARE)	1986	
Salicaceae	<i>Populus angustifolia</i>		narrow-leaved cottonwood	Tree	Wide	Pres	Unc	Nelson 9535 (CARE)	1958	
Salicaceae	<i>Populus fremontii</i> var. <i>fremontii</i>	<i>P. deltoides</i> var. <i>fremontii</i>	Fremont cottonwood	Tree	Wide	Pres	Abun	Harrison 1389 (CARE)	1973	
Salicaceae	<i>Populus nigra</i>		black poplar	Tree	Intro	Pres	Unc	Porter 4361 (CARE)	1986	Native to Eurasia
Salicaceae	<i>Populus tremuloides</i>		quaking aspen	Tree	Wide	Pres	Unc	Porter 3944 (CARE)	1986	
Salicaceae	<i>Populus x intercurrents</i>	<i>P. acuminata</i> , <i>P. x acuminata</i> . Hybrid of <i>P. fremontii</i> x <i>P. angustifolia</i>	lance-leaf cottonwood	Tree	Wide	Pres	Unc	Fleming BC296 (BRY Paratype)	1987	Type locality is Jesse Ewing Canyon, Daggett Co, UT (Goodrich 24441 BRY)
Salicaceae	<i>Salix amygdaloides</i>		peach-leaf willow	Tree	Wide	Pres	Unc	Porter 4070 (BRY)	1986	
Salicaceae	<i>Salix babytonica</i>		weeping willow	Tree	Intro	Pres	Unc	Porter 4362 (CARE)	1986	
Salicaceae	<i>Salix boothii</i>		Booth's willow	Shrub	Wide	Rep	Rare	Northern Colorado Plateau Network (in ed.)	2004	
Salicaceae	<i>Salix eriocephala</i> var. <i>ligulifolia</i>	<i>S. ligulifolia</i>	strapleaf willow	Shrub	Wide	Pres	Unc	Meyer 4706 (CARE)	1981	
Salicaceae	<i>Salix eriocephala</i> var. <i>watsonii</i>	<i>S. lutea</i> , <i>S. rigida</i> var. <i>watsonii</i>	yellow willow	Shrub	Wide	Pres	Unc	Harrison 1460 (CARE)	1974	
Salicaceae	<i>Salix exigua</i> var. <i>stenophylla</i>	<i>S. exigua</i> var. <i>exigua</i>	coyote willow	Shrub	Wide	Pres	Com	Meyer 4455 (CARE)	1973	
Salicaceae	<i>Salix gooddingii</i>	<i>S. nigra</i> var. <i>vallicola</i>	Goodding's black willow	Tree	Wide	Pres	Unc	Meyer 4516 (CARE)	1980	
Salicaceae	<i>Salix lasiolepis</i>		arroyo willow	Shrub	Wide	Pres	Unc	Meyer 4443 (CARE)	1980	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Salicaceae	<i>Salix lucida</i> ssp. <i>caudata</i>	<i>S. lasianдра</i> var. <i>caudata</i>	whiplash willow	Shrub	Wide	Pres	Rare	Porter 5182 (CARE)	1987	
Salicaceae	<i>Salix matsudana</i>		Matsuda's willow	Tree	Intro	Pres	Unc	Porter 4350 (CARE)	1986	Native to Asia
Santalaceae	<i>Comandra umbellata</i> var. <i>pallida</i>	<i>C. pallida</i>	bastard toadflax	PerF	Wide	Pres	Com	Harrison 908 (CARE)	1973	
Saxifragaceae (Hydrangeaceae)	<i>Fendlerella utahensis</i>		Utah fendlerella	Shrub	Wide	Pres	Unc	Heil 2684 (CARE)	1986	Type locality is Kanab, Kane Co, UT (Thompson s.n. GH). Probably collected farther to the E.
Saxifragaceae	<i>Heuchera parvifolia</i>	Includes vars. <i>major</i> , <i>parvifolia</i> , & <i>utahensis</i>	littleleaf alumroot	PerF	Wide	Pres	Rare	Porter 3957 (CARE)	1986	
Saxifragaceae	<i>Heuchera rubescens</i>	Vars. not recognized in <i>Intermountain Flora</i> (1997)	red alumroot	PerF	Wide	Rep	NA	Meyer (1982)	NA	Specimen has not been relocated.
Saxifragaceae (Parnassiaceae)	<i>Parnassia palustris</i> var. <i>montanensis</i>	Includes var. <i>tenuis</i>	marsh grass-of-Parnassus	PerF	Wide	Pres	Unc	Meyer 4593 (CARE)	1980	
Saxifragaceae (Hydrangeaceae)	<i>Philadelphus microphyllus</i>	<i>P. microphyllus</i> var. <i>occidentalis</i> , <i>P. occidentalis</i> var. <i>occidentalis</i>	littleleaf mock-orange	Shrub	Wide	Pres	Unc	Meyer 4577 (CARE)	1970	
Saxifragaceae (Grossulariaceae)	<i>Ribes aureum</i>	<i>R. aureum</i> var. <i>aureum</i>	golden currant	Shrub	Wide	Pres	Unc	Porter 5093 (CARE)	1987	
Saxifragaceae (Grossulariaceae)	<i>Ribes cereum</i> var. <i>inebrians</i>	<i>R. cereum</i> var. <i>pedicellare</i>	wax currant	Shrub	Wide	Pres	Unc	Meyer 4578 (CARE)	1980	
Saxifragaceae (Grossulariaceae)	<i>Ribes inerme</i>		whitestem gooseberry	Shrub	Wide	Pres	Unc	Heil 3297 (CARE)	1986	
Scrophulariaceae	<i>Castilleja chromosa</i>	<i>C. angustifolia</i> var. <i>dubia</i> , <i>C. applegatei</i> ssp. <i>martinii</i>	desert paintbrush	PerF	Wide	Pres	Abun	Meyer 4763 (CARE)	1981	
Scrophulariaceae	<i>Castilleja exilis</i>	<i>C. minor</i> ssp. <i>minor</i>	annual paintbrush	AnnF	Wide	Pres	Unc	Camp 407 (CARE)	1974	
Scrophulariaceae	<i>Castilleja linariifolia</i>	<i>C. linariaefolia</i>	Wyoming paintbrush	PerF	Wide	Pres	Abun	Nelson 9843 (CARE)	1971	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Scrophulariaceae	<i>Castilleja scabrida</i> var. <i>scabrida</i>	<i>C. scabrida</i>	Eastwood's paintbrush	PerF	RegEn	Pres	Unc	Meyer 4432 (CARE)	1971	
Scrophulariaceae	<i>Cordylanthus parviflorus</i>		smallflower bird's-beak	AnnF	Wide	Pres	Unc	Harms 186 (CARE)	2005	
Scrophulariaceae	<i>Cordylanthus wrightii</i>		Wright's bird's-beak	AnnF	Wide	Pres	Unc	Porter 3814 (CARE)	1986	
Scrophulariaceae	<i>Mimulus eastwoodiae</i>		Eastwood's monkey-flower	PerF	RegEn	Pres	Rare	Heil 2695 (CARE)	1977	Type locality is San Juan River near Bluff, San Juan Co, UT (Rydberg 9883 NY)
Scrophulariaceae	<i>Mimulus glabratus</i> var. <i>utahensis</i>	<i>M. glabratus</i> var. <i>glabratus</i>	glabrous monkeyflower	PerF	Wide	Pres	Rare	Heil 3526 (CARE)	1987	Type locality is Preuss Lake, Millard Co, UT (Tidestrom 11180)
Scrophulariaceae	<i>Mimulus guttatus</i>		yellow monkeyflower	PerF	Wide	Pres	Unc	Porter 4281 (BRY)	1986	
Scrophulariaceae	<i>Pedicularis centranthera</i>		dwarf lousewort	PerF	Wide	Pres	Unc	Fleming BC362 (CARE)	1987	
Scrophulariaceae	<i>Penstemon ambiguus</i> var. <i>laevissimus</i>	<i>Leiostemon ambiguus</i>	bush penstemon	PerF	Wide	Pres	Rare	Heil 2922 (BRY)	1986	
Scrophulariaceae	<i>Penstemon angustifolius</i> var. <i>venosus</i>	Sometimes confused with sp. <i>caudatus</i> of WY & Great Plains	veined penstemon	PerF	RegEn	Pres	Unc	Camp 546 (CARE)	1978	
Scrophulariaceae	<i>Penstemon barbatus</i> var. <i>barbatus</i>	Includes var. <i>torreyi</i>	beardlip penstemon	PerF	Wide	Pres	Unc	Heil 2605 (BRY)	1986	
Scrophulariaceae	<i>Penstemon caespitosus</i> var. <i>desertipicti</i>		painted penstemon	PerF	RegEn	Pres	Rare	Fleming 638 (CARE)	1988	
Scrophulariaceae	<i>Penstemon carnosus</i>		fleshy penstemon	PerF	RegEn	Pres	Unc	Heil 3103 (CARE)	1987	Type locality is San Rafael Swell, Emery Co, UT (Cottam 5229 PH)

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Scrophulariaceae	<i>Penstemon comarrhenus</i>		dusty penstemon	PerF	RegEn	Pres	Unc	Meyer 4582 (CARE)	1980	Type locality is Aquarius Plateau, Garfield Co, UT (Ward 462 GH)
Scrophulariaceae	<i>Penstemon eatonii</i> var. <i>eatonii</i>	<i>P. eatonii</i>	Eaton's firecracker	PerF	Wide	Pres	Unc	Fertig & Lesica 21823 (CARE)	2005	Type locality is lower Provo Canyon, Utah Co, UT (Watson 776 GH)
Scrophulariaceae	<i>Penstemon eatonii</i> var. <i>undosus</i>		undulate penstemon	PerF	Wide	Pres	Abun	Fleming BC278 (CARE)	1987	Type locality is St. George, Washington Co, UT (Jones 5110h US)
Scrophulariaceae	<i>Penstemon moffatii</i>		Moffatt penstemon	PerF	RegEn	Pres	Unc	Fleming 595 (CARE)	1988	
Scrophulariaceae	<i>Penstemon ophianthus</i>		Loa penstemon	PerF	RegEn	Pres	Unc	Meyer 4738 (CARE)	1968	Type locality is Thurber, near Loa, Wayne Co, UT (Jones 5708 US)
Scrophulariaceae	<i>Penstemon pachyphyllus</i> var. <i>congestus</i>		Rockville penstemon	PerF	Wide	Pres	Unc	Meyer 4761 (CARE)	1980	Type locality is near Canaan Ranch, Rockville, Washington Co, UT (Jones 5262 POM)
Scrophulariaceae	<i>Penstemon palmeri</i> var. <i>eglandulosus</i>		Palmer's penstemon	PerF	RegEn	Pres	Unc	Swancara 1 (CARE)	1958	Type locality is 2.5 miles N of Kanab, Kane Co, UT (Maguire, Maguire, & Piranian 12279 UTC)
Scrophulariaceae	<i>Penstemon rostriflorus</i>	<i>P. bridgesii</i>	beaked penstemon	PerF	Wide	Pres	Unc	Porter 4136 (CARE)	1986	
Scrophulariaceae	<i>Penstemon scariosus</i> var. <i>scariosus</i>		plateau penstemon	PerF	RegEn	Pres	Unc	Heil 3305 (CARE)	1986	Type locality is Musine Peak, Sanpete Co, UT (Tidestrom 568 US)
Scrophulariaceae	<i>Penstemon strictus</i>		Rocky Mountain penstemon	PerF	Wide	Pres	Unc	Heil 2612 (BRY)	1986	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Scrophulariaceae	<i>Penstemon utahensis</i>		Utah penstemon	PerF	Wide	Pres	Com	Meyer 4441 (CARE)	1971	Type locality is between Hatch's Wash & Monticello, San Juan Co, UT (Eastwood s.n. CAS)
Scrophulariaceae	<i>Verbascum thapsus</i>		woolly mullein	PerF	Intro	Rep	Unc	Dewey and Andersen (2005)		Native to Eurasia
Scrophulariaceae	<i>Veronica americana</i>		American brooklime	PerF	Wide	Pres	Unc	Porter 4285 (CARE)	1986	
Scrophulariaceae	<i>Veronica anagallis-aquatica</i>		water speedwell	PerF	Intro	Pres	Unc	Meyer 4538 (CARE)	1980	Native to Europe
Selaginellaceae	<i>Selaginella mutica</i>	<i>S. mutica</i> var. <i>mutica</i>	blunt-leaf spike-moss	Fern	Wide	Pres	Unc	Meyer 4435 (CARE)	1980	
Simaroubaceae	<i>Ailanthus altissima</i>		tree-of-heaven	Tree	Intro	Pres	Unc	Harrison 1367 (CARE)	1958	Native to China
Solanaceae	<i>Datura wrightii</i>	<i>D. meteloides</i>	angel's trumpet	AnnF	Wide	Pres	Unc	Swancara 18 (CARE)	1958	
Solanaceae	<i>Lycium andersonii</i>		Anderson's wolfberry	Shrub	Wide	Pres	Unc	Meyer 4726 (CARE)	1981	
Solanaceae	<i>Nicotiana attenuata</i>		coyote tobacco	AnnF	Wide	Pres	Unc	Meyer 4628 (CARE)	1980	
Solanaceae	<i>Nicotiana trigonophylla</i>	<i>N. obtusifolia</i> , <i>N. trigonophylla</i> vars. <i>palmeri</i> , & var. <i>trigonophylla</i>	desert tobacco	AnnF	Wide	Pres	Unc	Meyer 4724 (CARE)	1981	
Solanaceae	<i>Physalis longifolia</i>	<i>P. virginiana</i> var. <i>sonorae</i>	long-leaf ground-cherry	PerF	Wide	Pres	Com	Porter 4373 (CARE)	1958	
Solanaceae	<i>Solanum elaeagnifolium</i>		silverleaf nightshade	PerF	Intro	Pres	Unc	Porter 4456 (CARE)	1986	Native to C North America
Solanaceae	<i>Solanum sarrachoides</i>	<i>S. villosum</i> , <i>S. physalifolium</i> var. <i>nitidibaccatum</i>	ground-cherry nightshade	AnnF	Intro	Pres	Unc	Meyer 4674 (CARE)	1980	Native to South America
Solanaceae	<i>Solanum triflorum</i>		cut-leaf nightshade	AnnF	Wide	Pres	Rare	Heil 3521 (BRY)	1986	Native to C North America, may be adventive in UT.

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Tamaricaceae	<i>Tamarix chinensis</i>	<i>T. pentandra</i> , <i>T. ramosissima</i>	five-stamen tamarisk	Shrub	Intro	Pres	Abun	Swancara 20 (CARE)	1958	Native to Eurasia
Typhaceae	<i>Typha domingensis</i>		southern cattail	PerG	Wide	Pres	Unc	Porter 4147 (CARE)	1986	
Typhaceae	<i>Typha latifolia</i>		broad-leaved cattail	PerG	Wide	Pres	Com	Meyer 4660 (CARE)	1980	
Ulmaceae (Celtidaceae)	<i>Celtis occidentalis</i>		common hackberry	Tree	Intro	Pres	Unc	Heil 4431 (CARE)	1988	Native to E North America
Ulmaceae (Celtidaceae)	<i>Celtis reticulata</i>	<i>C. laevigata</i> var. <i>reticulata</i>	netleaf hackberry	Tree	Wide	Pres	Unc	Fowler, May, & Hak 446 (CARE)	1970	
Ulmaceae	<i>Ulmus parvifolia</i>		Chinese elm	Tree	Intro	Pres	Unc	Porter 4220 (CARE)	1986	Native to Asia
Ulmaceae	<i>Ulmus pumila</i>		Siberian elm	Tree	Intro	Rep	Unc	Dewey and Andersen (2005)	2004	Native to Asia
Umbelliferae (Apiaceae)	<i>Anethum graveolens</i>		dill	AnnF	Intro	Pres	Unc	Porter 4374 (CARE)	1986	Native to Asia
Umbelliferae (Apiaceae)	<i>Cicuta maculata</i> var. <i>angustifolia</i>	<i>C. douglasii</i> , <i>C. occidentalis</i>	water-hemlock	PerF	Wide	Pres	Rare	Harrison 1284 (CARE)	1958	
Umbelliferae (Apiaceae)	<i>Cymopterus acaulis</i> var. <i>fendleri</i>	<i>C. fendleri</i> , <i>C. glomeratus</i>	Fendler's cymopterus	PerF	Wide	Pres	Unc	Meyer 4563 (CARE)	1980	
Umbelliferae (Apiaceae)	<i>Cymopterus beckii</i>		Beck's spring-parsley	PerF	LocEn	Pres	Unc	Camp 440 (CARE)	1938	Type locality is Fruita, Capitol Reef NP, Wayne Co, UT (Beck s.n. BRY). USFS: Region 4 Sensitive, UT BLM: Sensitive, USFWS: former C2 candidate
Umbelliferae (Apiaceae)	<i>Cymopterus bulbosus</i>		onion spring-parsley	PerF	Wide	Pres	Unc	Fleming 619 (CARE)	1971	
Umbelliferae (Apiaceae)	<i>Cymopterus lemmonii</i>	<i>Pseudocymopterus montanus</i>	Lemmon's spring-parsley	PerF	Wide	Pres	Rare	Heil 3287 (CARE)	1986	
Umbelliferae (Apiaceae)	<i>Cymopterus purpurascens</i>		basin white-cup spring-parsley	PerF	Wide	Pres	Unc	Harrison 971A (CARE)	1973	



**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Umbelliferae (Apiaceae)	<i>Cymopterus purpureus</i> var. <i>purpureus</i>	<i>C. purpureus</i>	Colorado Plateau spring-parsley	PerF	RegEn	Pres	Com	Meyer 4551 (CARE)	1973	
Umbelliferae (Apiaceae)	<i>Ligusticum porteri</i>		southern ligusticum	PerF	Wide	Rep	NA	Heil et al. (1993)	NA	Reports from CARE Herbarium based on collections from outside the park.
Umbelliferae (Apiaceae)	<i>Lomatium junceum</i>		rush lomatium	PerF	LocEn	Pres	Unc	Heil 3502 (CARE)	1980	Type locality is San Rafael Swell, Emery Co, UT (Holmgren, Holmgren, & Barneby 8778 NY)
Umbelliferae (Apiaceae)	<i>Lomatium parryi</i>		Parry's lomatium	PerF	Wide	Pres	Rare	Porter 4686 (CARE)	1980	Type locality is "Southern Utah" (Parry 85)
Umbelliferae (Apiaceae)	<i>Lomatium triternatum</i> ssp. <i>platycarpum</i>	<i>L. simplex</i>	flat-seed lomatium	PerF	Wide	Pres	Unc	Camp 440 (CARE)	1977	Type locality is Great Salt Lake (Stansbury s.n. NY)
Umbelliferae (Apiaceae)	<i>Osmorhiza depauperata</i>		blunt sweet-cicely	PerF	Wide	Rep	NA	Heil et al. (1993)	NA	Reports from CARE Herbarium based on collections from outside the park.
Umbelliferae (Apiaceae)	<i>Perideridia montana</i> var. <i>borealis</i>	<i>P. gairdneri</i> ssp. <i>borealis</i>	common yampah	PerF	Wide	Rep	Unc	UT Conservation Data Center database	NA	
Umbelliferae (Apiaceae)	<i>Sium suave</i>		water parsnip	PerF	Wide	Rep	NA	Heil et al. (1993)	NA	Reports from CARE Herbarium based on collections from outside the park.
Urticaceae	<i>Urtica dioica</i> var. <i>occidentalis</i>	<i>U. dioica</i> ssp. <i>holosericea</i> , <i>U. gracilis</i> ssp. <i>holosericea</i>	stinging nettle	PerF	Wide	Pres	Unc	Meyer 4619 (CARE)	1980	
Verbenaceae	<i>Verbena bracteata</i>		prostrate vervain	PerF	Wide	Pres	Unc	Meyer 4684 (CARE)	1980	

**Appendix A. Confirmed, historical, and reported vascular plant taxa of Capitol Reef National Park, organized by family and scientific name with taxonomic and biogeographic notes, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Pop. size	Source	Year doc.	Comments
Violaceae	<i>Viola adunca</i>		hook-spur violet	PerF	Wide	Pres	Unc	Heil 3294 (CARE)	1987	
Violaceae	<i>Viola nephrophylla</i>	<i>V. sororia</i> var. <i>affinis</i>	northern bog violet	PerF	Wide	Pres	Rare	Fleming BC339 (CARE)	1987	
Viscaceae	<i>Arceuthobium divaricatum</i>		pinyon dwarf-mistletoe	PerF	Wide	Pres	Unc	Fleming 130 (CARE)	1986	Typically parasitic on <i>Pinus edulis</i> and <i>P. monophylla</i>
Viscaceae	<i>Arceuthobium douglasii</i>		Douglas-fir dwarf-mistletoe	PerF	Wide	Pres	Rare	Fleming 462 (CARE)	1987	Typically parasitic on <i>Pseudotsuga menziesii</i> (rarely on <i>Abies</i> or <i>Picea</i> species)
Viscaceae	<i>Arceuthobium vaginatum</i> var. <i>cryptopodium</i>		southwestern dwarf-mistletoe	PerF	Wide	Pres	Rare	Heil 4368 (CARE)	1988	Typically parasitic on <i>Pinus ponderosa</i>
Viscaceae	<i>Phoradendron juniperinum</i>		juniper mistletoe	PerF	Wide	Pres	Unc	Porter 4065 (CARE)	1986	Typically parasitic on <i>Juniperus osteosperma</i>
Vitaceae	<i>Parthenocissus vitacea</i>		thicket-creeper	Shrub	Wide	Pres	Rare	Heil 3593 (CARE)	1987	
Vitaceae	<i>Vitis labrusca</i>		northern fox grape	Shrub	Intro	Pres	Unc	Porter 4224 (CARE)	1986	Native to E North America
Zannichelliaceae	<i>Zannichellia palustris</i>		horned pondweed	PerF	Wide	Pres	Unc	Meyer 4616 (CARE)	1980	
Zygophyllaceae	<i>Tribulus terrestris</i>		puncture vine	AnnF	Intro	Pres	Unc	Fleming 82 (CARE)	1986	Native to Eurasia

Appendix B. Potential (unconfirmed) taxa of Capitol Reef National Park.

Family	Species name	Synonyms/Taxonomic notes	Common name	Life form	Range	Comments
Agavaceae	<i>Yucca baileyi</i>		Bailey's yucca	Shrub	Periph	
Aizoaceae	<i>Sesuvium verrucosum</i>		sea purslane	PerF	Wide	
Asclepiadaceae	<i>Asclepias hallii</i>		Hall's milkweed	PerF	Sparse	
Asclepiadaceae	<i>Asclepias tuberosa</i> var. <i>interior</i>	<i>A. tuberosa</i> ssp. <i>terminalis</i>	orange milkweed	PerF	Wide	
Asclepiadaceae	<i>Sarcostemma cynanchoides</i> var. <i>hartwegii</i>	<i>Funastrum cynanchoides</i> ssp. <i>heterophyllum</i>	climbing milkweed	PerF	Periph	Reports from CARE Herbarium based on collections from outside the park.
Boraginaceae	<i>Cryptantha bakeri</i>	<i>Oreocarya bakeri</i>	Baker's cryptanth	PerF	RegEn	
Boraginaceae	<i>Cryptantha paradoxa</i>	<i>Oreocarya paradoxa</i>	Paradox cryptanth	PerF	RegEn	Reports from CARE Herbarium are based on misidentified specimens of <i>C. abata</i> . USFWS: 3C
Boraginaceae	<i>Cryptantha wetherillii</i>		Wetherill's cryptanth	PerF	RegEn	Type locality is Courthouse Wash, Grand Co, UT (Eastwood s.n. CAS)
Boraginaceae	<i>Hackelia floribunda</i>		showy stickseed	PerF	Wide	
Boraginaceae	<i>Plagiobothrys jonesii</i>		Jones' popcorn-flower	AnnF	RegEn	
Boraginaceae	<i>Plagiobothrys scouleri</i> var. <i>penicillatus</i>	<i>P. scouleri</i> var. <i>hispidulus</i>	meadow popcorn-flower	AnnF	Wide	
Cactaceae	<i>Echinocereus engelmannii</i> var. <i>variegatus</i>	<i>E. engelmannii</i> var. <i>decumbens</i> . Vars. not recognized in <i>Flora of North America</i> (2003)	Glen Canyon hedgehog cactus	PerF	RegEn	Reports from CARE Herbarium based on collections from outside the park.
Cactaceae	<i>Opuntia erinacea</i> var. <i>erinacea</i>	<i>O. polyacantha</i> var. <i>erinacea</i>	common pricklypear	PerF	Wide	
Cactaceae	<i>Opuntia erinacea</i> var. <i>utahensis</i>	<i>O. polyacantha</i> var. <i>hystricina</i> . Var. not recognized in <i>Flora of North America</i> (2003)	Utah pricklypear	PerF	Wide	
Cactaceae	<i>Opuntia macrorhiza</i> var. <i>macrorhiza</i>	<i>O. macrorhiza</i>	twist-spine pricklypear	PerF	Wide	
Cactaceae	<i>Opuntia nicholii</i>	<i>O. polyacantha</i> var. <i>nicholii</i>	Nicholl's pricklypear	PerF	LocEn	
Cactaceae	<i>Opuntia whipplei</i>	<i>Cylindropuntia whipplei</i>	Whipple's cholla	Shrub	RegEn	
Cactaceae	<i>Pediocactus despainii</i>		Despain's pincushion cactus	PerF	LocEn	Type locality is Wedge Overlook road, San Rafael Swell, Emery Co, UT (Despain 266a BRY). USFWS: Endangered

Appendix B. Potential (unconfirmed) taxa of Capitol Reef National Park, cont.

Family	Species name	Synonyms/Taxonomic notes	Common name	Life form	Range	Comments
Caprifoliaceae	<i>Lonicera involucrata</i>	<i>Distegia involucrata</i>	black twinberry	Shrub	Wide	
Caprifoliaceae (Aoxaceae)	<i>Sambucus racemosa</i> var. <i>microbotrys</i>	<i>S. microbotrys</i> . Included in <i>S. racemosa</i> var. <i>racemosa</i> by some authors	red elderberry	Shrub	Wide	
Caryophyllaceae (Alsinaceae)	<i>Arenaria hookeri</i> var. <i>desertorum</i>	Included in <i>Eremogone hookeri</i> var. <i>hookeri</i> in <i>Flora of North America</i> (2005)	Hooker's sandwort	PerF	RegEn	
Caryophyllaceae (Alsinaceae)	<i>Arenaria lateriflora</i>	<i>Moehringia lateriflora</i>	blunt-leaf sandwort	PerF	Wide	
Caryophyllaceae (Alsinaceae)	<i>Arenaria obtusiloba</i>	<i>Minuartia obtusiloba</i> , <i>Lidia obtusiloba</i>	Rydberg's sandwort	PerF	Wide	
Caryophyllaceae (Alsinaceae)	<i>Arenaria rubella</i> var. <i>rubella</i>	<i>Minuartia rubella</i> , <i>Tryphane rubella</i>	reddish sandwort	PerF	Wide	
Caryophyllaceae (Alsinaceae)	<i>Cerastium arvense</i>	<i>C. strictum</i> , <i>C. arvense</i> ssp. <i>Strictum</i>	field chickweed	PerF	Wide	
Caryophyllaceae	<i>Silene menziesii</i>	<i>S. menziesii</i> var. <i>menziesii</i> , <i>Anotites menziesii</i> var. <i>menziesii</i>	Menzies' campion	PerF	Wide	
Caryophyllaceae (Alsinaceae)	<i>Stellaria calycantha</i>	<i>S. borealis</i> ssp. <i>sitchana</i>	northern starwort	PerF	Wide	
Caryophyllaceae (Alsinaceae)	<i>Stellaria jamesiana</i>	<i>Pseudostellaria jamesiana</i>	James' chickweed	PerF	Wide	Reports from CARE Herbarium are based on misidentified specimens of <i>S. longipes</i> var. <i>longipes</i> .
Caryophyllaceae (Alsinaceae)	<i>Stellaria umbellata</i>		umbrella starwort	PerF	Wide	
Chenopodiaceae	<i>Atriplex garrettii</i> var. <i>garrettii</i>		Garrett's saltbush	Shrub	LocEn	Type locality is vicinity of Moab, Grand Co, UT (Rydberg & Garrett 8465 NY)
Chenopodiaceae	<i>Atriplex powellii</i> var. <i>minuticarpa</i>	<i>A. minuticarpa</i>	Green River orach	AnnF	LocEn	Type locality is 3 miles E of Green River, Grand Co, UT (Stutz 9547 BRY)
Chenopodiaceae	<i>Atriplex saccaria</i> var. <i>asterocarpa</i>	<i>A. asterocarpa</i>	horned orach	AnnF	RegEn	Type locality is ca 0.5 mi SE of Hog Spring, Hwy 95, Garfield Co, UT (Stutz 9575 BRY)
Chenopodiaceae	<i>Atriplex saccaria</i> var. <i>cornuta</i>	<i>A. cornuta</i>	blade orach	AnnF	RegEn	Type locality is Green River, Emery Co, UT (Jones 5481 POM)

Appendix B. Potential (unconfirmed) taxa of Capitol Reef National Park, cont.

Family	Species name	Synonyms/Taxonomic notes	Common name	Life form	Range	Comments
Chenopodiaceae	<i>Chenopodium capitatum</i> var. <i>parvicapitatum</i>	<i>C. overi</i> , <i>C. foliosum</i>	smallhead goosefoot	AnnF	Wide	Type locality is Indian Creek, Tushar Mountains, Beaver Co, UT (Martin & Welsh 17148 BRY)
Chenopodiaceae	<i>Chenopodium fremontii</i> var. <i>fremontii</i>	<i>C. fremontii</i>	Fremont's goosefoot	AnnF	Wide	Reports from CARE Herbarium based on collections from outside the park.
Chenopodiaceae	<i>Cycloloma atriplicifolia</i>	<i>C. atriplicifolium</i>	winged pigweed	AnnF	Wide	
Compositae (Asteraceae)	<i>Acourtia wrightii</i>	<i>Perezia wrightii</i>	Wright's perizia	PerF	Periph	
Compositae (Asteraceae)	<i>Agoseris aurantiaca</i> var. <i>aurantiaca</i>		orange agoseris	PerF	Wide	
Compositae (Asteraceae)	<i>Agoseris glauca</i> var. <i>dasycephala</i>		short agoseris	PerF	Wide	
Compositae (Asteraceae)	<i>Arnica chamissonis</i> var. <i>foliosa</i>	<i>A. chamissonis</i> var. <i>andina</i>	Chamisso's arnica	PerF	Wide	
Compositae (Asteraceae)	<i>Arnica cordifolia</i> var. <i>cordifolia</i>	Vars. not recognized in <i>Flora of North America</i> (2006)	heartleaf arnica	PerF	Wide	Misspelled var. <i>cordata</i> in Welsh et al. 2003
Compositae (Asteraceae)	<i>Artemisia biennis</i>	<i>A. biennis</i> var. <i>biennis</i>	biennial wormwood	PerF	Wide	
Compositae (Asteraceae)	<i>Artemisia carruthii</i>		Carruth's wormwood	PerF	Wide	
Compositae (Asteraceae)	<i>Aster eatonii</i>	<i>Symphotrichum eatonii</i> , <i>A. bracteolatus</i>	Eaton's aster	PerF	Wide	
Compositae (Asteraceae)	<i>Aster foliaceus</i> var. <i>canbyi</i>	<i>Symphotrichum foliaceum</i> var. <i>canbyi</i>	Canby's aster	PerF	Wide	Reports from CARE Herbarium based on collections from outside the park.
Compositae (Asteraceae)	<i>Aster hesperius</i>	<i>A. lanceolatus</i> var. <i>hesperius</i> , <i>Symphotrichum lanceolatum</i> var. <i>hesperium</i>	Siskiyou aster	PerF	Wide	
Compositae (Asteraceae)	<i>Aster spinosus</i>	<i>Chloracantha spinosa</i> var. <i>spinosa</i>	Mexican devilweed	PerF	Wide	
Compositae (Asteraceae)	<i>Chrysopsis villosa</i> var. <i>villosa</i>	<i>Heterotheca villosa</i> var. <i>villosa</i>	hairy golden-aster	PerF	Sparse	
Compositae (Asteraceae)	<i>Chrysopsis zionensis</i>	<i>Heterotheca zionensis</i> , <i>H. villosa</i> var. <i>foliosa</i>	Zion golden-aster	PerF	RegEn	Reports from CARE Herbarium based on collections from outside the park. Type locality is W of Leeds along road to Silver Reef Campgrounds, Washington Co, UT (Semple & Heard 7859 NY)

**Appendix B. Potential (unconfirmed) taxa of Capitol Reef National Park, cont.**

Family	Species name	Synonyms/Taxonomic notes	Common name	Life form	Range	Comments
Compositae (Asteraceae)	<i>Chrysothamnus pulchellus</i> var. <i>baileyi</i>	<i>Ericameria pulchella</i> , <i>Lorandersonia baileyi</i> , <i>C. baileyi</i>	pretty rabbitbrush	Shrub	Periph	
Compositae (Asteraceae)	<i>Chrysothamnus vaseyi</i>		Vasey's rabbitbrush	Shrub	Wide	Reports from CARE Herbarium based on collections from outside the park.
Compositae (Asteraceae)	<i>Cirsium arvense</i>	Includes vars. <i>horridum</i> & <i>integrifolium</i> , <i>Breea arvensis</i>	Canada thistle	Perf	Intro	Utah state noxious weed. Native to Eurasia
Compositae (Asteraceae)	<i>Cirsium clavatum</i> var. <i>clavatum</i>		Fish Lake thistle	Perf	RegEn	Type locality is Fish Lake, Sevier Co, UT (Jones 5715 NY)
Compositae (Asteraceae)	<i>Cirsium rydbergii</i>		Rydberg's thistle	Perf	RegEn	Type locality is along San Juan River near Bluff, San Juan Co, UT (Rydberg & Garrett 10001 NY). USFWS: 3C
Compositae (Asteraceae)	<i>Crepis acuminata</i>	<i>Psilochenia acuminata</i>	mountain hawksbeard	Perf	Wide	
Compositae (Asteraceae)	<i>Crepis intermedia</i>	<i>Psilochenia intermedia</i>	gray hawksbeard	Perf	Wide	
Compositae (Asteraceae)	<i>Enceliopsis nutans</i>	<i>Encelia nutans</i>	noddinghead	Perf	RegEn	
Compositae (Asteraceae)	<i>Erigeron aphanactis</i> var. <i>aphanactis</i>	<i>E. concinnus</i> var. <i>aphanactis</i>	hairy daisy	Perf	Wide	
Compositae (Asteraceae)	<i>Erigeron compositus</i> var. <i>glabratus</i>	<i>E. compositus</i> var. <i>discoideus</i>	cut-leaved daisy	Perf	Wide	
Compositae (Asteraceae)	<i>Erigeron divergens</i> var. <i>divergens</i>	<i>E. divergens</i>	spreading daisy	Perf	Wide	
Compositae (Asteraceae)	<i>Erigeron formosissimus</i>	<i>E. formosissimus</i> var. <i>formosissimus</i>	beautiful daisy	Perf	Wide	
Compositae (Asteraceae)	<i>Gnaphalium palustre</i>		lowland cudweed	AnnF	Wide	
Compositae (Asteraceae)	<i>Grindelia fastigiata</i>	Included in <i>G. hirsutula</i> in <i>Flora of North America</i> (2006)	erect gumweed	Perf	RegEn	
Compositae (Asteraceae)	<i>Grindelia squarrosa</i> var. <i>serrulata</i>	Vars. not recognized in <i>Flora of North America</i> (2006)	curly-cup gumweed	Perf	Wide	
Compositae (Asteraceae)	<i>Haplopappus clementis</i>	<i>Pyrrcoma clementis</i> var. <i>clementis</i>	Clement's goldenweed	Perf	Wide	Reports from CARE Herbarium based on collections from outside the park.

**Appendix B. Potential (unconfirmed) taxa of Capitol Reef National Park, cont.**

Family	Species name	Synonyms/Taxonomic notes	Common name	Life form	Range	Comments
Compositae (Asteraceae)	<i>Helenium hoopesii</i>	<i>Hymenoxys hoopesii</i> , <i>Dugaldia hoopesii</i>	orange sneezeweed	PerF	Wide	Reports from CARE Herbarium are based on misidentified specimens of <i>H. helenioides</i> or from specimens collected outside the park.
Compositae (Asteraceae)	<i>Hymenoxys cooperi</i>	<i>Actinella cooperi</i>	Cooper's hymenoxys	PerF	Wide	
Compositae (Asteraceae)	<i>Hymenoxys helenioides</i>	<i>Picradenia helenioides</i> . May be of hybrid origin between <i>Hymenoxys richardsonii</i> and <i>Helenium [Hymenoxys] hoopesii</i> .	sneezeweed hymenoxys	PerF	RegEn	Reports from CARE Herbarium based on collections from outside the park.
Compositae (Asteraceae)	<i>Hymenoxys richardsonii</i> var. <i>richardsonii</i>	<i>Picradenia richardsonii</i> var. <i>richardsonii</i>	Colorado rubber-plant	PerF	Wide	
Compositae (Asteraceae)	<i>Layia glandulosa</i>		tidytips	AnnF	Wide	
Compositae (Asteraceae)	<i>Malacothrix torreyi</i>		Torrey's desert-dandelion	AnnF	Wide	Type locality is shores of Great Salt Lake, UT (Stansbury s.n. GH)
Compositae (Asteraceae)	<i>Prenanthes exigua</i>	<i>Lygodesmia exigua</i>	prenanthella	AnnF	Wide	Reports from CARE Herbarium based on collections from outside the park.
Compositae (Asteraceae)	<i>Psathyrotes pilifera</i>		piliferous turtleback	AnnF	RegEn	Type locality is near Kanab, Kane Co, UT (Thompson s.n. GH)
Compositae (Asteraceae)	<i>Ratibida columnifera</i>		prairie coneflower	PerF	Sparse	
Compositae (Asteraceae)	<i>Senecio canus</i>	<i>Packera cana</i>	woolly groundsel	PerF	Wide	
Compositae (Asteraceae)	<i>Senecio eremophilus</i> var. <i>kingii</i>		cut-leaved groundsel	PerF	Wide	Reports from CARE Herbarium based on collections from outside the park. Type locality is Cottonwood Canyon, Salt Lake Co, UT (Watson 676 NY)
Compositae (Asteraceae)	<i>Senecio serra</i> var. <i>serra</i>		saw-toothed groundsel	PerF	Wide	Reports from CARE Herbarium based on collections from outside the park.
Compositae (Asteraceae)	<i>Solidago multiradiata</i> var. <i>scopulorum</i>	Vars. not recognized in <i>Flora of North America</i> (2006).	Rocky Mountain goldenrod	PerF	Wide	
Compositae (Asteraceae)	<i>Solidago nana</i>		baby goldenrod	PerF	Wide	
Compositae (Asteraceae)	<i>Stephanomeria pauciflora</i>		brown-plume wirelettuce	PerF	Wide	

Appendix B. Potential (unconfirmed) taxa of Capitol Reef National Park, cont.						
Family	Species name	Synonyms/Taxonomic notes	Common name	Life form	Range	Comments
Compositae (Asteraceae)	<i>Stylocline micropoides</i>		desert nest-straw	AnnF	Periph	
Compositae (Asteraceae)	<i>Thymophylla acerosa</i>	<i>Dyssodia acerosa</i>	dogweed	PerF	Wide	
Compositae (Asteraceae)	<i>Townsendia florifer</i>	<i>T. florifera</i>	showy townsendia	PerF	Wide	
Compositae (Asteraceae)	<i>Verbesina encelloioides</i> var. <i>exauriculata</i>	<i>Ximenesia encelloioides</i>	golden crownbeard	AnnF	Wide	
Cruciferae (Brassicaceae)	<i>Arabis glabra</i> var. <i>glabra</i>	<i>Turritis glabra</i> . Vars. not recognized by Holmgren et al. (2005)	tower-mustard	PerF	Wide	
Cruciferae (Brassicaceae)	<i>Camelina microcarpa</i>		little-pod false flax	AnnF	Intro	Native to Asia
Cruciferae (Brassicaceae)	<i>Draba rectifructa</i>		mountain draba	AnnF	RegEn	
Cruciferae (Brassicaceae)	<i>Lepidium lasiocarpum</i> var. <i>georginum</i>		St. George pepperwort	AnnF	Wide	Type locality is valley of the Virgin near St. George, Washington Co, UT (Parry 19 NY)
Cruciferae (Brassicaceae)	<i>Lepidium lasiocarpum</i> var. <i>L. lasiocarpum lasiocarpum</i>		hairy-pod pepperwort	AnnF	Wide	
Cruciferae (Brassicaceae)	<i>Lepidium virginicum</i> var. <i>pubescens</i>		poor-man's pepperwort	AnnF	Wide	
Cruciferae (Brassicaceae)	<i>Physaria chambersii</i> var. <i>chambersii</i>		Chambers' twinpod	PerF	Wide	
Cruciferae (Brassicaceae)	<i>Rorippa curvipes</i> var. <i>curvipes</i>	<i>R. curvipes</i>	blunt-leaf yellowcress	PerF	Wide	Reports from CARE Herbarium are based on misidentified specimens of <i>R. islandica</i> var. <i>glabra</i> .
Cruciferae (Brassicaceae)	<i>Thelypodopsis sagittata</i> var. <i>sagittata</i>	<i>Thelypodium sagittatum</i> var. <i>sagittatum</i>	arrowhead thelypody	PerF	Wide	
Cruciferae (Brassicaceae)	<i>Thelypodium integrifolium</i> var. <i>gracilipes</i>		Moab thelypody	PerF	RegEn	
Cruciferae (Brassicaceae)	<i>Thelypodium laxiflorum</i>	<i>T. wrightii</i> var. <i>tenellum</i>	slate thelypody	PerF	Wide	USFWS: 3C
Cyperaceae	<i>Carex bella</i>		beautiful sedge	PerG	Wide	
Cyperaceae	<i>Carex disperma</i>		soft-leaved sedge	PerG	Wide	



Appendix B. Potential (unconfirmed) taxa of Capitol Reef National Park, cont.

Family	Species name	Synonyms/Taxonomic notes	Common name	Life form	Range	Comments
Cyperaceae	<i>Carex obtusata</i>		blunt sedge	PerG	Wide	
Cyperaceae	<i>Carex petasata</i>		liddon sedge	PerG	Wide	
Cyperaceae	<i>Carex raynoldsii</i>		Raynolds' sedge	PerG	Wide	
Cyperaceae	<i>Carex utriculata</i>	<i>C. rostrata (sensu lato)</i>	beaked sedge	PerG	Wide	Reports from CARE Herbarium based on collections from outside the park.
Cyperaceae	<i>Cyperus erythrorhizos</i>		redroot flat-sedge	AnnG	Wide	
Euphorbiaceae	<i>Chamaesyce micromeria</i>	<i>Euphorbia micromeria</i>	tiny spurge	AnnF	Wide	
Euphorbiaceae	<i>Chamaesyce serpyllifolia</i>	<i>Euphorbia serpyllifolia</i>	thyme-leaved spurge	AnnF	Wide	
Euphorbiaceae	<i>Euphorbia nephradenia</i>		Utah spurge	AnnF	RegEn	Reports from CARE Herbarium and UT CDC are based on collections from outside the park in Glen Canyon NRA. Type locality is Cottonwood Canyon, Kane Co, UT (Barneby 14434 NY). UT BLM: Sensitive, USFWS: 3C
Gentianaceae	<i>Centaurium calycosum</i>	<i>C. arizonicum</i>	Buckley's centaury	AnnF	Periph	
Gentianaceae	<i>Swertia utahensis</i>	<i>Frasera paniculata</i>	Utah swertia	PerF	RegEn	Type locality is Buckskin Mountains, Kaibab Plateau "on the southern edge of Utah", Kane Co, UT (Jones s.n. POM)
Gramineae (Poaceae)	<i>Agrostis scabra</i>	<i>A. hiemalis</i> , <i>A. geminata</i>	ticklegass	PerG	Wide	Reports from CARE Herbarium based on collections from outside the park.
Gramineae (Poaceae)	<i>Alopecurus pratensis</i>		meadow foxtail	PerG	Intro	Native to Eurasia
Gramineae (Poaceae)	<i>Bouteloua aristoides</i>		needle grama	AnnG	Periph	
Gramineae (Poaceae)	<i>Elymus elongatus</i>	<i>E. elongatus</i> var. <i>ponticus</i> , <i>Agropyron elongatum</i> , <i>Thinopyrum ponticum</i>	tall wheatgrass	PerG	Intro	Native to Eurasia
Gramineae (Poaceae)	<i>Muhlenbergia montana</i>	Includes <i>M. filiculmis</i>	mountain muhly	PerG	Wide	
Gramineae (Poaceae)	<i>Muhlenbergia richardsonis</i>		mat muhly	PerG	Wide	
Gramineae (Poaceae)	<i>Panicum obtusum</i>		vine mesquite	PerG	Wide	Reports from CARE Herbarium based on collections from outside the park.
Gramineae (Poaceae)	<i>Poa glauca</i> var. <i>glauca</i>	<i>P. nemoralis</i> ssp. <i>interior</i> , <i>P. interior</i>	interior bluegrass	PerG	Wide	

**Appendix B. Potential (unconfirmed) taxa of Capitol Reef National Park, cont.**

Family	Species name	Synonyms/Taxonomic notes	Common name	Life form	Range	Comments
Hydrophyllaceae	<i>Nama densum</i> var. <i>parviflorum</i>		leafy fiddleleaf	AnnF	Wide	
Hydrophyllaceae	<i>Phacelia cottamii</i>		Cottam's phacelia	AnnF	LocEn	Type locality is 4.5 miles N of Huntington along Hwy 10, Emery Co, UT (Atwood & Atwood 24852 BRY)
Hydrophyllaceae	<i>Phacelia crenulata</i> var. <i>orbicularis</i>	Var. not recognized in Cronquist et al. (1984)	Henry Mountains phacelia	AnnF	LocEn	Type locality is Henry Mtns, Marvine Laccolite, Garfield Co, UT (Jones 5663 NY)
Juglandaceae	<i>Juglans cinerea</i>		butternut	Tree	Intro	Native to E North America
Juncaceae	<i>Juncus drummondii</i>	Includes vars. <i>drummondii</i> & <i>subtriflorus</i>	Drummond's rush	PerG	Wide	
Juncaginaceae	<i>Triglochin palustris</i>		marsh arrowgrass	PerG	Wide	
Labiatae (Lamiaceae)	<i>Dracocephalum parviflorum</i>	<i>Moldavica parviflora</i>	smallflower dragonhead	PerF	Wide	
Leguminosae (Fabaceae)	<i>Astragalus eastwoodiae</i>		Eastwood's milkvetch	PerF	RegEn	Type locality is Westwater, Grand Co, UT (Jones s.n. POM)
Leguminosae (Fabaceae)	<i>Astragalus henrimontanensis</i>	<i>A. argophyllus</i> var. <i>stocksii</i>	Dana's milkvetch	PerF	LocEn	Type locality is The Horn near Penellen Pass, Garfield Co, UT (Welsh & Moore 11740 BRY). USFS: Region 4 Sensitive
Leguminosae (Fabaceae)	<i>Astragalus kentrophyta</i> var. <i>coloradoensis</i>		canyon kentrophyta	PerF	RegEn	
Leguminosae (Fabaceae)	<i>Astragalus lentiginosus</i> var. <i>araneosus</i>	<i>A. lentiginosus</i> var. <i>diphysus</i>	cobweb milkvetch	PerF	RegEn	Reports from CARE Herbarium based on collections from outside the park. Type locality is Frisco, Beaver Co, UT (Jones 180 MINN)
Leguminosae (Fabaceae)	<i>Astragalus nidularius</i>		birds-nest milkvetch	PerF	LocEn	Type locality is White Canyon, 2 miles below Kachina Bridge, San Juan Co, UT (Barneby 12778 CAS). USFWS: 3C
Leguminosae (Fabaceae)	<i>Astragalus piutensis</i>	<i>A. marianus</i>	Sevier milkvetch	PerF	RegEn	Type locality is Marysvale, Piute Co, UT (Jones 5355 NY)
Leguminosae (Fabaceae)	<i>Astragalus praelongus</i> var. <i>ellisiae</i>		Ellis' milkvetch	PerF	Wide	
Leguminosae (Fabaceae)	<i>Astragalus preussii</i> var. <i>laxiflorus</i>		littlefield milkvetch	PerF	RegEn	Reports from CARE Herbarium based on collections from outside the park.
Leguminosae (Fabaceae)	<i>Astragalus wingatanus</i>		Fort Wingate milkvetch	PerF	RegEn	

Appendix B. Potential (unconfirmed) taxa of Capitol Reef National Park, cont.

Family	Species name	Synonyms/Taxonomic notes	Common name	Life form	Range	Comments
Leguminosae (Fabaceae, Caesalpinieaceae)	<i>Caesalpinia repens</i>	<i>Hoffmanseggia repens</i>	creeping rush-pea	PerF	RegEn	Reports from CARE Herbarium based on collections from outside the park. Type locality is Courthouse Wash, Grand Co, UT (Eastwood s.n. CAS)
Leguminosae (Fabaceae)	<i>Lotus utahensis</i>		Utah trefoil	PerF	RegEn	Reports from CARE Herbarium based on collections from outside the park. Type locality is W of Carmel, Kane Co, UT (Ferguson & Ottley 5613 NY)
Leguminosae (Fabaceae)	<i>Lupinus argenteus</i> var. <i>moabensis</i>		Moab lupine	PerF	RegEn	Type locality is Professor Valley Ranch, Grand Co, UT (Welsh & Taylor 14632 BRY)
Leguminosae (Fabaceae)	<i>Lupinus kingii</i> var. <i>kingii</i>	<i>L. kingii</i>	King's lupine	AnnF	Wide	Reports from CARE Herbarium based on collections from outside the park. Type locality is Heber Valley, Wasatch Co, UT (Watson 234 GH)
Leguminosae (Fabaceae)	<i>Lupinus lepidus</i> var. <i>utahensis</i>	<i>L. lepidus</i> var. <i>caespitosus</i> , <i>L. caespitosus</i> var. <i>utahensis</i>	stemless lupine	PerF	Wide	Type locality is Parley's Park, Summit Co, UT (Watson 234 US)
Leguminosae (Fabaceae)	<i>Lupinus sericeus</i> var. <i>barbiger</i>	<i>L. barbiger</i> . Vars. not recognized in Barneby (1989)	sink lupine	PerF	RegEn	Reports from CARE Herbarium based on collections from outside the park. Type locality is Kane Co, UT (Siler s.n. GH)
Leguminosae (Fabaceae)	<i>Oxytropis oreophila</i> var. <i>oreophila</i>		mountain locoweed	PerF	Wide	Type locality is Aquarius Plateau, Garfield Co, UT (Ward 541 GH)
Leguminosae (Fabaceae)	<i>Oxytropis sericea</i> var. <i>sericea</i>		white locoweed	PerF	Wide	
Leguminosae (Fabaceae)	<i>Trifolium gymnocarpon</i>	<i>T. gymnocarpon</i> var. <i>gymnocarpon</i>	dwarf clover	PerF	Wide	
Leguminosae (Fabaceae)	<i>Trifolium hybridum</i>		alsike clover	PerF	Intro	Native to Europe
Linaceae	<i>Linum subteres</i>		Utah yellow-flax	PerF	RegEn	Type locality is Willow Creek, San Juan Co, UT (Eastwood s.n.)
Malvaceae	<i>Sphaeralcea leptophylla</i>		slenderleaf globemallow	PerF	Wide	
Malvaceae	<i>Sphaeralcea psoraloides</i>		scurfpea globemallow	PerF	LocEn	Reports from CARE Herbarium based on collections from outside the park. Type locality is Salt Wash, ca 17 miles WNW of Hanksville, Wayne Co, UT (Welsh 13348 BRY). UT BLM: Sensitive, USFWS: former C2 candidate

**Appendix B. Potential (unconfirmed) taxa of Capitol Reef National Park, cont.**

Family	Species name	Synonyms/Taxonomic notes	Common name	Life form	Range	Comments
Nyctaginaceae	<i>Tripterocalyx carneus</i> var. <i>wootonii</i>	<i>T. wootonii</i>	Wooton's sand-verbena	AnnF	RegEn	Reports from CARE Herbarium based on collections from outside the park.
Oleaceae	<i>Forestiera pubescens</i>	<i>F. neomexicana</i>	desert olive	Shrub	Wide	
Onagraceae	<i>Epilobium brachycarpum</i>	<i>E. paniculatum</i> var. <i>paniculatum</i>	autumn willow-herb	AnnF	Wide	
Onagraceae	<i>Epilobium saximontanum</i>		Rocky Mountain willow-herb	PerF	Wide	
Onagraceae	<i>Gayophytum racemosum</i>		raceme groundsmoke	AnnF	Wide	
Onagraceae	<i>Oenothera caespitosa</i> var. <i>crinita</i>		Jones' evening-primrose	PerF	Wide	Type locality is Rabbit Valley, Wayne Co, UT (Ward 526 US)
Onagraceae	<i>Oenothera flava</i> var. <i>flava</i>	<i>O. flava</i>	yellow evening-primrose	PerF	Wide	
Ophioglossaceae	<i>Botrychium simplex</i>	Includes vars. <i>compositum</i> & <i>tenebrosum</i>	little grapefern	Fern	Sparse	
Papaveraceae	<i>Argemone corymbosa</i> var. <i>arenicola</i>		San Rafael prickly-poppy	PerF	RegEn	Type locality is 37.9 miles SW of Green River, Emery Co, UT (Ownbey & Ownbey 2146)
Polemoniaceae	<i>Collomia linearis</i>		small collomia	AnnF	Wide	
Polemoniaceae	<i>Ipomopsis aggregata</i> var. <i>macrosiphon</i>	<i>I. tenuituba</i> , <i>Gilia aggregata</i> var. <i>macrosiphon</i>	scarlet gilia	PerF	Wide	
Polemoniaceae	<i>Ipomopsis aggregata</i> var. <i>maculata</i>	<i>Gilia aggregata</i> var. <i>maculata</i> , <i>I. aggregata</i> ssp. <i>formosissima</i>	scarlet gilia	PerF	Wide	
Polygonaceae	<i>Eriogonum batemanii</i> var. <i>batemanii</i>	<i>E. batemanii</i>	Bateman's wild buckwheat	PerF	RegEn	Type locality is Price, Carbon Co, UT (Jones s.n. POM)
Polygonaceae	<i>Eriogonum divaricatum</i>		spreading wild buckwheat	AnnF	Wide	
Polygonaceae	<i>Eriogonum leptocladon</i> var. <i>papiliunculi</i>	Misspelled in Welsh et al. (2003)	butterfly wild buckwheat	Shrub	RegEn	
Polygonaceae	<i>Eriogonum sahsuginosum</i>	<i>Stenogonum sahsuginosum</i>	smooth wild buckwheat	AnnF	Wide	Reports from CARE Herbarium based on collections from outside the park.
Polygonaceae	<i>Eriogonum scabrellum</i>		Westwater wild buckwheat	AnnF	RegEn	Reports from CARE Herbarium based on collections from outside the park. Type locality is ca 2 miles S of US 506 on road to Westwater, Grand Co, UT (Reveal & Davidse 949 UTC)

**Appendix B. Potential (unconfirmed) taxa of Capitol Reef National Park, cont.**

Family	Species name	Synonyms/Taxonomic notes	Common name	Life form	Range	Comments
Polygonaceae	<i>Eriogonum umbellatum</i> var. <i>majus</i>	<i>E. umbellatum</i> var. <i>subalpinum</i> , <i>E. subalpinum</i> ; includes vars. <i>dichrocephalum</i> & <i>desereticum</i>	cream wild buckwheat	Perf	Wide	
Polygonaceae	<i>Eriogonum umbellatum</i> var. <i>umbellatum</i>	Includes var. <i>aureum</i> from Flora of North America (2005)	sulfur wild buckwheat	PerF	Wide	
Polygonaceae	<i>Polygonum douglasii</i> var. <i>douglasii</i>	<i>P. douglasii</i>	Douglas' knotweed	AnnF	Wide	Reports from CARE Herbarium based on collections from outside the park.
Polygonaceae	<i>Polygonum persicaria</i>	<i>Persicaria maculosa</i>	lady's-thumb	AnnF	Intro	Report from CARE Herbarium lacks location data and cannot be confirmed as present in the park. Native to Eurasia
Polygonaceae	<i>Polygonum ramosissimum</i>	<i>P. ramosissimum</i> var. <i>prolificum</i> , <i>P. ramosissimum</i> var. <i>ramosissimum</i>	bushy knotweed	AnnF	Wide	
Polypodiaceae (Adiantaceae, Sinopteridaceae)	<i>Pellaea truncata</i>		spiny cliff-brake	Fern	Wide	
Polypodiaceae (Aspleniaceae, Woodsiaceae)	<i>Woodsia scopulina</i>	<i>W. scopulina</i> ssp. <i>scopulina</i>	Rocky Mountain woodsia	Fern	Wide	
Rosaceae	<i>Geum triflorum</i> var. <i>ciliatum</i>	<i>Erythrocoma triflora</i>	prairie smoke	Perf	Wide	
Rosaceae	<i>Potentilla concinna</i> var. <i>modesta</i>	<i>P. concinna</i> . Combined with <i>P. rubricaulis</i> in Holmgren et al. (1997)	modest cinquefoil	Perf	RegEn	Type locality is Mt. Barrette near Marysvale, Piute Co, UT (Rydberg & Carlton 7261 NY)
Rosaceae	<i>Potentilla ovina</i> var. <i>decurrens</i>		sheep cinquefoil	Perf	Wide	Type locality is Uinta Mountains, Summit Co, UT (Watson 329 GH)
Rubiaceae	<i>Kelloggia galioides</i>		milky kelloggia	Perf	Wide	
Saxifragaceae	<i>Lithophragma glabrum</i> var. <i>ramulosum</i>	<i>L. bulbifera</i> , <i>L. glabra</i>	fringecup woodlandstar	PerF	Wide	
Saxifragaceae	<i>Lithophragma tenellum</i>	<i>L. tenella</i>	slender woodlandstar	PerF	Wide	
Scrophulariaceae	<i>Castilleja flava</i>	<i>C. flava</i> var. <i>flava</i>	yellow paintbrush	Perf	Wide	Reports from CARE Herbarium based on collections from outside the park.
Scrophulariaceae	<i>Collinsia parviflora</i>		blue-eyed mary	AnnF	Wide	

Appendix B. Potential (unconfirmed) taxa of Capitol Reef National Park, cont.

Family	Species name	Synonyms/Taxonomic notes	Common name	Life form	Range	Comments
Scrophulariaceae	<i>Cordylanthus kingii</i> var. <i>kingii</i>		King's bird's-beak	AnnF	RegEn	
Scrophulariaceae	<i>Linaria vulgaris</i>		butter-and-eggs	PerF	Intro	Native to Eurasia
Scrophulariaceae	<i>Penstemon palmeri</i> var. <i>palmeri</i>	<i>P. palmeri</i>	Palmer's penstemon	PerF	Wide	
Scrophulariaceae	<i>Penstemon watsonii</i>		Watson's penstemon	PerF	Wide	Reports from CARE Herbarium based on collections from outside the park.
Scrophulariaceae	<i>Veronica peregrina</i> var. <i>xalapensis</i>		purslane speedwell	AnnF	Wide	
Solanaceae	<i>Lycium pallidum</i>		pale wolfberry	Shrub	Wide	
Solanaceae	<i>Lycium torreyi</i>		Torrey's wolfberry	Shrub	Wide	
Solanaceae	<i>Physalis hederifolia</i> var. <i>fendleri</i>	<i>P. fendleri</i> , <i>P. hederifolia</i> var. <i>cordifolia</i> , <i>P. hederifolia</i> var. <i>fendleri</i>	Fendler's ground-cherry	PerF	Wide	
Umbelliferae (Apiaceae)	<i>Angelica pinnata</i>		pinnate angelica	PerF	Wide	Type locality is Uinta Mountains, Summit Co, UT (Watson 458 GH)
Umbelliferae (Apiaceae)	<i>Berula erecta</i> var. <i>incisa</i>		cutleaf water-parsnip	PerF	Wide	
Umbelliferae (Apiaceae)	<i>Cymopterus newberryi</i>		sticky spring-parsley	PerF	RegEn	
Umbelliferae (Apiaceae)	<i>Heracleum lanatum</i>	<i>H. maximum</i> , <i>H. sphondylium</i> var. <i>lanatum</i> , <i>H. sphondylium</i> ssp. <i>montanum</i>	cow parsnip	PerF	Wide	
Umbelliferae (Apiaceae)	<i>Ligusticum filicinum</i>		fernleaf ligusticum	PerF	Wide	Type locality is Uinta Mountains, Summit Co, UT (Watson 454 GH)
Urticaceae	<i>Parietaria pensylvanica</i>		Pennsylvania pellitory	AnnF	Wide	Reports from CARE Herbarium based on collections from outside the park.
Valerianaceae	<i>Valeriana edulis</i>		tobacco-root	PerF	Wide	
Valerianaceae	<i>Valeriana occidentalis</i>		western valerian	PerF	Wide	

Note: The vascular plant species listed in this table are known from the vicinity of Capitol Reef National Park in Wayne, Garfield, Emery, and Sevier counties, Utah, but have not previously been reported or confirmed for the park. Species on this list are derived from a checklist of potential species for NCPN parks prepared by Dr. N. Duane Atwood of Brigham Young University in 2001, and the *Atlas of the Vascular Flora of Utah* (Albee et al. 1988). Some species from Appendix C could be considered as potentially occurring in the park, but are not included here.

**Appendix C. Rejected (falsely reported or questionable) taxa of Capitol Reef National Park.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Comments
Amaranthaceae	<i>Amaranthus powellii</i>		Powell's amaranth	AnnF	Sparse	FalsRep	Reports from CARE Herbarium based on misidentified specimens of <i>A. retroflexus</i> .
Boraginaceae	<i>Cryptantha barbigera</i>		bearded cryptanth	AnnF	Periph	FalsRep	Reports from CARE herbarium are based on misidentified specimens of <i>C. crassisejala</i> var. <i>elachantha</i> . Type locality is St. George, Washington Co, UT (Parry 171 GH).
Boraginaceae	<i>Cryptantha decipiens</i>		beguiling cryptanth	AnnF	Periph	FalsRep	Reports from CARE herbarium are based on misidentified specimens of <i>C. crassisejala</i> var. <i>elachantha</i> .
Boraginaceae	<i>Cryptantha johnstonii</i>		Johnston's cryptanth	PerF	LocEn	FalsRep	Reports from CARE herbarium are based on misidentified specimens of <i>C. confertiflora</i> . Type locality is Huntington Road, ca 15 mi W of US 506, Emery Co, UT (Higgins 1310 BRY). USFWS: 3C.
Boraginaceae	<i>Cryptantha tenuis</i>		slender cryptanth	PerF	RegEn	FalsRep	Reports from CARE herbarium are based on misidentified specimens of <i>C. abata</i> and <i>C. flaviculata</i> . Type locality is Courthouse Wash, Grand Co, UT (Eastwood s.n. CAS).
Caryophyllaceae (Alsinaeeae)	<i>Cerastium nutans</i>		nodding chickweed	AnnF	Sparse	FalsRep	Reports from CARE herbarium are based on misidentified specimens of <i>C. fontanum</i> .
Caryophyllaceae	<i>Silene verecunda</i> ssp. <i>andersonii</i>	Vars. not recognized in <i>Flora of North America</i> (2005)	shy champion	PerF	Periph	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>Lychnis drummondii</i> .
Chenopodiaceae	<i>Atriplex gardneri</i> var. <i>utahensis</i>	<i>A. tridentata</i> var. <i>robusta</i>	basin saltbush	Shrub	Wide	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>A. canescens</i> var. <i>canescens</i> . Type locality of var. <i>utahensis</i> is Salt Lake City, Salt Lake Co, UT (Jones 1760 POM).
Chenopodiaceae	<i>Atriplex patula</i>		spear orach	AnnF	Sparse	FalsRep	Reports from CARE herbarium are based on misidentified specimens of <i>A. prostrata</i> .
Chenopodiaceae	<i>Atriplex rosea</i>		tumbling orach	AnnF	Intro	FalsRep	Reports from CARE herbarium are based on misidentified specimens of <i>A. truncata</i> . Also Reported by Northern Colorado Plateau Network (in ed.). Native to Eurasia.
Chenopodiaceae	<i>Chenopodium botrys</i>	<i>Teloxys botrys</i> , <i>Dysphania botrys</i>	Jerusalem-oak	AnnF	Intro	FalsRep	Reports from CARE herbarium are based on misidentified specimens of <i>C. graveolens</i> var. <i>neomexicanum</i> . Native to Eurasia.
Compositae (Asteraceae)	<i>Ambrosia artemisiifolia</i>	<i>A. artemisiifolia</i> var. <i>elator</i>	common ragweed	AnnF	Wide	FalsRep	Reports from CARE Herbarium based on misidentified specimens of <i>A. acanthicarpa</i> .



Appendix C. Rejected (falsely reported or questionable) taxa of Capitol Reef National Park, cont.

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Comments
Compositae (Asteraceae)	<i>Baccharis glutinosa</i>	Included in <i>B. salicina</i> by some authors. Included in <i>B. salicifolia</i> in <i>Flora of North America</i> (2006)	sticky seepwillow	Shrub	Wide	FalsRep	Reports from the CARE Herbarium are based on misidentified specimens of <i>B. salicina</i> .
Compositae (Asteraceae)	<i>Chaenactis fremontii</i>		Fremont's dusty- maiden	AnnF	Periph	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>C. stevioides</i> .
Compositae (Asteraceae)	<i>Chrysothamnus nauseosus</i> ssp. <i>latisquameus</i>	<i>Ericameria nauseosa</i> var. <i>latisquamea</i>		Shrub	RegEn	FalsRep	Not known from Utah. No specimens found in CARE Herbarium in 2005.
Compositae (Asteraceae)	<i>Chrysothamnus nauseosus</i> var. <i>nitidus</i>	<i>Ericameria nauseosa</i> var. <i>nitida</i> ; included in <i>C. nauseosus</i> var. <i>turbinatus</i> in Cronquist (1994)	shiny rabbitbrush	Shrub	RegEn	FalsRep	Reports from CARE herbarium based on misidentified specimens of <i>C. nauseosus</i> var. <i>junceus</i> .
Compositae (Asteraceae)	<i>Erigeron annuus</i>		annual fleabane	AnnF	Intro	Ques?	Reported by Northern Colorado Plateau Network (in ed.), but Capitol Reef NP is well outside the expected range of this species. Native to Europe.
Compositae (Asteraceae)	<i>Erigeron awapensis</i>	Included in <i>E. abajoensis</i> in Cronquist (1994)	Awapa daisy	PerF	LocEn	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>E. caespitosus</i> or on specimens collected outside the park. Type locality is 26.5 miles S of Antimony, Wayne Co, UT (Welsh & Welsh 9388 BRY).
Compositae (Asteraceae)	<i>Erigeron engelmannii</i>		Engelmann's daisy	PerF	Wide	FalsRep	Reports from CARE herbarium are based on misidentified specimens of <i>E. pumilus</i> var. <i>concinus</i> .
Compositae (Asteraceae)	<i>Glyptopleura setulosa</i>		setose crustweed	AnnF	Periph	FalsRep	Reports from CARE herbarium based on misidentified specimen of <i>G. marginata</i> . Type locality is near St. George, Washington Co, UT (Palmer 6 GH).
Compositae (Asteraceae)	<i>Gnaphalium macounii</i>	<i>G. viscosum</i> , <i>Pseudognaphalium viscosum</i> , <i>P. macounii</i>	sticky gumweed	AnnF	Sparse	FalsRep	Report from CARE based on a misidentified specimen of <i>G. wrightii</i> .
Compositae (Asteraceae)	<i>Helianthella uniflora</i>		little sunflower	PerF	Wide	FalsRep	Reports from CARE herbarium are based on misidentified specimens of <i>H. nuttallii</i> .



Appendix C. Rejected (falsely reported or questionable) taxa of Capitol Reef National Park, cont.

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Comments
Compositae (Asteraceae)	<i>Hymenoxys acaulis</i> var. <i>epunctata</i>	<i>Tetranneuris acaulis</i> var. <i>epunctata</i>	stemless hymenoxys	PerF	RegEn	FalsRep	Reports from CARE are based on misidentified specimens of <i>H. acaulis</i> var. <i>arizonica</i> .
Compositae (Asteraceae)	<i>Lactuca canadensis</i>		Canada lettuce	PerF	Periph	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>Sonchus asper</i> .
Compositae (Asteraceae)	<i>Lygodesmia juncea</i>		rush skeleton-plant	PerF	Periph	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>Prenantheella exigua</i> .
Compositae (Asteraceae)	<i>Machaeranthera canescens</i> var. <i>monticola</i>	Included in <i>M. canescens</i> var. <i>canescens</i> by some authors	bracteate aster	PerF	RegEn	FalsRep	Reports from CARE Herbarium based on misidentified specimens of <i>M. canescens</i> var. <i>canescens</i> .
Compositae (Asteraceae)	<i>Pluchea sericea</i>	<i>Tessaria sericea</i>	arrowweed	Shrub	Wide	FalsRep	Reports from CARE herbarium are based on misidentified specimens of <i>Vernonia marginata</i> .
Compositae (Asteraceae)	<i>Psilostrophe cooperi</i>		whitestem paperflower	Shrub	Periph	FalsRep	Reports from CARE herbarium are based on misidentified specimens of <i>P. sparsiflora</i> .
Compositae (Asteraceae)	<i>Senecio dimorphophyllus</i> var. <i>dimorphophyllus</i>	<i>Packera dimorphophylla</i> var. <i>dimorphophylla</i> ; UT material is var. <i>paysonii</i> according to Cronquist (1994)	two-leaf groundsel	PerF	RegEn	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>S. douglasii</i> var. <i>longilobus</i> .
Compositae (Asteraceae)	<i>Solidago missouriensis</i>	<i>S. missouriensis</i> var. <i>missouriensis</i> . Vars. not recognized in <i>Flora of North America</i> (2006).	Missouri goldenrod	PerF	Wide	FalsRep	Reports from CARE herbarium are based on misidentified specimens of <i>S. velutina</i> .
Compositae (Asteraceae)	<i>Tetradymia nuttallii</i>		Nuttall's horsebrush	Shrub	RegEn	FalsRep	Reports from CARE herbarium are misidentified specimens of <i>T. spinosa</i> .
Compositae (Asteraceae)	<i>Townsendia montana</i> var. <i>montana</i>	<i>T. alpigena</i> var. <i>alpigena</i>	Wyoming townsendia	PerF	Periph	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>T. aprica</i> .
Convolvulaceae	<i>Ipomoea hirsutula</i>	<i>Ipomoea hederacea</i>	ivy leaf morning- glory	AnnF	Intro	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>Convolvulus arvensis</i> .

Appendix C. Rejected (falsely reported or questionable) taxa of Capitol Reef National Park, cont.

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Comments
Crossosomataceae	<i>Glossopetalon spinescens</i> var. <i>aridum</i>	<i>Forsellisia nevadensis</i>	Nevada greasebush	Shrub	Periph	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>Fendlerella utahensis</i> . Also reported by Northern Colorado Plateau Network (in ed.).
Crossosomataceae	<i>Glossopetalon spinescens</i> var. <i>meionandrum</i>	<i>Forsellisia meionandra</i>	spiny greasebush	Shrub	RegEn	FalsRep	Reports from CARE herbarium based on misidentified specimens of <i>G. spinescens</i> var. <i>microphyllum</i> .
Cruciferae (Brassicaceae)	<i>Arabis microphylla</i> var. <i>microphylla</i>	<i>Boechera microphylla</i> var. <i>microphylla</i>	small-leaf rockcress	PerF	Wide	FalsRep	Reports from CARE herbarium based on misidentified specimens of <i>A. demissa</i> and <i>A. selbyi</i> .
Cruciferae (Brassicaceae)	<i>Descurainia pinnata</i> var. <i>filipes</i>	<i>D. incisa</i> var. <i>filipes</i>	western tansy-mustard	AnnF	Wide	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>D. pinnata</i> var. <i>osmiarum</i> .
Cruciferae (Brassicaceae)	<i>Draba cana</i>	<i>D. lanceolata</i> , <i>D. breweri</i> var. <i>cana</i>	lanceleaf draba	PerF	Wide	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>D. aurea</i> .
Cyperaceae	<i>Carex hoodii</i>		Hood's sedge	PerG	Wide	FalsRep	Reports from CARE Herbarium based on misidentified of <i>C. stenophylla</i> .
Cyperaceae	<i>Carex tahoensis</i>	<i>C. xerantica</i>	dryland sedge	PerG	Wide	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>C. praegracilis</i> .
Cyperaceae	<i>Eleocharis rostellata</i>		beaked spikerush	PerG	Wide	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>E. quinqueflora</i> .
Cyperaceae	<i>Scirpus validus</i>	<i>Schoenoplectus tabernaemontani</i> , <i>Schoenoplectus lacustris</i> ssp. <i>validus</i>	soft-stem bulrush	PerG	Wide	FalsRep	Reports from the CARE Herbarium are based on misidentified specimens of <i>S. acutus</i> . Also reported by Northern Colorado Plateau Network (in ed.).
Ephedraceae	<i>Ephedra nevadensis</i>		Nevada ephedra	Shrub	Wide	FalsRep	Reports from CARE herbarium are based on misidentified <i>E. viridis</i> var. <i>viridis</i> . Also reported by Northern Colorado Plateau Network (in ed.).
Ericaceae	<i>Arctostaphylos pungens</i>		Mexican manzanita	Shrub	Wide	Ques?	Reported by Northern Colorado Plateau Network (in ed.), but Capitol Reef NP is well outside the expected range of this species.
Fagaceae	<i>Quercus</i> x <i>eastwoodiae</i>	Hybrid between <i>Q. gambelii</i> x <i>Q. welschii</i>	Eastwood's oak	Shrub	RegEn	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>Q. welschii</i> . Type locality is Butler Wash, San Juan Co, UT (Eastwood 141 NY)
Gramineae (Poaceae)	<i>Agrostis capillaris</i>	<i>A. tenuis</i>	colonial bentgrass	PerG	Intro	FalsRep	Reports from CARE Herbarium based on misidentified specimens of <i>A. stolonifera</i> . Native to Eurasia

Appendix C. Rejected (falsely reported or questionable) taxa of Capitol Reef National Park, cont.

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Comments
Gramineae (Poaceae)	<i>Alopecurus carolinianus</i>		Carolina foxtail	AnnG	Periph	FalsRep	Reports from CARE Herbarium based on misidentified specimens of <i>A. aequalis</i> .
Gramineae (Poaceae)	<i>Bothriochloa barbinodis</i>		cane bluestem	PerG	Wide	FalsRep	Reports from the CARE Herbarium are based on misidentified specimens of <i>B. springfieldii</i> .
Gramineae (Poaceae)	<i>Bothriochloa laguroides</i> ssp. <i>torreyana</i>		silver bluestem	PerG	Periph	FalsRep	Reports from the CARE Herbarium are based on misidentified specimens of <i>B. springfieldii</i> .
Gramineae (Poaceae)	<i>Bouteloua hirsuta</i>	<i>Chondrosom hirsutum</i> , <i>B. hirsuta</i> ssp. <i>hirsuta</i>	hairy grama	PerG	Periph	FalsRep	Reports from CARE Herbarium based on misidentified specimens of <i>B. gracilis</i> .
Gramineae (Poaceae)	<i>Bouteloua trifida</i>	<i>B. trifida</i> var. <i>trifida</i>	red grama	PerG	Periph	FalsRep	Reports from CARE Herbarium based on misidentified specimens of <i>B. gracilis</i> . Not included for UT in FNA 2003.
Gramineae (Poaceae)	<i>Bromus carinatus</i>	<i>B. marginatus</i> , <i>B. polyanthus</i> , <i>Ceratochloa carinata</i>	mountain brome	PerG	Wide	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>B. japonicus</i> .
Gramineae (Poaceae)	<i>Elymus glaucus</i>	<i>E. glaucus</i> var. <i>glaucus</i>	blue wildrye	PerG	Wide	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>Festuca arundinacea</i> .
Gramineae (Poaceae)	<i>Elymus hispidus</i>	<i>E. hispidus</i> var. <i>hispidus</i> , <i>Agropyron intermedium</i> , <i>Elytrigia intermedia</i> , <i>Thinopyrum intermedium</i>	intermediate wheatgrass	PerG	Intro	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>E. trachycaulus</i> . Native to Eurasia.
Gramineae (Poaceae)	<i>Festuca pratensis</i>	<i>Lolium pratense</i> , <i>Schedonorus pratensis</i>	meadow fescue	PerG	Intro	FalsRep	Reports from CARE Herbarium based on misidentified specimens of <i>Bromus inermis</i> var. <i>inermis</i> . Native to Eurasia.
Gramineae (Poaceae)	<i>Phalaris arundinacea</i>	<i>Phalaroides arundinacea</i>	reed canary grass	PerG	Wide	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>Calamagrostis stricta</i> .
Gramineae (Poaceae)	<i>Poa arnowiae</i>	<i>Poa curta</i>	Wasatch bluegrass	PerG	Wide	FalsRep	Reports from CARE herbarium are based on misidentified specimens of <i>Festuca sororia</i> .

Appendix C. Rejected (falsely reported or questionable) taxa of Capitol Reef National Park, cont.

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Comments
Gramineae (Poaceae)	<i>Puccinellia pauciflora</i>	<i>P. pauciflora</i> var. <i>holmii</i> , <i>Torreyochloa pallida</i> var. <i>pauciflora</i> , <i>T. pauciflora</i>	weak alkaligrass	PerG	Wide	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>Glyceria striata</i> .
Gramineae (Poaceae)	<i>Stipa nelsonii</i> var. <i>nelsonii</i>	<i>Achnatherum nelsonii</i> var. <i>nelsonii</i> , <i>S. columbiana</i> var. <i>nelsonii</i>	Nelson's needlegrass	PerG	Wide	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>S. pinetorum</i> and <i>S. coronata</i> var. <i>parishii</i> . Also reported by Northern Colorado Plateau Network (in ed.).
Hydrophyllaceae	<i>Nama demissum</i>		purple-mat	AnnF	Wide	Ques?	Reported by Northern Colorado Plateau Network (in ed.), but Capitol Reef NP is outside the known or expected range of this species.
Hydrophyllaceae	<i>Nama hispidum</i>		hairy nama	AnnF	Periph	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>N. retrorsum</i> .
Hydrophyllaceae	<i>Phacelia mammillarensis</i>	Included in <i>P. crenulata</i> in Cronquist et al. (1984)	Nipple Bench phacelia	AnnF	LocEn	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>P. crenulata</i> var. <i>corrugata</i> . Type locality is Nipple Bench, Kane Co, UT (Welsh & Atwood 9809 BRY). USFWS: 3C
Iridaceae	<i>Sisyrinchium halophilum</i>		Nevada blue-eyed grass	PerF	Wide	FalsRep	Reports from CARE Herbarium and Northern Colorado Plateau Network (in ed.) are based on misidentified <i>S. demissum</i> .
Juglandaceae	<i>Carya illinoensis</i>		pecan	Tree	Intro	FalsRep	Reports from CARE Herbarium based on misidentified specimen of <i>Diospyros virginiana</i> . Native to E North America
Juncaceae	<i>Juncus nevadensis</i>	Includes vars. <i>badius</i> & <i>nevadensis</i>	Nevada rush	PerG	Wide	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>J. ensifolius</i> var. <i>montanus</i> .
Labiatae (Lamiaceae)	<i>Teucrium canadense</i> var. <i>occidentale</i>		American germander	PerF	Sparse	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>Mentha spicata</i> .
Leguminosae (Fabaceae)	<i>Astragalus castaneiformis</i>		chestnut milkvetch	PerG	Periph	FalsRep	Reports from CARE herbarium and Northern Colorado Plateau Network (in ed.) are based on misidentified specimens of <i>A. consobrinus</i> .
Leguminosae (Fabaceae)	<i>Astragalus chamaeleuce</i> var. <i>chamaeleuce</i>	<i>A. chamaeleuce</i> var. <i>chamaeleuce</i>	cicada milkvetch	PerF	RegEn	FalsRep	Reports from CARE are based on misidentified specimens of <i>A. laccoliticus</i> .

Appendix C. Rejected (falsely reported or questionable) taxa of Capitol Reef National Park, cont.

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Comments
Leguminosae (Fabaceae)	<i>Astragalus miser</i> var. <i>tenuifolius</i>		Garrett's weedy milkvetch	PerF	RegEn	FalsRep	Reports from the CARE Herbarium are based on misidentified specimens of <i>A. tenellus</i> . Also reported by Northern Colorado Plateau Network (in ed.).
Leguminosae (Fabaceae)	<i>Astragalus</i> <i>subcinereus</i> var. <i>basalticus</i>	Vars. not recognized in Barneby (1989)	basalt milkvetch	PerF	LocEn	FalsRep	Report from CARE based on BYU specimen of var. <i>sileranus</i> attributed to var. <i>basalticus</i> by the UT Conservation Data Center. Type locality is 10 mi S of Fremont Junction, Sevier Co, UT (Welsh, Isely, & Moore 6447 BRY). USFWS: former C2 candidate.
Leguminosae (Fabaceae)	<i>Astragalus</i> <i>subcinereus</i> var. <i>sileranus</i>	Vars. not recognized in Barneby (1989)	Siler's milkvetch	PerF	RegEn	FalsRep	Report for CARE from UT Conservation Data Center is based on a collection from Grand Staircase-Escalante National Monument. Type locality is Sink Valley (near Alton), Kane Co, UT (Jones s.n. POM).
Leguminosae (Fabaceae)	<i>Astragalus</i> <i>welshii</i>	Included in <i>A.</i> <i>loanus</i> by some authors	Welsh's milkvetch	PerF	LocEn	FalsRep	Report by UT Conservation Data Center based on a misidentified specimen of <i>A. musiniensis</i> . Type locality is W of Loa Pass, 0.8 mi E of Plute Co line, Wayne Co, UT (Welsh, Isely, & Moore 6473 BRY).
Leguminosae (Fabaceae)	<i>Dalea flavescens</i> var. <i>epica</i>	<i>D. epica</i> . Var. not recognized by Barneby (1989)	Hole-in-the-Rock prairie-clover	PerF	LocEn	FalsRep	Reports from CARE Herbarium and UT Conservation Data Center are based on specimens of var. <i>flavescens</i> . Type locality is 10 mi E of Halls Crossing, San Juan Co, UT (Welsh 5205 BRY). UT BLM: Sensitive, USFWS: former C2.
Leguminosae (Fabaceae)	<i>Hedysarum</i> <i>occidentale</i> var. <i>occidentale</i>		western sweetvetch	PerF	Periph	FalsRep	Reports from CARE Herbarium are misidentified <i>H. boreale</i> var. <i>boreale</i> .
Leguminosae (Fabaceae)	<i>Lathyrus</i> <i>brachycalyx</i> var. <i>brachycalyx</i>		Rydberg's sweetpea	PerF	RegEn	FalsRep	Reports from CARE Herbarium are misidentified <i>L. brachycalyx</i> var. <i>zionis</i> . Type locality is City Creek Canyon, Salt Lake Co, UT (Leonard 101 NY).
Leguminosae (Fabaceae)	<i>Lathyrus</i> <i>pauciflorus</i> var. <i>utahensis</i>		Utah sweetpea	PerF	RegEn	FalsRep	Reports from CARE Herbarium are misidentified <i>L. brachycalyx</i> var. <i>zionis</i> . Type locality is Salina Canyon, Sevier Co, UT (Jones 54411 POM)
Leguminosae (Fabaceae)	<i>Lupinus</i> <i>brevicaulis</i>		shortstem lupine	AnnF	Wide	FalsRep	Reports from CARE herbarium are misidentified <i>L. pusillus</i> var. <i>intermontanus</i> .
Liliaceae (Alliaceae)	<i>Allium textile</i>		textile onion	PerF	Wide	FalsRep	Reports from CARE Herbarium and Northern Colorado Plateau Network (in ed.) based on misidentified specimens of <i>A. macropetalum</i>

Appendix C. Rejected (falsely reported or questionable) taxa of Capitol Reef National Park, cont.

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Comments
Loasaceae	<i>Mentzelia integra</i>	<i>M. multiflora</i> var. <i>integra</i>	Virgin stickleaf	PerF	Wide	FalsRep	Reports from CARE herbarium based on misidentified specimens of <i>M. marginata</i> . Type locality is Rockville, Washington Co, UT (Jones 6082c)
Malvaceae	<i>Sphaeralcea ambigua</i> var. <i>ambigua</i>		Mohave globemallow	PerF	Wide	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>S. parvifolia</i> .
Malvaceae	<i>Sphaeralcea moorei</i>	<i>S. grossulariifolia</i> var. <i>moorei</i>	Moore's globemallow	PerF	LocEn	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>S. grossulariifolia</i> . Type locality is E side of Last Chance Bay, Lake Powell, Kane Co, UT (Welsh & Atwood 11597 BRY)
Najadaceae	<i>Najas guadalupensis</i>	<i>N. guadalupensis</i> ssp. <i>guadalupensis</i>	southern waternymph	AnnF	Periph	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>Chara</i> (stonewort algae).
Onagraceae	<i>Camissonia brevipes</i>		showy camissonia	AnnF	Periph	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>C. eastwoodiae</i> .
Onagraceae	<i>Camissonia claviformis</i> var. <i>claviformis</i>		clubpod camissonia	AnnF	RegEn	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>C. walkeri</i> .
Onagraceae	<i>Gayophytum humile</i>		low groundsmoke	AnnF	Periph	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>G. ramosissimum</i> .
Onagraceae	<i>Oenothera caespitosa</i> var. <i>macroglottis</i>		plains evening-primrose	PerF	Periph	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>O. caespitosa</i> var. <i>marginata</i> .
Onagraceae	<i>Oenothera pallida</i> var. <i>trichocalyx</i>		pale evening-primrose	PerF	RegEn	FalsRep	Reports from CARE are based on misidentified specimens of <i>O. albicaulis</i> .
Orchidaceae	<i>Spiranthes porrifolia</i>	<i>S. romanzoffiana</i> var. <i>porrifolia</i>	creamy ladies'-tresses	PerF	Wide	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>S. romanzoffiana</i> var. <i>diluvialis</i> .
Polemoniaceae	<i>Eriastrum diffusum</i>		spreading eriastrum	AnnF	Wide	FalsRep	Reports from CARE herbarium is based on misidentified specimens of <i>E. sparsiflorum</i> .
Polemoniaceae	<i>Gilia latifolia</i>	<i>G. latifolia</i> var. <i>latifolia</i> , <i>Aliciella latifolia</i>	spiny gilia	AnnF	RegEn	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>G. imperialis</i> . Type locality is valley of the Virgin River near St. George, Washington Co, UT (Parry 188 GH).

Appendix C. Rejected (falsely reported or questionable) taxa of Capitol Reef National Park, cont.

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Comments
Polemoniaceae	<i>Ipomopsis congesta</i> var. <i>congesta</i>	<i>Gilia congesta</i> var. <i>congesta</i>	ball-head gilia	PerF	Wide	Ques?	Reported by Northern Colorado Plateau Network, but Capitol Reef NP is outside the expected range of this species.
Polemoniaceae	<i>Linanthesastrum nuttallii</i>	<i>Linanthesastrum nuttallii</i> var. <i>nuttallii</i> , <i>Leptosiphon nuttallii</i> , <i>Linanthus nuttallii</i> ssp. <i>nuttallii</i>	Nuttall's linanthus	PerF	Wide	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>Leptodactylon pungens</i> . Also reported by Northern Colorado Plateau Network (in ed.).
Polemoniaceae	<i>Phlox lutescens</i>	<i>P. austromontana</i> var. <i>lutescens</i>	yellowish phlox	PerF	LocEn	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>P. austromontana</i> var. <i>austromontana</i> . Type locality is along the margin of Cataract Canyon, Garfield Co, UT (Welsh, Welsh, & Chatterley 21972 BRY).
Polemoniaceae	<i>Phlox muscooides</i>	<i>P. hoodii</i> ssp. <i>muscooides</i> , <i>P. bryoides</i>	moss phlox	PerF	Wide	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>Leptodactylon caespitosum</i> . Also reported by Northern Colorado Plateau Network (in ed.).
Polygonaceae	<i>Eriogonum cernuum</i> var. <i>viminale</i>	Vars. not recognized in <i>Flora of North America</i> (2005)	nodding wild buckwheat	AnnF	Periph	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>E. palmerianum</i> .
Polygonaceae	<i>Eriogonum clavellatum</i>		Comb Wash wild buckwheat	Shrub	RegEn	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>E. microthecum</i> var. <i>simpsonii</i> . USFWS: 3C.
Polygonaceae	<i>Eriogonum corymbosum</i> var. <i>revealianum</i>		Reveal's wild buckwheat	Shrub	LocEn	FalsRep	Reports from CARE herbarium and Northern Colorado Plateau Network (in ed.) based on misidentified specimens of <i>E. corymbosum</i> var. <i>helii</i> (newly described in 2005). Type locality is near milepost 26 S of Antimony, Garfield Co, UT (Welsh & Welsh 9389 BRY). USFWS: 3C.
Polygonaceae	<i>Eriogonum maculatum</i>		spotted wild buckwheat	AnnF	Wide	Ques?	Reported by Northern Colorado Plateau Network (in ed.), but Capitol Reef NP is well outside the expected range of this species.
Polygonaceae	<i>Eriogonum microthecum</i> var. <i>laxiflorum</i>		slender wild buckwheat	Shrub	Wide	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>E. microthecum</i> var. <i>simpsonii</i> .



Appendix C. Rejected (falsely reported or questionable) taxa of Capitol Reef National Park, cont.

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Comments
Polygonaceae	<i>Eriogonum subreniforme</i>		kidney-shaped wild buckwheat	AnnF	RegEn	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>E. palmerianum</i> . Type locality is Virgin River Valley, Washington Co, UT (Parry 237 ISC).
Polygonaceae	<i>Polygonum kelloggii</i>	<i>P. polygaloides</i> ssp. <i>kelloggii</i> , <i>P. kelloggii</i> var. <i>kelloggii</i>	Kellogg's knotweed	AnnF	Wide	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>P. douglasii</i> var. <i>douglasii</i> .
Potamogetonaceae	<i>Potamogeton foliosus</i> var. <i>foliosus</i>		leafy pondweed	PerF	Wide	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>P. filiformis</i> var. <i>occidentalis</i> .
Potamogetonaceae	<i>Potamogeton pusillus</i>	<i>P. pusillus</i> var. <i>pusillus</i>	dwarf pondweed	PerF	Wide	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>P. filiformis</i> var. <i>occidentalis</i> .
Rosaceae	<i>Fragaria vesca</i> var. <i>bracteata</i>		woodland strawberry	PerF	Wide	Ques?	Reported by Northern Colorado Plateau Network (in ed.), but Capitol Reef NP is outside the known range of this species. Report probably based on <i>F. virginiana</i> .
Rosaceae	<i>Malus ioensis</i>		Iowa crabapple	Tree	Intro	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>M. sylvestris</i> . Native to C North America.
Rosaceae	<i>Potentilla diversifolia</i> var. <i>diversifolia</i>		wedgeleaf cinquefoil	PerF	Wide	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>P. gracilis</i> var. <i>pulcherrima</i> . Also reported by Northern Colorado Plateau Network (in ed.).
Rosaceae	<i>Prunus americana</i>		American plum	Shrub	Intro	FalsRep	Reports from CARE Herbarium based on misidentified specimens of <i>P. domestica</i> . Native to C North America.
Rubiaceae	<i>Galium trifidum</i>	Includes ssp. <i>columbianum</i> , <i>trifidum</i> & <i>subbiflorum</i>	small bedstraw	PerF	Wide	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>G. multiflorum</i> var. <i>multiflorum</i> .
Salicaceae	<i>Salix geyeriana</i> var. <i>geyeriana</i>		Geyer's willow	Shrub	Wide	FalsRep	Reports from CARE Herbarium based on misidentified specimens of <i>S. eriocephala</i> var. <i>ligulifolia</i> .
Saxifragaceae (Hydrangeaceae)	<i>Fendlera rupicola</i>	<i>F. rupicola</i> var. <i>rupicola</i> , <i>F. falcata</i>	Fendlerbush	Shrub	Wide	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>Philadelphus microphyllus</i> .



Appendix C. Rejected (falsely reported or questionable) taxa of Capitol Reef National Park, cont.

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Comments
Saxifragaceae (Parnassiaceae)	<i>Parnassia parviflora</i>	<i>P. palustris</i> var. <i>parviflora</i>	marsh grass-of- Parnassus	PerF	Wide	FalsRep	Report from Meyer (1982) based on misidentified specimen of <i>P. palustris</i> var. <i>montanensis</i> . <i>P. parviflora</i> is not otherwise known from Utah.
Scrophulariaceae	<i>Orthocarpus purpureoalbus</i>	<i>O. purpureo-albus</i>	violet owl-clover	AnnF	RegEn	FalsRep	Reports from CARE Herbarium based on misidentified specimens of <i>Cordylanthus parviflorus</i> .
Scrophulariaceae	<i>Penstemon caespitosus</i> var. <i>perbrevis</i>		shortleaf penstemon	PerF	RegEn	FalsRep	Reports from CARE herbarium based on misidentified specimens of <i>P. caespitosus</i> var. <i>desertipicti</i> . Type locality is near Castle Gate, Carbon Co, UT (Pennell 6138 US).
Scrophulariaceae	<i>Penstemon cyanocaulis</i>		bluestem penstemon	PerF	RegEn	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>P. scariosus</i> var. <i>scariosus</i> .
Scrophulariaceae	<i>Penstemon leiophyllus</i> var. <i>leiophyllus</i>		Markagunt penstemon	PerF	LocEn	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>P. scariosus</i> var. <i>scariosus</i> . Type locality is Mammoth Creek, Markagunt Plateau, Garfield Co, UT (Jones 6026b US).
Scrophulariaceae	<i>Penstemon marcusii</i>		Marcus Jones' penstemon	PerF	LocEn	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>P. ophianthus</i> . Type locality is near Price, Carbon Co, UT (Jones s.n. POM).
Scrophulariaceae	<i>Penstemon platyphyllus</i>		broadleaf penstemon	PerF	LocEn	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>P. pachyphyllus</i> var. <i>congestus</i> . Type locality is Cottonwood Canyon, Salt Lake Co, UT (Watson 787 GH).
Scrophulariaceae	<i>Penstemon strictiformis</i>		Natural Bridges penstemon	PerF	RegEn	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>P. scariosus</i> var. <i>scariosus</i> . Also reported by Northern Colorado Plateau Network (in ed.).
Scrophulariaceae	<i>Penstemon virgatus</i>		upright blue penstemon	PerF	RegEn	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>P. ophianthus</i> . Not native to Utah.
Umbelliferae (Apiaceae)	<i>Lomatium nuttallii</i>	<i>L. megarrhizum</i> , <i>Aletes nuttallii</i>	Nuttall's desert parsley	PerF	RegEn	FalsRep	Reports from CARE Herbarium based on misidentified specimens of <i>L. junceum</i> . This species is not known from Utah, but is native to Wyoming and Nebraska.

**Appendix C. Rejected (falsely reported or questionable) taxa of Capitol Reef National Park, cont.**

Family	Species name	Synonyms/ Taxonomic notes	Common name	Life form	Range	Park status	Comments
Umbelliferae (Apiaceae)	<i>Lomatium scabrum</i> var. <i>scabrum</i>		rough lomatium	PerF	RegEn	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>L. parryi</i> . Type locality is Frisco, Beaver Co, UT (Jones 1864 US).
Umbelliferae (Apiaceae)	<i>Osmorhiza chilensis</i>	<i>O. berteroi</i>	Chilean sweet-cicely	PerF	Wide	FalsRep	Reports from CARE Herbarium are based on misidentified specimens of <i>O. depauperata</i> .
Violaceae	<i>Viola canadensis</i>	<i>V. canadensis</i> var. <i>rugulosa</i> , <i>V.</i> <i>scopulorum</i> , <i>V.</i> <i>rydbergii</i>	Canadian white violet	PerF	Wide	FalsRep	Reports from CARE Herbarium based on misidentified specimens of <i>V. adunca</i> . Also reported by Northern Colorado Plateau Network (in ed.).

The vascular plant species listed in this report have been reported for Capitol Reef National Park from published and unpublished literature (Heil et al. 1993, Meyer 1982, Northern Colorado Plateau Network, in ed.) or from herbarium specimens, but are now believed to be erroneous because of misidentifications (False Reports or FalsRep) or because the park is well outside the known or expected range of the species (Questionable or Ques?).

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<b>Trees</b>											
Aceraceae	<i>Acer negundo</i>	box elder	Native	Pres	Apr–Jun					x	
Betulaceae	<i>Betula occidentalis</i>	water birch	Native	Pres	Apr–May					x	
Betulaceae	<i>Betula pendula</i>	European white birch	Intro	Pres	Apr–May						Cultivated
Betulaceae	<i>Ostrya knowltonii</i>	western hop-hornbeam	Native	Pres	Jul					x	
Bignoniaceae	<i>Catalpa speciosa</i>	showy catalpa	Intro	Pres	May–Jun						Cultivated
Cupressaceae	<i>Juniperus scopulorum</i>	Rocky Mountain juniper	Native	Pres	NA			x	x		
Cupressaceae	<i>Thuja occidentalis</i>	white cedar	Intro	Pres	NA						Cultivated
Ebenaceae	<i>Diospyros virginiana</i>	common persimmon	Intro	Pres	May–Jun						Cultivated
Elaeagnaceae	<i>Elaeagnus angustifolia</i>	Russian olive	Intro	Pres	May–Jul					x	Disturbed areas
Fagaceae	<i>Quercus gambelii</i> var. <i>gambelii</i>	Gambel oak	Native	Pres	Apr–Jun		x	x	x		
Juglandaceae	<i>Juglans nigra</i>	black walnut	Intro	Pres	Apr–May						Cultivated
Juglandaceae	<i>Juglans regia</i>	English walnut	Intro	Pres	Apr–May						Cultivated
Leguminosae (Fabaceae)	<i>Gleditsia triacanthos</i>	honey locust	Intro	Pres	Apr–May						Cultivated
Leguminosae (Fabaceae)	<i>Robinia pseudoacacia</i>	black locust	Intro	Pres	May–Jun					x	Cultivated
Moraceae	<i>Maclura pomifera</i>	Osage orange	Intro	Pres	May						Cultivated
Moraceae	<i>Morus alba</i>	white mulberry	Intro	Pres	Apr–Jun						Cultivated
Oleaceae	<i>Fraxinus americana</i>	white ash	Intro	Pres	May–Jun						Cultivated
Oleaceae	<i>Fraxinus pennsylvanica</i>	green ash	Intro	Pres	Jun						Cultivated
Pinaceae	<i>Picea engelmannii</i>	Engelmann spruce	Native	Pres	NA				x		
Pinaceae	<i>Picea pungens</i>	blue spruce	Native	Pres	NA					x	
Pinaceae	<i>Pinus edulis</i>	two-needle pinyon	Native	Pres	NA		x	x	x		
Pinaceae	<i>Pinus flexilis</i>	limber pine	Native	Rep	NA			x	x		
Pinaceae	<i>Pinus longaeva</i>	western bristlecone pine	Native	Pres	NA				x		
Pinaceae	<i>Pinus ponderosa</i> var. <i>scopulorum</i>	ponderosa pine	Native	Pres	NA				x		
Pinaceae	<i>Pseudotsuga menziesii</i> var. <i>glauca</i>	Douglas-fir	Native	Pres	NA				x		
Rosaceae	<i>Cydonia oblonga</i>	quince	Intro	Pres	May						Cultivated
Rosaceae	<i>Malus floribunda</i>	showy crabapple	Intro	Pres	May						Cultivated

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Trees, cont.</i>											
Rosaceae	<i>Malus pumila</i>	common apple	Intro	Pres	May						Cultivated
Rosaceae	<i>Malus sylvestris</i>	crabapple	Intro	Pres	May						Cultivated
Rosaceae	<i>Prunus armeniaca</i>	apricot	Intro	Pres	Mar-Apr						Cultivated
Rosaceae	<i>Prunus avium</i>	sweet cherry	Intro	Pres	Apr-May						Cultivated
Rosaceae	<i>Prunus cerasifera</i>	flowering plum	Intro	Pres	Mar-Apr						Cultivated
Rosaceae	<i>Prunus cerasus</i>	sour cherry	Intro	Pres	Mar-Apr						Cultivated
Rosaceae	<i>Prunus domestica</i>	common plum	Intro	Pres	May						Cultivated
Rosaceae	<i>Prunus dulcis</i>	almond	Intro	Pres	Apr-May						Cultivated
Rosaceae	<i>Prunus persica</i>	peach	Intro	Pres	Apr-May						Cultivated
Rosaceae	<i>Pyrus communis</i>	common pear	Intro	Pres	Apr-May						Cultivated
Salicaceae	<i>Populus angustifolia</i>	narrow-leaved cottonwood	Native	Pres	Apr-Jun					x	
Salicaceae	<i>Populus fremontii</i> var. <i>fremontii</i>	Fremont cottonwood	Native	Pres	Mar-Jun					x	
Salicaceae	<i>Populus nigra</i>	black poplar	Intro	Pres	Apr-Jun						Cultivated
Salicaceae	<i>Populus tremuloides</i>	quaking aspen	Native	Pres	Mar-Jun				x	x	
Salicaceae	<i>Populus x intercurrents</i>	lance-leaf cottonwood	Native	Pres	Apr-Jun					x	
Salicaceae	<i>Salix amygdaloides</i>	peach-leaf willow	Native	Pres	Apr-Jun					x	
Salicaceae	<i>Salix babylonica</i>	weeping willow	Intro	Pres	May-Jun						
Salicaceae	<i>Salix gooddingii</i>	Goodding's black willow	Native	Pres	Apr-May					x	
Salicaceae	<i>Salix matsudana</i>	Matsuda's willow	Intro	Pres	Apr-May						Cultivated
Simaroubaceae	<i>Ailanthus altissima</i>	tree-of-heaven	Intro	Pres	Jun-Jul						Disturbed areas
Ulmaceae (Celtidaceae)	<i>Celtis occidentalis</i>	common hackberry	Intro	Pres	Apr-May						Cultivated
Ulmaceae (Celtidaceae)	<i>Celtis reticulata</i>	netleaf hackberry	Native	Pres	Apr-May	x				x	
Ulmaceae	<i>Ulmus parvifolia</i>	Chinese elm	Intro	Pres	Mar-Apr						Cultivated
Ulmaceae	<i>Ulmus pumila</i>	Siberian elm	Intro	Rep	Mar-Apr						
<b>Shrubs</b>											
Aceraceae	<i>Acer glabrum</i> var. <i>glabrum</i>	Rocky Mountain maple	Native	Pres	Apr-Jun		x	x	x		
Agavaceae	<i>Yucca angustissima</i>	narrowleaved yucca	Native	Pres	May-Jul	x	x	x	x		Sandy soils

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Shrubs, cont.</i>											
Agavaceae	<i>Yucca harrimaniae</i> var. <i>harrimaniae</i>	Harriman's yucca	Native	Pres	Apr–May	x	x	x			
Anacardiaceae	<i>Rhus aromatica</i> var. <i>simplicifolia</i>	squawbush	Native	Pres	May–Jul	x	x	x			
Anacardiaceae	<i>Rhus aromatica</i> var. <i>trilobata</i>	squawbush	Native	Pres	May–Jul					x	
Anacardiaceae	<i>Toxicodendron rydbergii</i>	western poison ivy	Native	Pres	May–Jun					x	
Berberidaceae	<i>Berberis thunbergii</i>	Thunberg's barberry	Intro	Pres	May						Cultivated
Berberidaceae	<i>Berberis vulgaris</i>	common barberry	Intro	Pres	May–Jun						Cultivated
Berberidaceae	<i>Mahonia fremontii</i>	Fremont's mahonia	Native	Pres	Apr–Jul	x	x	x			
Berberidaceae	<i>Mahonia repens</i>	Oregon-grape	Native	Pres	Apr–Jun		x	x	x	x	
Betulaceae	<i>Alnus incana</i> var. <i>occidentalis</i>	thinleaf alder	Native	Pres	Apr–May					x	
Caprifoliaceae	<i>Lonicera utahensis</i>	Utah honeysuckle	Native	Rep	Jun–Jul				x		
Caprifoliaceae (Adoxaceae)	<i>Sambucus caerulea</i>	blue elderberry	Native	Pres	May–Jul		x	x	x	x	
Caprifoliaceae	<i>Symphoricarpos longiflorus</i>	long-flower snowberry	Native	Pres	May–Jul	x	x	x	x	x	
Caprifoliaceae	<i>Symphoricarpos orbiculatus</i>	coralberry	Intro	Pres	May–Jul						Cultivated
Caprifoliaceae	<i>Symphoricarpos oreophilus</i> var. <i>utahensis</i>	mountain snowberry	Native	Pres	Jun–Aug		x		x		
Caprifoliaceae (Adoxaceae)	<i>Viburnum opulus</i>	snowball-bush	Intro	Pres	Jun–Jul						Cultivated
Celastraceae	<i>Pachystima myrsinites</i>	mountain-lover	Native	Pres	May–Aug		x	x	x		
Chenopodiaceae	<i>Allenrolfea occidentalis</i>	iodine bush	Native	Pres	Jul–Sep	x				x	
Chenopodiaceae	<i>Atriplex canescens</i> var. <i>canescens</i>	fourwing saltbush	Native	Pres	May–Sep	x	x	x			Sandy soils
Chenopodiaceae	<i>Atriplex confertifolia</i>	shadscale	Native	Pres	May–Sep	x	x	x			Clayey to gravelly soils
Chenopodiaceae	<i>Atriplex corrugata</i>	mat saltbush	Native	Pres	Apr–Sep	x					Mancos, Tropic, Morrison, & Duchesne River F.
Chenopodiaceae	<i>Atriplex gardneri</i> var. <i>cuneata</i>	Castle Valley saltbush	Native	Pres	May–Sep	x		x			Saline clays
Chenopodiaceae	<i>Grayia spinosa</i>	spiny hopsage	Native	Rep	Apr–Jul	x	x	x			

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Shrubs, cont.</i>											
Chenopodiaceae	<i>Krascheninnikovia lanata</i> var. <i>lanata</i>	winterfat	Native	Pres	May-Jul	x	x	x			
Chenopodiaceae (Sarcobataceae)	<i>Sarcobatus vermiculatus</i>	greasewood	Native	Pres	May-Aug	x					
Chenopodiaceae	<i>Zuckia brandegei</i> var. <i>arizonica</i>	Arizona siltbush	Native	Pres	Jun-Aug	x					Entrada, Morrison, & Duchesne F
Chenopodiaceae	<i>Zuckia brandegei</i> var. <i>brandegei</i>	Brandegee's siltbush	Native	Pres	Jun-Aug	x					Saline or seleniferous soils
Chenopodiaceae	<i>Zuckia brandegei</i> var. <i>plummeri</i>	Plummer's siltbush	Native	Pres	Jun-Aug	x					
Compositae (Asteraceae)	<i>Artemisia bigelovii</i>	Bigelow's sagebrush	Native	Pres	Aug-Oct		x	x			Rocky areas
Compositae (Asteraceae)	<i>Artemisia filifolia</i>	sand sagebrush	Native	Pres	Aug-Oct	x	x	x			
Compositae (Asteraceae)	<i>Artemisia frigida</i>	fringed sagebrush	Native	Pres	Jul-Sep	x	x	x	x		
Compositae (Asteraceae)	<i>Artemisia nova</i> var. <i>nova</i>	black sagebrush	Native	Pres	Sep-Oct	x	x	x			
Compositae (Asteraceae)	<i>Artemisia pygmaea</i>	pygmy sagebrush	Native	Pres	Aug-Sep	x	x	x	x		
Compositae (Asteraceae)	<i>Artemisia spinescens</i>	budsage	Native	Pres	Apr-Jun	x	x	x			Clayey to gravelly saline soils
Compositae (Asteraceae)	<i>Artemisia tridentata</i> var. <i>tridentata</i>	basin big sagebrush	Native	Pres	Jul-Sep		x	x			
Compositae (Asteraceae)	<i>Artemisia tridentata</i> var. <i>vaseyana</i>	mountain big sagebrush	Native	Rep	Jul-Sep		x	x	x		
Compositae (Asteraceae)	<i>Artemisia tridentata</i> var. <i>wyomingensis</i>	Wyoming big sagebrush	Native	Rep	Jul-Sep		x				
Compositae (Asteraceae)	<i>Baccharis salicina</i>	Rio Grande seepwillow	Native	Pres	May-Nov					x	
Compositae (Asteraceae)	<i>Brickellia atractyloides</i>	spiny brickellbush	Native	Pres	Apr-May	x					Rock crevices

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Shrubs, cont.</i>											
Compositae (Asteraceae)	<i>Brickellia californica</i>	California brickellbush	Native	Pres	Aug-Sep						Rock crevices
Compositae (Asteraceae)	<i>Brickellia longifolia</i>	longleaf brickellbush	Native	Pres	Aug-Sep					x	
Compositae (Asteraceae)	<i>Brickellia microphylla</i> var. <i>scabra</i>	rough brickellbush	Native	Pres	Aug-Oct	x	x	x			Sandstone
Compositae (Asteraceae)	<i>Brickellia oblongifolia</i> var. <i>linifolia</i>	Mohave brickellbush	Native	Pres	Jun-Aug	x	x	x	x		
Compositae (Asteraceae)	<i>Chrysothamnus depressus</i>	dwarf rabbitbrush	Native	Pres	Jul-Sep	x	x	x	x		
Compositae (Asteraceae)	<i>Chrysothamnus greenei</i>	Greene's rabbitbrush	Native	Pres	Jul-Sep	x	x	x			
Compositae (Asteraceae)	<i>Chrysothamnus linifolius</i>	spear-leaf rabbitbrush	Native	Pres	Jul-Sep					x	Sandy to saline soils
Compositae (Asteraceae)	<i>Chrysothamnus nauseosus</i> var. <i>bigelovii</i>	Bigelow's rabbitbrush	Native	Rep	Aug-Oct	x		x			Rocky areas
Compositae (Asteraceae)	<i>Chrysothamnus nauseosus</i> var. <i>consimilis</i>	greenish rabbitbrush	Native	Pres	Aug-Oct	x	x	x	x	x	
Compositae (Asteraceae)	<i>Chrysothamnus nauseosus</i> var. <i>gnaphalodes</i>	graystem rabbitbrush	Native	Pres	Aug-Oct	x	x	x			
Compositae (Asteraceae)	<i>Chrysothamnus nauseosus</i> var. <i>graveolens</i>	glabrate rabbitbrush	Native	Pres	Aug-Oct	x	x		x	x	
Compositae (Asteraceae)	<i>Chrysothamnus nauseosus</i> var. <i>junceus</i>	rush rabbitbrush	Native	Pres	Aug-Oct	x	x	x			
Compositae (Asteraceae)	<i>Chrysothamnus nauseosus</i> var. <i>leiospermus</i>	smoothseed rabbitbrush	Native	Pres	Aug-Oct	x	x	x	x		
Compositae (Asteraceae)	<i>Chrysothamnus nauseosus</i> var. <i>speciosus</i>	whitestem rabbitbrush	Native	Rep	Aug-Oct		x	x	x		
Compositae (Asteraceae)	<i>Chrysothamnus nauseosus</i> var. <i>turbinatus</i>	dune rabbitbrush	Native	Pres	Aug-Oct	x	x	x			
Compositae (Asteraceae)	<i>Chrysothamnus parryi</i> var. <i>nevadensis</i>	Nevada rabbitbrush	Native	Pres	Jul-Sep		x	x	x		
Compositae (Asteraceae)	<i>Chrysothamnus viscidiflorus</i> var. <i>lanceolatus</i>	lanceleaf rabbitbrush	Native	Pres	Jul-Sep		x	x	x		

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Shrubs, cont.</i>											
Compositae (Asteraceae)	<i>Chrysothamnus viscidiflorus</i> var. <i>puberulus</i>	puberulent rabbitbrush	Native	Pres	Jul-Sep	x	x	x	x		
Compositae (Asteraceae)	<i>Chrysothamnus viscidiflorus</i> var. <i>stenophyllus</i>	slenderleaf rabbitbrush	Native	Pres	Jul-Sep	x	x	x			
Compositae (Asteraceae)	<i>Chrysothamnus viscidiflorus</i> var. <i>viscidiflorus</i>	green rabbitbrush	Native	Pres	Jul-Sep	x	x	x	x		
Compositae (Asteraceae)	<i>Gutierrezia microcephala</i>	thread snakeweed	Native	Pres	Jul-Oct	x	x	x			
Compositae (Asteraceae)	<i>Gutierrezia sarothrae</i>	broom snakeweed	Native	Pres	Jul-Oct	x	x	x			
Compositae (Asteraceae)	<i>Haplopappus rusbyi</i>	Rusby's goldenbush	Native	Pres	Aug-Sep	x				x	
Compositae (Asteraceae)	<i>Oxytenia acerosa</i>	copperweed	Native	Pres	Jun-Oct					x	Saline soils
Compositae (Asteraceae)	<i>Tetradymia canescens</i>	spineless horsebrush	Native	Pres	Jun-Sep		x		x		
Compositae (Asteraceae)	<i>Tetradymia glabrata</i>	littleleaf horsebrush	Native	Pres	May-Jul	x	x	x			
Compositae (Asteraceae)	<i>Tetradymia spinosa</i>	shortspine horsebrush	Native	Pres	Apr-Jun	x	x	x			
Compositae (Asteraceae)	<i>Vancevea stylosa</i>	resinbush	Native	Pres	Jul-Sep	x	x	x			
Cornaceae	<i>Cornus sericea</i> var. <i>sericea</i>	red-osier dogwood	Native	Pres	May-Jul					x	
Crossosomataceae	<i>Glossopetalon spinescens</i> var. <i>microphyllum</i>	small-leaved greasebush	Native	Pres	Mar-Jun	x	x	x			
Cupressaceae	<i>Juniperus communis</i> var. <i>depressa</i>	common juniper	Native	Pres	NA				x		
Cupressaceae	<i>Juniperus osteosperma</i>	Utah juniper	Native	Pres	NA	x	x	x	x		
Elaeagnaceae	<i>Shepherdia argentea</i>	silver buffaloberry	Native	Pres	Apr-May					x	
Elaeagnaceae	<i>Shepherdia canadensis</i>	Canada buffaloberry	Native	Pres	May-Jul				x		
Elaeagnaceae	<i>Shepherdia rotundifolia</i>	roundleaf buffaloberry	Native	Pres	Mar-May	x	x	x	x		
Ephedraceae	<i>Ephedra torreyana</i>	Torrey's ephedra	Native	Pres	NA	x		x			
Ephedraceae	<i>Ephedra viridis</i> var. <i>viridis</i>	green ephedra	Native	Pres	NA	x	x	x			
Ephedraceae	<i>Ephedra viridis</i> var. <i>viscida</i>	Cutler's ephedra	Native	Pres	NA	x	x	x			Sandy soil



Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Shrubs, cont.</i>											
Ericaceae	<i>Arctostaphylos patula</i>	greenleaf manzanita	Native	Pres	Mar-Jul		x	x	x		
Fagaceae	<i>Quercus welschii</i>	shinnery oak	Native	Pres	Apr-Jun	x	x	x			Sandy soils
Labiatae (Lamiaceae)	<i>Poliomintha incana</i>	purple sage	Native	Pres	May-Jun	x	x	x			
Leguminosae (Fabaceae)	<i>Psoralea argemone</i>	Fremont's indigo-bush	Native	Pres	Apr-Jun	x		x			
Leguminosae (Fabaceae)	<i>Psoralea argemone</i>	Thompson's indigo-bush	Native	Rep	May-Aug	x	x				Sandy soils & boulders
Malvaceae	<i>Hibiscus syriacus</i>	rose-of-sharon	Intro	Pres	Jul-Sep						Cultivated
Oleaceae	<i>Fraxinus anomala</i>	singleleaf ash	Native	Pres	Apr-May	x		x	x		
Oleaceae	<i>Syringa vulgaris</i>	common lilac	Intro	Pres	May						Cultivated
Polemoniaceae	<i>Leptodactylon pungens</i>	prickly-phlox	Native	Pres	May-Jul	x	x	x	x		
Polygonaceae	<i>Eriogonum corymbosum</i> var. <i>aureum</i>	golden wild buckwheat	Native	Pres	Aug-Oct	x	x	x	x		
Polygonaceae	<i>Eriogonum corymbosum</i> var. <i>corymbosum</i>	crisp-leaf wild buckwheat	Native	Pres	Jul-Oct	x	x	x			
Polygonaceae	<i>Eriogonum corymbosum</i> var. <i>heilii</i>	Heil's wild buckwheat	Native	Pres	Jul-Aug				x		
Polygonaceae	<i>Eriogonum corymbosum</i> var. <i>orbiculatum</i>	rimrock wild buckwheat	Native	Pres	Aug-Oct	x	x	x			Sandstone
Polygonaceae	<i>Eriogonum leptocladon</i> var. <i>leptocladon</i>	sand wild buckwheat	Native	Pres	Jun-Oct	x	x	x			
Polygonaceae	<i>Eriogonum leptocladon</i> var. <i>ramosissimum</i>	San Juan wild buckwheat	Native	Pres	Jun-Oct	x	x	x			
Polygonaceae	<i>Eriogonum leptophyllum</i>	slenderleaf wild buckwheat	Native	Pres	Jul-Nov	x					
Rhamnaceae	<i>Ceanothus fendleri</i>	Fendler's mountain-lilac	Native	Pres	Jun-Aug			x	x		
Rhamnaceae	<i>Rhamnus betulifolia</i>	birchleaf buckthorn	Native	Pres	May-Jun					x	Rock crevices
Rosaceae	<i>Amelanchier alnifolia</i>	Saskatoon serviceberry	Native	Pres	May-Jul		x		x	x	
Rosaceae	<i>Amelanchier utahensis</i>	Utah serviceberry	Native	Pres	Apr-Jun		x	x	x	x	
Rosaceae	<i>Cercocarpus intricatus</i>	dwarf mountain mahogany	Native	Pres	Apr-Jun	x		x	x		Rock crevices
Rosaceae	<i>Cercocarpus ledifolius</i> var. <i>intermontanus</i>	curl-leaf mountain mahogany	Native	Pres	May-Jun			x	x		Rocky sites

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Shrubs, cont.</i>											
Rosaceae	<i>Cercocarpus montanus</i>	alder-leaf mountain mahogany	Native	Pres	May–Jun		x	x	x		
Rosaceae	<i>Coleogyne ramosissima</i>	blackbrush	Native	Pres	Apr–Jun	x					Shallow sandy to clay soil
Rosaceae	<i>Fallugia paradoxa</i>	Apache plume	Native	Pres	Apr–Aug	x	x	x		x	
Rosaceae	<i>Holodiscus dumosus</i>	bush oceanspray	Native	Pres	Jun–Aug		x	x	x		Rock crevices
Rosaceae	<i>Physocarpus alternans</i>	dwarf ninebark	Native	Pres	May–Aug	x		x	x		Rock crevices
Rosaceae	<i>Purshia mexicana</i> var. <i>stansburyana</i>	cliff-rose	Native	Pres	May–Jun	x	x	x	x		
Rosaceae	<i>Purshia tridentata</i>	antelope bitterbrush	Native	Pres	Apr–Jul		x	x	x		
Rosaceae	<i>Rosa woodsii</i>	Woods' rose	Native	Pres	May–Jul				x	x	
Salicaceae	<i>Salix boothii</i>	Booth's willow		Rep	May–Jun					x	
Salicaceae	<i>Salix eriocephala</i> var. <i>ligulifolia</i>	strapleaf willow	Native	Pres	Apr–Jun					x	
Salicaceae	<i>Salix eriocephala</i> var. <i>watsonii</i>	yellow willow	Native	Pres	Apr–Jun					x	
Salicaceae	<i>Salix exigua</i> var. <i>stenophylla</i>	coyote willow	Native	Pres	Apr–Aug					x	
Salicaceae	<i>Salix lasiolepis</i>	arroyo willow	Native	Pres	Apr–May					x	
Salicaceae	<i>Salix lucida</i> ssp. <i>caudata</i>	whiplash willow	Native	Pres	Apr–Jun					x	
Saxifragaceae (Hydrangeaceae)	<i>Fendlerella utahensis</i>	Utah fendlerella	Native	Pres	Apr–Sep		x	x	x		
Saxifragaceae (Hydrangeaceae)	<i>Philadelphus microphyllus</i>	littleleaf mock-orange	Native	Pres	May–Sep					x	
Saxifragaceae (Grossulariaceae)	<i>Ribes aureum</i>	golden currant	Native	Pres	Mar–Jul	x	x	x	x		
Saxifragaceae (Grossulariaceae)	<i>Ribes cereum</i> var. <i>inebrians</i>	wax currant	Native	Pres	Apr–Aug		x	x	x		
Saxifragaceae (Grossulariaceae)	<i>Ribes inerme</i>	whitestem gooseberry	Native	Pres	Apr–Jul					x	
Solanaceae	<i>Lycium andersonii</i>	Anderson's wolfberry	Native	Pres	Feb–May	x	x	x			
Tamaricaceae	<i>Tamarix chinensis</i>	five-stamen tamarisk	Intro	Pres	Apr–Sep					x	
Vitaceae	<i>Parthenocissus vitacea</i>	thicket-creeper	Native	Pres	May–Jul					x	
Vitaceae	<i>Vitis labrusca</i>	northern fox grape	Intro	Pres	May–Jun						Cultivated
<b>Perennial Forbs</b>											
Alismataceae	<i>Sagittaria cuneata</i>	northern arrowhead	Native	Pres	Jun–Sep					x	

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Forbs, cont.</i>											
Apocynaceae	<i>Amsonia jonesii</i>	Jones' amsonia	Native	Pres	Apr–Jun	x	x	x			
Apocynaceae	<i>Amsonia tomentosa</i> var. <i>stenophylla</i>	tomentose amsonia	Native	Pres	Apr–May	x	x				
Apocynaceae	<i>Apocynum cannabinum</i>	common dogbane	Native	Pres	Jun–Aug					x	
Apocynaceae	<i>Cycladenia humilis</i> var. <i>jonesii</i>	Jones' cycladenia	Native	Pres	May–Jun	x					Chinle, Cutler, Summerville F.
Asclepiadaceae	<i>Asclepias asperula</i> var. <i>asperula</i>	spider milkweed	Native	Pres	May–Jul	x	x	x	x		
Asclepiadaceae	<i>Asclepias cryptoceras</i> var. <i>cryptoceras</i>	pallid milkweed	Native	Pres	Apr–Jun	x	x	x			
Asclepiadaceae	<i>Asclepias labrifloris</i>	Circle Cliffs milkweed	Native	Pres	May–Aug	x	x	x			
Asclepiadaceae	<i>Asclepias latifolia</i>	broadleaf milkweed	Native	Pres	Jun–Aug	x	x	x	x		
Asclepiadaceae	<i>Asclepias macrosperma</i>	bigseed milkweed	Native	Pres	Apr–Jul	x	x	x			
Asclepiadaceae	<i>Asclepias ruthiae</i>	Ruth's milkweed	Native	Pres	Apr–Jun	x	x	x			
Asclepiadaceae	<i>Asclepias speciosa</i>	showy milkweed	Native	Pres	May–Aug					x	
Asclepiadaceae	<i>Asclepias subverticillata</i>	whorled milkweed	Native	Rep	May–Sep	x	x	x			Disturbed areas
Boraginaceae	<i>Cryptantha abata</i>	low cryptantha	Native	Pres	May–Jun		x	x	x		
Boraginaceae	<i>Cryptantha capitata</i>	head cryptantha	Native	Pres	May–Jun		x	x			
Boraginaceae	<i>Cryptantha cinerea</i> var. <i>cinerea</i>	ashy cryptantha	Native	Pres	May–Aug		x	x	x		
Boraginaceae	<i>Cryptantha cinerea</i> var. <i>jamesii</i>	James' cryptantha	Native	Pres	May–Aug	x	x	x	x		
Boraginaceae	<i>Cryptantha cinerea</i> var. <i>pustulosa</i>	San Juan cryptantha	Native	Pres	May–Aug	x	x	x			
Boraginaceae	<i>Cryptantha confertiflora</i>	basin yellow cryptantha	Native	Pres	Apr–Jun	x	x	x	x		
Boraginaceae	<i>Cryptantha flava</i>	plateau yellow cryptantha	Native	Pres	Apr–Jun	x	x	x			
Boraginaceae	<i>Cryptantha flavoculata</i>	yellow-eye cryptantha	Native	Pres	Apr–Jun		x	x	x		
Boraginaceae	<i>Cryptantha fulvocanescens</i>	plateau cryptantha	Native	Pres	May–Jun	x	x	x			Mancos Shale
Boraginaceae	<i>Cryptantha humilis</i>	dwarf cryptantha	Native	Pres	Apr–Jun	x	x	x			
Boraginaceae	<i>Cryptantha mensana</i>	carbon cryptantha	Native	Pres	May–Jun	x	x	x	x		
Boraginaceae	<i>Cryptantha osterhoutii</i>	Osterhout's cryptantha	Native	Pres	May–Jun	x		x			
Boraginaceae	<i>Cryptantha rollinsii</i>	Rollins' cryptantha	Native	Pres	May–Jun	x	x	x			
Boraginaceae	<i>Cryptantha setosissima</i>	bristly cryptantha	Native	Pres	May–Aug		x	x	x		
Boraginaceae	<i>Lithospermum incisum</i>	showy stoneseed	Native	Pres	Apr–Jul		x	x	x		

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Forbs, cont.</i>											
Boraginaceae	<i>Lithospermum multiflorum</i>	southwestern stoneseed	Native	Pres	Jun–Aug		x	x	x		
Boraginaceae (Ehretiaceae)	<i>Tiquilia latior</i>	matted tiquilia	Native	Pres	May–Aug	x	x	x			
Cactaceae	<i>Coryphantha vivipara</i> var. <i>arizonica</i>	Arizona pincushion	Native	Pres	Apr–Aug	x	x	x			
Cactaceae	<i>Echinocereus triglochidiatus</i> var. <i>melanacanthus</i>	claretcup	Native	Pres	Apr–Jun	x	x	x	x		
Cactaceae	<i>Opuntia basilaris</i> var. <i>heilii</i>	Heil's beavertail	Native	Pres	Mar–Apr	x					
Cactaceae	<i>Opuntia fragilis</i>	brittle pricklypear	Native	Pres	Jun–Jul		x	x	x	x	
Cactaceae	<i>Opuntia phaeacantha</i> var. <i>major</i>	large pricklypear	Native	Pres	Apr–Jul	x		x			
Cactaceae	<i>Opuntia polyacantha</i> var. <i>polyacantha</i>	plains pricklypear	Native	Pres	May–Jun	x	x	x	x		
Cactaceae	<i>Opuntia polyacantha</i> var. <i>rufispina</i>	rufous-spine pricklypear	Native	Pres	May–Jun	x	x	x			
Cactaceae	<i>Pediocactus simpsonii</i>	Simpson's hedgehog cactus	Native	Pres	May–Jul	x	x	x	x		
Cactaceae	<i>Pediocactus winkleri</i>	Winkler's pincushion cactus	Native	Pres	Mar–May	x					Dakota & Curtis F.
Cactaceae	<i>Sclerocactus whipplei</i> var. <i>roseus</i>	small-flower fishhook cactus	Native	Pres	Apr–May	x	x	x	x		
Cactaceae	<i>Sclerocactus wrightiae</i>	Wright's fishhook cactus	Native	Pres	Apr–May	x	x	x			Mancos, Dakota, Morrison, & Entrada F.
Campanulaceae	<i>Campanula parryi</i>	Parry's harebell	Native	Pres	Jun–Sep				x		
Campanulaceae	<i>Lobelia cardinalis</i> ssp. <i>graminea</i>	cardinal-flower	Native	Pres	Aug–Oct					x	
Cannabaceae	<i>Humulus lupulus</i> var. <i>neomexicanus</i>	common hops	Native	Pres	Jul–Aug					x	
Caryophyllaceae (Alsinaceae)	<i>Arenaria fendleri</i> var. <i>eastwoodiae</i>	Eastwood's sandwort	Native	Pres	May–Sep	x	x	x	x		
Caryophyllaceae (Alsinaceae)	<i>Arenaria fendleri</i> var. <i>glabrescens</i>	basin sandwort	Native	Rep	May–Aug	x	x	x	x		

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Forbs, cont.</i>											
Caryophyllaceae (Asteraceae)	<i>Cerastium fontanum</i>	mouse-ear chickweed	Intro	Pres	Apr-Sep					x	Disturbed areas
Caryophyllaceae	<i>Lychnis drummondii</i>	Drummond's catchfly	Native	Pres	May-Sep		x	x	x		
Caryophyllaceae (Asteraceae)	<i>Paronychia sessiliflora</i>	creeping nailwort	Native	Pres	May-Aug	x	x	x			
Caryophyllaceae	<i>Saponaria officinalis</i>	bouncing-bet	Intro	Pres	May-Sep						Disturbed areas
Caryophyllaceae (Asteraceae)	<i>Stellaria longipes</i> var. <i>longipes</i>	long-stalk starwort	Native	Pres	May-Aug		x		x		
Chenopodiaceae	<i>Bassia americana</i>	greenmolly	Native	Pres	Aug-Oct	x		x			
Commelinaceae	<i>Tradescantia occidentalis</i>	western spiderwort	Native	Pres	May-Aug		x	x	x		
Compositae (Asteraceae)	<i>Achillea millefolium</i> var. <i>lanulosa</i>	common yarrow	Native	Pres	May-Sep		x	x	x	x	
Compositae (Asteraceae)	<i>Agoseris glauca</i> var. <i>laciniata</i>	cutleaf agoseris	Native	Pres	May-Sep		x	x	x		
Compositae (Asteraceae)	<i>Antennaria microphylla</i>	small-leaf pussytoes	Native	Pres	Jun-Aug		x	x	x		
Compositae (Asteraceae)	<i>Antennaria parvifolia</i>	common pussytoes	Native	Pres	May-Jul		x	x	x		
Compositae (Asteraceae)	<i>Antennaria rosulata</i>	breaks pussytoes	Native	Rep	Jun-Aug		x		x		
Compositae (Asteraceae)	<i>Arctium minus</i>	burdock	Intro	Pres	Jul-Sep					x	Disturbed areas
Compositae (Asteraceae)	<i>Artemisia campestris</i> var. <i>scouleriana</i>	sand wormwood	Native	Pres	Jul-Sep	x	x	x			Sandy soils
Compositae (Asteraceae)	<i>Artemisia dracunculus</i> var. <i>glauca</i>	tarragon	Native	Pres	Jul-Oct	x	x	x	x		
Compositae (Asteraceae)	<i>Artemisia ludoviciana</i> var. <i>albula</i>	Louisiana wormwood	Native	Pres	Jul-Oct		x			x	
Compositae (Asteraceae)	<i>Artemisia ludoviciana</i> var. <i>mexicana</i>	Louisiana wormwood	Native	Pres	Jul-Oct			x	x	x	
Compositae (Asteraceae)	<i>Aster ascendens</i>	Pacific aster	Native	Pres	Jul-Oct		x	x	x		
Compositae (Asteraceae)	<i>Aster foliaceus</i> var. <i>parryi</i>	Parry's aster	Native	Pres	Jul-Sep				x		

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Forbs, cont.</i>											
Compositae (Asteraceae)	<i>Aster glaucodes</i>	blueleaf aster	Native	Pres	Jul-Sep		x	x	x	x	
Compositae (Asteraceae)	<i>Aster pauciflorus</i>	alkali aster	Native	Pres	May-Sep					x	
Compositae (Asteraceae)	<i>Aster spathulatus</i>	western aster	Native	Pres	Jul-Sep				x	x	
Compositae (Asteraceae)	<i>Aster welshii</i>	Welsh's aster	Native	Pres	Aug-Oct					x	
Compositae (Asteraceae)	<i>Bahia dissecta</i>	cutleaf	Native	Rep	Jul-Sep		x	x	x		
Compositae (Asteraceae)	<i>Bidens cernua</i>	nodding bur-marigold	Native	Pres	Jul-Sep					x	
Compositae (Asteraceae)	<i>Brickellia grandiflora</i>	tassel-flower brickellbush	Native	Pres	Jul-Oct			x	x		
Compositae (Asteraceae)	<i>Centaurea repens</i>	Russian knapweed	Intro	Pres	Jun-Sep					x	Disturbed areas
Compositae (Asteraceae)	<i>Chaenactis douglasii</i>	hoary dusty-maiden	Native	Pres	May-Sep	x	x	x	x		
Compositae (Asteraceae)	<i>Chaetopappa ericoides</i>	rose-heath	Native	Pres	May-Sep	x	x	x	x		
Compositae (Asteraceae)	<i>Chamaechaenactis scaposa</i>	Eastwood-plant	Native	Pres	May-Jun	x	x	x	x		
Compositae (Asteraceae)	<i>Chrysopsis villosa</i> var. <i>minor</i>	hispid golden-aster	Native	Pres	May-Sep	x	x	x	x		
Compositae (Asteraceae)	<i>Cirsium calcaireum</i> var. <i>bipinnatum</i>	wingless thistle	Native	Pres	Jun-Sep				x	x	
Compositae (Asteraceae)	<i>Cirsium calcaireum</i> var. <i>calcaireum</i>	Caineville thistle	Native	Pres	Jun-Sep					x	
Compositae (Asteraceae)	<i>Cirsium calcaireum</i> var. <i>pulchellum</i>	pretty thistle	Native	Pres	Jun-Sep		x	x	x	x	
Compositae (Asteraceae)	<i>Cirsium neomexicanum</i> var. <i>neomexicanum</i>	New Mexico thistle	Native	Pres	May-Jun	x	x	x			
Compositae (Asteraceae)	<i>Cirsium neomexicanum</i> var. <i>utahense</i>	Utah thistle	Native	Pres	May-Jun	x	x	x			

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Forbs, cont.</i>											
Compositae (Asteraceae)	<i>Cirsium scariosum</i> var. <i>scariosum</i>	elk thistle	Native	Rep	Jun–Aug					x	
Compositae (Asteraceae)	<i>Cirsium undulatum</i> var. <i>undulatum</i>	wavy-leaved thistle	Native	Pres	Jun–Sep						
Compositae (Asteraceae)	<i>Cirsium vulgare</i>	bull thistle	Intro	Pres	Jul–Aug						
Compositae (Asteraceae)	<i>Crepis runcinata</i> var. <i>glauca</i>	glaucous hawkbeard	Native	Pres	May–Aug					x	
Compositae (Asteraceae)	<i>Encliopsis nudicaulis</i> var. <i>nudicaulis</i>	nakedstem	Native	Pres	May–Jun	x	x	x			
Compositae (Asteraceae)	<i>Erigeron abajoensis</i>	Abajo daisy	Native	Pres	Jul–Sep			x	x		
Compositae (Asteraceae)	<i>Erigeron aphanactis</i> var. <i>congestus</i>	congested hairy daisy	Native	Pres	May–Jul		x	x	x		
Compositae (Asteraceae)	<i>Erigeron argentatus</i>	silver daisy	Native	Pres	May–Jun	x	x	x			
Compositae (Asteraceae)	<i>Erigeron caespitosus</i>	tufted fleabane	Native	Pres	Jun–Aug		x	x	x		
Compositae (Asteraceae)	<i>Erigeron compactus</i> var. <i>consimilis</i>	San Rafael daisy	Native	Pres	May–Jun	x		x			Moenkopi, Morrison, Summerville F
Compositae (Asteraceae)	<i>Erigeron divergens</i> var. <i>cinereus</i>	spreading daisy	Native	Pres	May–Sep		x			x	
Compositae (Asteraceae)	<i>Erigeron eatonii</i>	Eaton’s daisy	Native	Pres	May–Jul		x	x	x		
Compositae (Asteraceae)	<i>Erigeron flagellaris</i>	trailing daisy	Native	Pres	May–Aug		x	x	x		
Compositae (Asteraceae)	<i>Erigeron lonchophyllus</i>	longleaf daisy	Native	Pres	Jun–Sep					x	
Compositae (Asteraceae)	<i>Erigeron maguirei</i>	Maguire’s daisy	Native	Pres	Jun–Jul			x			Wingate & Navajo F
Compositae (Asteraceae)	<i>Erigeron pulcherrimus</i>	basin daisy	Native	Pres	May–Jun	x		x			
Compositae (Asteraceae)	<i>Erigeron pumilus</i> var. <i>concinus</i>	Navajo fleabane	Native	Pres	May–Aug	x	x	x	x		

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Forbs, cont.</i>											
Compositae (Asteraceae)	<i>Erigeron pumilus</i> var. <i>condensatus</i>	vernal daisy	Native	Pres	May–Aug		x	x	x		
Compositae (Asteraceae)	<i>Erigeron speciosus</i> var. <i>macranthus</i>	aspen daisy	Native	Pres	Jun–Aug		x		x		
Compositae (Asteraceae)	<i>Erigeron utahensis</i> var. <i>sparsiflorus</i>	slenderleaf daisy	Native	Pres	Jun–Sep	x		x			Sandstone
Compositae (Asteraceae)	<i>Erigeron utahensis</i> var. <i>utahensis</i>	Utah daisy	Native	Pres	Apr–Jun	x		x			
Compositae (Asteraceae)	<i>Euthamia occidentalis</i>	western goldenrod	Native	Pres	Jul–Oct					x	
Compositae (Asteraceae)	<i>Gaillardia pinnatifida</i>	Hopi blanketflower	Native	Pres	Apr–Aug	x		x			
Compositae (Asteraceae)	<i>Gaillardia spathulata</i>	basin blanketflower	Native	Pres	May–Oct	x					
Compositae (Asteraceae)	<i>Gnaphalium wrightii</i>	Wright's cudweed	Native	Pres	Aug–Oct				x		
Compositae (Asteraceae)	<i>Grindelia squarrosa</i> var. <i>quasiperennis</i>	curly-cup gumweed	Native	Pres	Jul–Sep					x	Disturbed areas
Compositae (Asteraceae)	<i>Haplopappus acaulis</i> var. <i>acaulis</i>	stemless goldenweed	Native	Pres	May–Jul		x	x	x		
Compositae (Asteraceae)	<i>Haplopappus armerioides</i> var. <i>armerioides</i>	thrift goldenweed	Native	Pres	May–Jun	x	x	x	x		
Compositae (Asteraceae)	<i>Helianthella microcephala</i>	purpledisk sunflower	Native	Pres	Jul–Sep		x	x	x		
Compositae (Asteraceae)	<i>Helianthus nuttallii</i>	Nuttall's sunflower	Native	Pres	Jul–Sep					x	
Compositae (Asteraceae)	<i>Hymenopappus filifolius</i> var. <i>cinereus</i>	common hyalineherb	Native	Pres	May–Oct	x	x	x	x		
Compositae (Asteraceae)	<i>Hymenoxys acaulis</i> var. <i>arizonica</i>	Arizona hymenoxys	Native	Pres	Apr–Jun	x	x	x	x		
Compositae (Asteraceae)	<i>Hymenoxys acaulis</i> var. <i>caespitosa</i>	lanate hymenoxys	Native	Rep	May–Jul		x	x			
Compositae (Asteraceae)	<i>Hymenoxys acaulis</i> var. <i>ivesiana</i>	Canyonlands hymenoxys	Native	Pres	Apr–Jun		x	x	x		



Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Forbs, cont.</i>											
Compositae (Asteraceae)	<i>Hymenoxys acaulis</i> var. <i>nana</i>	low hymenoxys	Native	Pres	May–Jun	x	x	x			
Compositae (Asteraceae)	<i>Hymenoxys richardsonii</i> var. <i>floribunda</i>	Colorado rubber-plant	Native	Pres	May–Aug	x	x	x	x		
Compositae (Asteraceae)	<i>Iva axillaris</i>	poverty-weed	Native	Pres	May–Sep	x		x	x	x	
Compositae (Asteraceae)	<i>Lygodesmia grandiflora</i> var. <i>arizonica</i>	Arizona rush-pink	Native	Pres	May–Jun	x	x	x			
Compositae (Asteraceae)	<i>Lygodesmia grandiflora</i> var. <i>dianthopsis</i>	western rush-pink	Native	Rep	May–Jun		x	x			
Compositae (Asteraceae)	<i>Lygodesmia grandiflora</i> var. <i>showy</i>	showy rush-pink	Native	Pres	May–Jun	x	x	x	x		
Compositae (Asteraceae)	<i>Machaeranthera canescens</i> var. <i>aristata</i>	aristate aster	Native	Pres	Jul–Oct	x	x	x	x		
Compositae (Asteraceae)	<i>Machaeranthera canescens</i> var. <i>hoary</i>	hoary aster	Native	Pres	May–Sep	x	x	x	x		
Compositae (Asteraceae)	<i>Machaeranthera grindelioides</i> var. <i>grindelioides</i>	gumweed aster	Native	Pres	May–Jul	x	x	x			
Compositae (Asteraceae)	<i>Parthenium ligulatum</i>	low feverfew	Native	Pres	Apr–Jun	x	x	x			
Compositae (Asteraceae)	<i>Petradoria pumila</i> var. <i>pumila</i>	rock-goldenrod	Native	Pres	Jul–Sep	x	x	x	x		
Compositae (Asteraceae)	<i>Platyschukhria integrifolia</i> var. <i>desert</i>	desert bahia	Native	Pres	May–Jun	x		x			
Compositae (Asteraceae)	<i>Psilostrophe sparsiflora</i>	greenstem paperflower	Native	Pres	May–Sep	x	x	x			
Compositae (Asteraceae)	<i>Senecio douglasii</i> var. <i>longilobus</i>	Douglas' groundsel	Native	Pres	May–Oct	x	x	x			
Compositae (Asteraceae)	<i>Senecio multilobatus</i>	basin groundsel	Native	Pres	Apr–Aug	x	x	x	x		
Compositae (Asteraceae)	<i>Senecio spartioides</i> var. <i>multicapitatus</i>	many-headed groundsel	Native	Pres	Jun–Oct	x		x		x	Saline soils
Compositae (Asteraceae)	<i>Senecio spartioides</i> var. <i>spartioides</i>	broom groundsel	Native	Pres	Jun–Oct	x	x	x	x		Sandy soils

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Forbs, cont.</i>											
Compositae (Asteraceae)	<i>Senecio streptanthifolius</i> var. <i>streptanthifolius</i>	Rocky Mountain groundsel	Native	Rep	Jun–Aug		x		x		
Compositae (Asteraceae)	<i>Solidago canadensis</i> var. <i>salebrosa</i>	Canadian goldenrod	Native	Pres	Aug–Oct					x	
Compositae (Asteraceae)	<i>Solidago simplex</i>	coast goldenrod	Native	Pres	Jul–Sep				x		
Compositae (Asteraceae)	<i>Solidago velutina</i>	three-nerve goldenrod	Native	Pres	Aug–Oct		x	x	x		
Compositae (Asteraceae)	<i>Stephanomeria runcinata</i>	desert wirelettuce	Native	Pres	Jul–Aug	x		x			
Compositae (Asteraceae)	<i>Stephanomeria tenuifolia</i> var. <i>tenuifolia</i>	slender wirelettuce	Native	Pres	Jun–Sep	x		x	x	x	
Compositae (Asteraceae)	<i>Taraxacum officinale</i>	common dandelion	Intro	Pres	Apr–Dec		x	x	x	x	Disturbed areas
Compositae (Asteraceae)	<i>Thelesperma subnudum</i> var. <i>alpinum</i>	alpine greenthread	Native	Pres	Jun–Jul			x	x		
Compositae (Asteraceae)	<i>Thelesperma subnudum</i> var. <i>subnudum</i>	scapose greenthread	Native	Pres	May–Aug	x	x	x			
Compositae (Asteraceae)	<i>Thymophylla pentachaeta</i> var. <i>belenidium</i>	scale glandweed	Native	Pres	Aug–Oct	x					
Compositae (Asteraceae)	<i>Townsendia aprica</i>	Last Chance townsendia	Native	Pres	Apr–May	x		x			Mancos Shale
Compositae (Asteraceae)	<i>Townsendia exscapa</i>	stemless townsendia	Native	Pres	May–Jun				x		
Compositae (Asteraceae)	<i>Townsendia incana</i>	hoary townsendia	Native	Pres	Apr–Jul	x	x	x			
Compositae (Asteraceae)	<i>Tragopogon dubius</i>	yellow salsify	Intro	Pres	May–Jul		x			x	Disturbed areas
Compositae (Asteraceae)	<i>Vernonia marginata</i>	plains ironweed	Intro	Pres	Sep					x	
Compositae (Asteraceae)	<i>Viguiera multiflora</i> var. <i>multiflora</i>	showy goldeneye	Native	Pres	Jun–Sep		x	x	x	x	
Compositae (Asteraceae)	<i>Wyethia scabra</i>	rough mule's-ears	Native	Pres	May–Aug	x	x	x	x		Sandy soils

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Forbs, cont.</i>											
Compositae (Asteraceae)	<i>Xylorhiza confertifolia</i>	Henrieville woodyaster	Native	Pres	May-Jul	x		x			Kaiparowits, Morrison, Moenkopi F
Compositae (Asteraceae)	<i>Xylorhiza tortifolia</i> var. <i>imberbis</i>	hurtleaf woodyaster	Native	Pres	Apr-Jun	x	x	x			
Compositae (Asteraceae)	<i>Xylorhiza venusta</i>	Cisco woodyaster	Native	Pres	Apr-Jun	x					Saline & seleniferous soils
Convolvulaceae	<i>Convolvulus arvensis</i>	field bindweed	Intro	Pres	Jun-Aug						Disturbed areas
Convolvulaceae	<i>Evolvulus nuttallianus</i>	evolvulus	Native	Pres	May-Jun	x	x				
Crassulaceae	<i>Sedum lanceolatum</i>	lance-leaved stonecrop	Native	Pres	Jun-Aug		x	x	x		
Cruciferae (Brassicaceae)	<i>Arabis demissa</i>	nodding rock cress	Native	Pres	May-Aug		x	x	x		
Cruciferae (Brassicaceae)	<i>Arabis drummondii</i>	Drummond's rockcress	Native	Pres	May-Sep		x		x		
Cruciferae (Brassicaceae)	<i>Arabis hirsuta</i>	hairy rockcress	Native	Pres	Jun-Aug		x	x	x		
Cruciferae (Brassicaceae)	<i>Arabis holboellii</i> var. <i>fendleri</i>	Fendler's rockcress	Native	Pres	Apr-Aug			x	x		
Cruciferae (Brassicaceae)	<i>Arabis holboellii</i> var. <i>pinetorum</i>	Holboell's rockcress	Native	Pres	May-Jul		x	x	x	x	
Cruciferae (Brassicaceae)	<i>Arabis holboellii</i> var. <i>secunda</i>	Holboell's rockcress	Native	Pres	May-Jul		x	x	x		
Cruciferae (Brassicaceae)	<i>Arabis perennans</i> var. <i>perennans</i>	perennial rockcress	Native	Pres	Mar-Jul	x	x	x	x		
Cruciferae (Brassicaceae)	<i>Arabis pulchra</i> var. <i>pallens</i>	desert rockcress	Native	Pres	Mar-Jun	x	x	x			
Cruciferae (Brassicaceae)	<i>Arabis selbyi</i>	Selby's rockcress	Native	Pres	May-Aug		x	x	x		
Cruciferae (Brassicaceae)	<i>Cardamine cordifolia</i> var. <i>cordifolia</i>	heartleaf bittercress	Native	Rep	Jun-Sep				x	x	
Cruciferae (Brassicaceae)	<i>Cardaria draba</i>	whitetop	Intro	Pres	May-Aug						Disturbed areas

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Forbs, cont.</i>											
Cruciferae (Brassicaceae)	<i>Caulanthus crassicaulis</i> var. <i>glaber</i>	smooth spindlestem	Native	Pres	May-Jul		x	x	x		
Cruciferae (Brassicaceae)	<i>Descurainia californica</i>	California tansy-mustard	Native	Pres	Jun-Sep		x	x	x		
Cruciferae (Brassicaceae)	<i>Draba aurea</i>	golden draba	Native	Pres	Jun-Aug		x		x		
Cruciferae (Brassicaceae)	<i>Draba stenoloba</i> var. <i>nana</i>	slender whitlow-grass	Native	Pres	Jun-Aug				x		
Cruciferae (Brassicaceae)	<i>Erysimum asperum</i> var. <i>purshii</i>	sand dune wallflower	Native	Pres	Apr-Aug	x	x	x	x		
Cruciferae (Brassicaceae)	<i>Erysimum inconspicuum</i>	shy wallflower	Native	Pres	Apr-Jul		x		x		
Cruciferae (Brassicaceae)	<i>Lepidium montanum</i> var. <i>jonesii</i>	Jones' pepperwort	Native	Pres	Apr-Sep	x	x	x			
Cruciferae (Brassicaceae)	<i>Nasturtium officinale</i>	watercress	Intro	Pres	May-Sep					x	
Cruciferae (Brassicaceae)	<i>Physaria acutifolia</i> var. <i>acutifolia</i>	sharp-leaf twinpod	Native	Pres	May-Jul	x	x	x	x		
Cruciferae (Brassicaceae)	<i>Physaria acutifolia</i> var. <i>purpurea</i>	purple twinpod	Native	Pres	May-Jul			x			
Cruciferae (Brassicaceae)	<i>Physaria intermedia</i>	Watson's bladderpod	Native	Pres	May-Aug		x	x	x		
Cruciferae (Brassicaceae)	<i>Physaria ludoviciana</i>	silver bladderpod	Native	Pres	May-Jun		x	x	x		
Cruciferae (Brassicaceae)	<i>Physaria newberryi</i>	Newberry's twinpod	Native	Pres	Mar-Jun	x		x	x		
Cruciferae (Brassicaceae)	<i>Physaria rectipes</i>	Colorado Plateau bladderpod	Native	Pres	Apr-Aug	x		x	x		
Cruciferae (Brassicaceae)	<i>Physaria wardii</i>	Ward's bladderpod	Native	Pres	Jun-Jul		x	x	x		
Cruciferae (Brassicaceae)	<i>Rorippa islandica</i> var. <i>glabra</i>	smooth yellowcress	Native	Rep	Jun-Sep					x	
Cruciferae (Brassicaceae)	<i>Schoenocrambe barnebyi</i>	Barneby's reed-mustard	Native	Pres	May	x					Chinle Formation

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Forbs, cont.</i>											
Cruciferae (Brassicaceae)	<i>Schoenocrambe linifolia</i>	flax-leaved plainsmustard	Native	Pres	Apr-Jul	x	x	x	x		
Cruciferae (Brassicaceae)	<i>Stanleya integrifolia</i>	smoothleaf prince's-plume	Native	Pres	Apr-Sep	x	x	x	x		
Cruciferae (Brassicaceae)	<i>Stanleya pinnata</i>	prince's-plume	Native	Pres	Apr-Sep	x	x	x			Often on seleniferous soils
Cruciferae (Brassicaceae)	<i>Stanleya viridiflora</i>	green prince's-plume	Native	Pres	May-Aug	x	x	x			
Cruciferae (Brassicaceae)	<i>Streptanthus cordatus</i>	heart-leaf jewelflower	Native	Pres	Apr-Jul	x	x	x	x		
Cruciferae (Brassicaceae)	<i>Thelypodopsis divaricata</i>	candelabra thelypod	Native	Pres	Apr-Jun	x		x			Mancos, Tropic, Dakota, Morrison, Chinle, & Moenkopi F
Cruciferae (Brassicaceae)	<i>Thelypodium integrifolium</i> var. <i>integrifolium</i>	entire-leaf thelypod	Native	Pres	Jun-Sep					x	
Euphorbiaceae	<i>Chamaesyce fendleri</i>	Fendler's spurge	Native	Pres	May-Sep	x	x	x	x		
Euphorbiaceae	<i>Euphorbia brachycera</i>	shorthorn spurge	Native	Pres	May-Jun		x	x	x	x	
Euphorbiaceae	<i>Tragia ramosa</i>	noseburn	Native	Rep	May-Aug	x	x	x			
Fumariaceae	<i>Corydalis aurea</i> var. <i>occidentalis</i>	golden corydalis	Native	Pres	Apr-Sep	x	x	x	x		
Gentianaceae	<i>Centaurium exaltatum</i>	Great Basin centaur	Native	Pres	Jun-Sep					x	
Gentianaceae	<i>Gentiana affinis</i> var. <i>affinis</i>	Rocky Mountain gentian	Native	Pres	Jul-Sep				x	x	
Gentianaceae	<i>Gentianella heterosepala</i>	Engelmann's gentian	Native	Pres	Jun-Aug		x		x		
Gentianaceae	<i>Swertia albomarginata</i>	white-margined swertia	Native	Pres	May-Jul	x	x	x			
Gentianaceae	<i>Swertia radiata</i>	elkweed	Native	Pres	Jun-Aug		x		x		
Geraniaceae	<i>Geranium caespitosum</i> var. <i>marginale</i>	small-leaf geranium	Native	Pres	Jun-Aug		x	x	x		
Geraniaceae	<i>Geranium richardsonii</i>	Richardson's crane's-bill	Native	Rep	Jun-Aug					x	
Hippuridaceae	<i>Hippuris vulgaris</i>	common mare's-tail	Native	Pres	Jun-Sep					x	

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Forbs, cont.</i>											
Hydrophyllaceae	<i>Phacelia rafaensis</i>	San Rafael phacelia	Native	Pres	Apr–Jun	x		x			Carmel, Chinle, Summerville, Moenkopi F
Iridaceae	<i>Iris missouriensis</i>	Rocky Mountain iris	Native	Pres	May–Jul					x	
Iridaceae	<i>Sisyrinchium demissum</i>	blue-eyed grass	Native	Pres	Apr–Aug					x	
Labiatae (Lamiaceae)	<i>Hedeoma drummondii</i>	mock pennyroyal	Native	Pres	May–Aug		x	x			
Labiatae (Lamiaceae)	<i>Lycopus asper</i>	rough bugleweed	Native	Pres	Jun–Aug					x	
Labiatae (Lamiaceae)	<i>Marrubium vulgare</i>	common horehound	Intro	Pres	May–Oct						Disturbed areas
Labiatae (Lamiaceae)	<i>Mentha arvensis</i> var. <i>glabrata</i>	field mint	Native	Pres	Jun–Sep					x	
Labiatae (Lamiaceae)	<i>Mentha piperita</i>	peppermint	Intro	Pres	Jul–Sep					x	
Labiatae (Lamiaceae)	<i>Mentha spicata</i>	spearmint	Intro	Pres	Jun–Aug					x	Cultivated
Labiatae (Lamiaceae)	<i>Monardella odoratissima</i>	stinking horsemint	Native	Rep	May–Aug		x	x	x		
Labiatae (Lamiaceae)	<i>Nepeta cataria</i>	catnip	Intro	Pres	Jun–Sep		x	x			
Labiatae (Lamiaceae)	<i>Salvia reflexa</i>	annual sage	Native	Pres	Jun–Sep	x	x	x		x	
Labiatae (Lamiaceae)	<i>Scutellaria galericulata</i>	little skullcap	Native	Pres	Jun–Aug					x	
Labiatae (Lamiaceae)	<i>Stachys palustris</i> var. <i>pilosa</i>	hairy hedge-nettle	Native	Pres	Jun–Aug					x	
Leguminosae (Fabaceae)	<i>Astragalus agrestis</i>	field milkvetch	Native	Pres	May–Aug		x		x		
Leguminosae (Fabaceae)	<i>Astragalus amphioxys</i> var. <i>amphioxys</i>	crescent milkvetch	Native	Pres	Mar–Jun	x		x			
Leguminosae (Fabaceae)	<i>Astragalus amphioxys</i> var. <i>vespertinus</i>	Sheldon's milkvetch	Native	Pres	Mar–Jun	x	x	x			
Leguminosae (Fabaceae)	<i>Astragalus asclepiadoides</i>	milkweed milkvetch	Native	Pres	May–Jun	x					
Leguminosae (Fabaceae)	<i>Astragalus barnebyi</i>	Barneby's milkvetch	Native	Pres	Apr–Jun		x	x			
Leguminosae (Fabaceae)	<i>Astragalus brandegei</i>	Brandegee's milkvetch	Native	Pres	May–Sep	x	x	x			
Leguminosae (Fabaceae)	<i>Astragalus calycosus</i> var. <i>calycosus</i>	Torrey's milkvetch	Native	Pres	Apr–Jul	x	x	x	x		
Leguminosae (Fabaceae)	<i>Astragalus ceramicus</i> var. <i>ceramicus</i>	painted milkvetch	Native	Pres	Apr–Jun	x	x	x		x	Sandy soils

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Forbs, cont.</i>											
Leguminosae (Fabaceae)	<i>Astragalus coltonii</i> var. <i>coltonii</i>	Colton's milkvetch	Native	Pres	Apr–Jun	x	x	x			
Leguminosae (Fabaceae)	<i>Astragalus consobrinus</i>	Bicknell milkvetch	Native	Pres	May–Jul		x	x			
Leguminosae (Fabaceae)	<i>Astragalus convallarius</i> var. <i>convallarius</i>	lesser rushy milkvetch	Native	Pres	May–Aug	x	x	x	x		
Leguminosae (Fabaceae)	<i>Astragalus desperatus</i> var. <i>petrophilus</i>	rockloving milkvetch	Native	Pres	May–Jul	x	x	x			
Leguminosae (Fabaceae)	<i>Astragalus episcopus</i>	bishop's milkvetch	Native	Pres	May–Jun		x	x			
Leguminosae (Fabaceae)	<i>Astragalus flavus</i> var. <i>argillosus</i>	clay milkvetch	Native	Pres	Apr–Jul	x					
Leguminosae (Fabaceae)	<i>Astragalus flavus</i> var. <i>flavus</i>	yellow milkvetch	Native	Pres	Apr–Jul	x		x			
Leguminosae (Fabaceae)	<i>Astragalus harrisonii</i>	Harrison's milkvetch	Native	Pres	Apr–Jun			x			Kayenta, Wingate, & Chinle F
Leguminosae (Fabaceae)	<i>Astragalus kentrophyta</i> var. <i>elatus</i>	tall kentrophyta	Native	Pres	Jun–Sep	x	x	x	x		
Leguminosae (Fabaceae)	<i>Astragalus laccoliticus</i>	lacolite milkvetch	Native	Pres	Apr–Jun	x	x	x			
Leguminosae (Fabaceae)	<i>Astragalus lentiginosus</i> var. <i>palans</i>	straggling milkvetch	Native	Pres	Apr–Jun	x	x	x			
Leguminosae (Fabaceae)	<i>Astragalus lonchocarpus</i>	great rushy milkvetch	Native	Pres	May–Jul	x		x			
Leguminosae (Fabaceae)	<i>Astragalus malacoides</i>	Kaiparowits milkvetch	Native	Pres	Apr–Jun	x	x	x			
Leguminosae (Fabaceae)	<i>Astragalus moencoppensis</i>	Moenkopi milkvetch	Native	Pres	May–Jul	x	x	x			
Leguminosae (Fabaceae)	<i>Astragalus mollissimus</i> var. <i>thompsoniae</i>	woolly milkvetch	Native	Pres	Feb–Jun	x	x	x			
Leguminosae (Fabaceae)	<i>Astragalus musiniensis</i>	Ferron milkvetch	Native	Pres	Apr–Jun	x	x	x			
Leguminosae (Fabaceae)	<i>Astragalus pardalinus</i>	panther milkvetch	Native	Pres	Apr–Jun		x	x			

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Forbs, cont.</i>											
Leguminosae (Fabaceae)	<i>Astragalus pattersonii</i>	Patterson's milkvetch	Native	Pres	May-Jul	x	x	x			
Leguminosae (Fabaceae)	<i>Astragalus praelongus</i> var. <i>praelongus</i>	stinking milkvetch	Native	Pres	Apr-Jul	x		x			
Leguminosae (Fabaceae)	<i>Astragalus sesquiflorus</i>	sandstone milkvetch	Native	Pres	May-Aug		x	x	x		
Leguminosae (Fabaceae)	<i>Astragalus tenellus</i>	pulse milkvetch	Native	Pres	May-Aug		x	x	x		
Leguminosae (Fabaceae)	<i>Astragalus wardii</i>	Ward's milkvetch	Native	Rep	May-Sep	x	x	x	x	x	
Leguminosae (Fabaceae)	<i>Astragalus woodruffii</i>	Woodruff's milkvetch	Native	Pres	May-Jun		x				Entrada
Leguminosae (Fabaceae)	<i>Astragalus zionis</i> var. <i>zionis</i>	Zion milkvetch	Native	Pres	Apr-Jun	x	x		x	x	
Leguminosae (Fabaceae)	<i>Dalea flavescens</i> var. <i>flavescens</i>	Kanab prairie-clover	Native	Pres	May-Jul	x	x	x			Sandy soils
Leguminosae (Fabaceae)	<i>Dalea oligophylla</i>	white prairie-clover	Native	Pres	May-Sep	x	x	x		x	Sandy soils
Leguminosae (Fabaceae)	<i>Glycyrrhiza lepidota</i>	Nuttall's licorice	Native	Pres	May-Jul					x	
Leguminosae (Fabaceae)	<i>Hedysarum boreale</i> var. <i>boreale</i>	northern sweetvetch	Native	Pres	May-Aug		x	x	x		
Leguminosae (Fabaceae)	<i>Lathyrus brachycalyx</i> var. <i>zionis</i>	Zion sweetpea	Native	Pres	Apr-Jun		x	x		x	Sandy soils
Leguminosae (Fabaceae)	<i>Lupinus argenteus</i> var. <i>argenteus</i>	silvery lupine	Native	Pres	May-Aug	x	x	x	x		
Leguminosae (Fabaceae)	<i>Lupinus argenteus</i> var. <i>rubicaulis</i>	subalpine lupine	Native	Pres	May-Aug				x	x	
Leguminosae (Fabaceae)	<i>Lupinus caudatus</i> var. <i>utahensis</i>	Utah lupine	Native	Pres	May-Aug		x	x	x		
Leguminosae (Fabaceae)	<i>Lupinus sericeus</i> var. <i>sericeus</i>	silky lupine	Native	Pres	May-Aug		x	x	x		
Leguminosae (Fabaceae)	<i>Medicago sativa</i>	alfalfa	Intro	Pres	May-Sep						Disturbed areas



Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Forbs, cont.</i>											
Leguminosae (Fabaceae)	<i>Melilotus officinalis</i>	yellow sweet-clover	Intro	Pres	May–Oct						Disturbed areas
Leguminosae (Fabaceae)	<i>Oxytropis borealis</i> var. <i>australis</i>	southern locoweed	Native	Pres	Jun–Aug		x	x	x		
Leguminosae (Fabaceae)	<i>Oxytropis deflexa</i> var. <i>sericea</i>	nodding locoweed	Native	Pres	Jun–Aug		x		x	x	
Leguminosae (Fabaceae)	<i>Oxytropis lambertii</i> var. <i>bigelovii</i>	Lambert's locoweed	Native	Pres	Apr–Sep		x	x			
Leguminosae (Fabaceae)	<i>Oxytropis oreophila</i> var. <i>juniperina</i>	Bicknell locoweed	Native	Pres	May–Aug			x	x		
Leguminosae (Fabaceae)	<i>Peteria thompsoniae</i>	Thompson's peteria	Native	Pres	Apr–Jun	x	x	x			
Leguminosae (Fabaceae)	<i>Psoralidium junceum</i>	rush scurfpea	Native	Pres	May–Jul	x	x				
Leguminosae (Fabaceae)	<i>Psoralidium lanceolatum</i> var. <i>lanceolatum</i>	lemon scurf-pea	Native	Pres	Apr–Aug		x				
Leguminosae (Fabaceae)	<i>Psoralidium lanceolatum</i> var. <i>stenophyllum</i>	slenderleaf scurfpea	Native	Pres	Apr–Aug		x				Sandy soils
Leguminosae (Fabaceae)	<i>Thermopsis montana</i>	montane golden pea	Native	Pres	May–Aug				x	x	
Leguminosae (Fabaceae)	<i>Trifolium fragiferum</i>	strawberry clover	Intro	Pres	May–Sep					x	Disturbed areas
Leguminosae (Fabaceae)	<i>Trifolium pratense</i>	red clover	Intro	Pres	May–Oct					x	Disturbed areas
Leguminosae (Fabaceae)	<i>Trifolium repens</i>	white clover	Intro	Pres	Apr–Sep					x	Disturbed areas
Leguminosae (Fabaceae)	<i>Vicia americana</i> var. <i>americana</i>	American vetch	Native	Pres	May–Aug		x	x	x		
Leguminosae (Fabaceae)	<i>Wisteria sinensis</i>	Chinese wisteria	Intro	Pres	May						Cultivated
Lentibulariaceae	<i>Utricularia vulgaris</i>	common bladderwort	Native	Pres	Jul–Aug					x	
Liliaceae (Alliaceae)	<i>Allium cernuum</i>	nodding onion	Native	Pres	Jun–Jul		x		x		
Liliaceae (Alliaceae)	<i>Allium macropetalum</i>	San Juan onion	Native	Pres	May–Jun	x		x			
Liliaceae (Alliaceae)	<i>Allium nevadense</i>	Nevada onion	Native	Pres	Apr–Jul	x	x	x			

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Forbs, cont.</i>											
Liliaceae (Themidaceae)	<i>Androstegium breviflorum</i>	pink funnel-lily	Native	Pres	Apr-May	x	x	x			Saline to seleniferous soils
Liliaceae (Asparagaceae)	<i>Asparagus officinalis</i>	asparagus	Intro	Pres	Jun-Jul					x	Disturbed areas
Liliaceae (Calochortaceae)	<i>Calochortus aureus</i>	golden mariposa	Native	Pres	May-Jun	x	x	x			
Liliaceae (Calochortaceae)	<i>Calochortus nuttallii</i>	sego-lily	Native	Pres	Jun-Jul	x	x	x	x		
Liliaceae (Anthericaceae)	<i>Eremocrinum albomarginatum</i>	sand lily	Native	Pres	Apr-Jun	x	x				
Liliaceae	<i>Fritillaria atropurpurea</i>	leopard-lily	Native	Pres	Apr-Jul	x	x	x	x		
Liliaceae (Convallariaceae or Ruscaceae)	<i>Smilacina stellata</i>	starry false Solomon's seal	Native	Pres	Apr-Jun		x	x	x	x	
Liliaceae (Melanthiaceae)	<i>Zigadenus elegans</i>	mountain death camas	Native	Pres	Jun-Aug				x	x	
Linaceae	<i>Linum perenne</i> ssp. <i>lewisii</i>	blue flax	Native	Pres	Apr-Aug		x	x	x		
Loasaceae	<i>Mentzelia marginata</i>	Colorado stickleaf	Native	Pres	Apr-Oct	x	x	x			
Loasaceae	<i>Mentzelia multiflora</i>	desert stickleaf	Native	Pres	Apr-Sep	x	x				
Loasaceae	<i>Mentzelia pterosperma</i>	wing-seed stickleaf	Native	Pres	Mar-Aug	x	x	x			
Malvaceae	<i>Sphaeralcea coccinea</i>	scarlet globemallow	Native	Pres	Apr-Oct	x	x	x	x		
Malvaceae	<i>Sphaeralcea grossulariifolia</i>	gooseberry-leaf globemallow	Native	Pres	Mar-Oct	x	x	x	x		
Malvaceae	<i>Sphaeralcea parvifolia</i>	small-leaf globemallow	Native	Pres	Mar-Oct	x	x	x			
Monotropaceae (Ericaceae)	<i>Pterospora andromedea</i>	woodland pinedrops	Native	Pres	Jun-Sep			x	x		
Nyctaginaceae	<i>Abronia fragrans</i>	fragrant sand-verbena	Native	Pres	Apr-Sep	x	x	x	x		
Nyctaginaceae	<i>Abronia nana</i>	low sand-verbena	Native	Pres	Apr-Sep	x	x	x			
Nyctaginaceae	<i>Allionia incarnata</i>	trailing four-o'clock	Native	Pres	Apr-Sep	x	x				
Nyctaginaceae	<i>Mirabilis linearis</i> var. <i>decipiens</i>	New Mexico umbrellawort	Native	Pres	Jun-Aug			x	x	x	
Nyctaginaceae	<i>Mirabilis linearis</i> var. <i>linearis</i>	narrow-leaf four-o'clock	Native	Pres	May-Aug	x	x	x	x	x	

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Forbs, cont.</i>											
Nyctaginaceae	<i>Mirabilis multiflora</i>	showy four-o'clock	Native	Pres	Apr-Jul	x		x			
Nyctaginaceae	<i>Mirabilis oxybaphoides</i>	spreading four-o'clock	Native	Pres	May-Sep			x		x	
Onagraceae	<i>Calylophus lavandulifolius</i>	lavender-leaf sundrops	Native	Pres	May-Aug	x	x	x	x		
Onagraceae	<i>Epilobium angustifolium</i> var. <i>canescens</i>	fireweed	Native	Rep	Jun-Sep		x		x		
Onagraceae	<i>Epilobium ciliatum</i>	northern willow-herb	Native	Pres	Jun-Aug					x	
Onagraceae	<i>Epilobium hornemannii</i> var. <i>hornemannii</i>	Hornemann's willow-herb	Native	Pres	Jun-Aug					x	
Onagraceae	<i>Oenothera caespitosa</i> var. <i>marginata</i>	long-tube evening-primrose	Native	Pres	Apr-Jun		x	x	x		
Onagraceae	<i>Oenothera caespitosa</i> var. <i>navajoensis</i>	Paria evening-primrose	Native	Pres	Apr-Jun	x	x	x			
Onagraceae	<i>Oenothera coronopifolia</i>	hairy-throat evening-primrose	Native	Pres	Jun-Aug		x	x	x		
Onagraceae	<i>Oenothera elata</i>	western evening-primrose	Native	Rep	Jun-Aug		x	x	x	x	
Onagraceae	<i>Oenothera howardii</i>	bronze evening-primrose	Native	Pres	May-Jul	x	x	x	x		
Onagraceae	<i>Oenothera longissima</i>	Bridges evening-primrose	Native	Pres	Jul-Sep					x	
Onagraceae	<i>Oenothera pallida</i> var. <i>pallida</i>	pale evening-primrose	Native	Pres	May-Jul	x	x	x	x		
Orchidaceae	<i>Corallorhiza maculata</i>	spotted coral-root	Native	Rep	Jun-Jul				x		
Orchidaceae	<i>Epipactis gigantea</i>	giant helleborine	Native	Pres	Apr-Aug					x	
Orchidaceae	<i>Habenaria hyperborea</i>	northern bog orchid	Native	Pres	Jun-Aug					x	
Orchidaceae	<i>Habenaria sparsiflora</i> var. <i>sparsiflora</i>	slender bog orchid	Native	Pres	Jun-Jul					x	
Orchidaceae	<i>Habenaria zothecina</i>	alcove bog-orchid	Native	Pres	Jul-Aug					x	
Orchidaceae	<i>Spiranthes romanzoffiana</i> var. <i>diluvialis</i>	Ute ladies'-tresses	Native	Ext	Jul-Sep					x	
Orobanchaceae	<i>Orobanche fasciculata</i>	clustered broomrape	Native	Pres	Jun-Jul	x	x	x	x		
Orobanchaceae	<i>Orobanche ludoviciana</i> var. <i>cooperi</i>	Cooper's broomrape	Native	Pres	May-Jul	x	x	x			
Papaveraceae	<i>Argemone munita</i> var. <i>rotundata</i>	armed prickly-poppy	Native	Rep	May-Sep	x	x	x			
Plantaginaceae	<i>Plantago lanceolata</i>	English plantain	Intro	Pres	May-Aug						x

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Forbs, cont.</i>											
Plantaginaceae	<i>Plantago major</i>	common plantain	Intro	Pres	May–Aug	x					Disturbed areas
Polemoniaceae	<i>Gilia caespitosa</i>	Rabbit Valley gilia	Native	Pres	Jun–Jul			x			Navajo Sandstone & Carmel F
Polemoniaceae	<i>Gilia subnuda</i>	carmine gilia	Native	Pres	May–Jun	x	x	x	x		
Polemoniaceae	<i>Gilia tenuis</i>	Mussentuchit gilia	Native	Pres	May–Jun	x	x	x			
Polemoniaceae	<i>Ipomopsis aggregata</i> var. <i>aggregata</i>	scarlet gilia	Native	Pres	May–Aug		x	x	x	x	
Polemoniaceae	<i>Ipomopsis congesta</i> var. <i>frutescens</i>	shrubby gilia	Native	Pres	Jun–Sep		x	x	x	x	Sandy soil
Polemoniaceae	<i>Ipomopsis longiflora</i>	long-flowered gilia	Native	Pres	May–Aug		x	x	x		
Polemoniaceae	<i>Ipomopsis roseata</i>	San Rafael gilia	Native	Pres	May–Jun	x	x	x			
Polemoniaceae	<i>Leptodactylon caespitosum</i>	matted prickly-phlox	Native	Pres	May–Jul		x	x	x		
Polemoniaceae	<i>Leptodactylon watsonii</i>	Watson's prickly-phlox	Native	Pres	May–Aug	x	x	x	x		
Polemoniaceae	<i>Phlox austromontana</i> var. <i>austromontana</i>	desert phlox	Native	Pres	Apr–Jun	x	x	x	x		
Polemoniaceae	<i>Phlox hoodii</i> var. <i>canescens</i>	carpet phlox	Native	Pres	Apr–Jun	x	x	x	x		
Polemoniaceae	<i>Phlox longifolia</i>	long-leaf phlox	Native	Pres	Apr–Jul	x	x	x	x		
Polemoniaceae	<i>Phlox pulvinata</i>	cushion phlox	Native	Rep	Jun–Aug		x		x		
Polygalaceae	<i>Polygala subspinosa</i>	cushion milkwort	Native	Pres	May–Jun	x	x	x	x		
Polygonaceae	<i>Eriogonum alatum</i>	winged wild buckwheat	Native	Pres	Jun–Oct		x	x			Sandy soils
Polygonaceae	<i>Eriogonum bicolor</i>	pretty wild buckwheat	Native	Pres	Apr–Jul	x	x	x			
Polygonaceae	<i>Eriogonum inflatum</i> var. <i>inflatum</i>	desert trumpet	Native	Pres	Mar–Oct	x		x			Sandy or gravelly soils
Polygonaceae	<i>Eriogonum microthecum</i> var. <i>simpsonii</i>	slender wild buckwheat	Native	Pres	Jun–Oct	x	x	x	x		
Polygonaceae	<i>Eriogonum ovalifolium</i>	cushion wild buckwheat	Native	Pres	Apr–Aug	x	x	x			
Polygonaceae	<i>Eriogonum racemosum</i> var. <i>racemosum</i>	redroot wild buckwheat	Native	Pres	Jun–Oct		x	x	x		
Polygonaceae	<i>Eriogonum shockleyi</i>	Shockley's wild buckwheat	Native	Pres	May–Aug	x	x	x			
Polygonaceae	<i>Eriogonum tumulosum</i>	Woodside wild buckwheat	Native	Pres	May–Jul		x	x			

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Forbs, cont.</i>											
Polygonaceae	<i>Eriogonum umbellatum</i> var. <i>subaridum</i>	arid wild buckwheat	Native	Pres	Jun–Oct		x	x	x		
Polygonaceae	<i>Rumex crispus</i>	curly dock	Intro	Pres	May–Sep					x	Disturbed areas
Polygonaceae	<i>Rumex hymenosepalus</i>	canaigre dock	Native	Pres	Apr–Jun	x	x				
Polygonaceae	<i>Rumex salicifolius</i> ssp. <i>triangulivalvis</i>	willow dock	Native	Pres	May–Sep	x	x	x	x		Disturbed areas
Portulacaceae	<i>Talinum brevifolium</i>	sausageleaf talinum	Native	Pres	Jun–Oct			x			Navajo & Cedar Mesa sandstone
Potamogetonaceae	<i>Potamogeton filiformis</i> var. <i>occidentalis</i>	slenderleaf pondweed	Native	Pres	Jul–Sep					x	
Primulaceae (Myrsinaceae)	<i>Glaux maritima</i>	sea-milkwort	Native	Pres	May–Jul					x	
Primulaceae	<i>Primula specuicola</i>	cave primrose	Native	Pres	Feb–Jul					x	
Ranunculaceae (Helleboraceae)	<i>Aconitum columbianum</i> var. <i>columbianum</i>	Columbian monkshood	Native	Rep	Jun–Aug				x	x	
Ranunculaceae (Helleboraceae)	<i>Actaea rubra</i>	red baneberry	Native	Rep	May–Aug				x	x	
Ranunculaceae (Helleboraceae)	<i>Aquilegia corulea</i>	Colorado columbine	Native	Pres	Jun–Aug		x	x	x		
Ranunculaceae (Helleboraceae)	<i>Aquilegia micrantha</i>	alcove columbine	Native	Pres	May–Jun					x	
Ranunculaceae	<i>Clematis columbiana</i>	Columbian virgin's-bower	Native	Pres	May–Sep		x		x		
Ranunculaceae	<i>Clematis ligusticifolia</i>	white virgin's-bower	Native	Pres	Jul–Aug					x	
Ranunculaceae (Helleboraceae)	<i>Delphinium andersonii</i> var. <i>scaposum</i>	pale larkspur	Native	Pres	Apr–Jun	x	x	x			
Ranunculaceae	<i>Ranunculus cymbalaria</i>	marsh buttercup	Native	Pres	May–Sep					x	
Ranunculaceae (Thalictraceae)	<i>Thalictrum fendleri</i>	Fendler's meadow-rue	Native	Pres	Jun–Aug				x	x	
Ranunculaceae (Thalictraceae)	<i>Thalictrum sparsiflorum</i>	few-flower meadow-rue	Native	Rep	Jun–Aug				x	x	
Rosaceae	<i>Fragaria virginiana</i>	Virginia strawberry	Native	Rep	Jun–Jul				x	x	
Rosaceae	<i>Petrophytum caespitosum</i>	rock spiraea	Native	Pres	Aug–Sep		x	x	x		Rock crevices

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Forbs, cont.</i>											
Rosaceae	<i>Potentilla anserina</i>	silverweed	Native	Rep	May–Aug					x	
Rosaceae	<i>Potentilla concinna</i> var. <i>bicrenata</i>	bicrenate cinquefoil	Native	Pres	May–Jun		x	x	x		
Rosaceae	<i>Potentilla crinita</i>	hair-tuft cinquefoil	Native	Pres	Jul–Aug		x	x	x		
Rosaceae	<i>Potentilla gracilis</i> var. <i>pulcherrima</i>	beautiful cinquefoil	Native	Pres	Jun–Aug		x		x		
Rosaceae	<i>Potentilla hippiana</i>	woolly cinquefoil	Native	Rep	Jul–Aug				x		
Rosaceae	<i>Potentilla pensylvanica</i>	Pennsylvania cinquefoil	Native	Pres	Jul–Aug		x		x		
Rubiaceae	<i>Galium multiflorum</i> var. <i>multiflorum</i>	shrubby bedstraw	Native	Pres	May–Aug	x	x	x	x	x	
Santalaceae	<i>Comandra umbellata</i> var. <i>pallida</i>	bastard toadflax	Native	Pres	Apr–Aug	x	x	x	x		
Saxifragaceae	<i>Heuchera parvifolia</i>	littleleaf alumroot	Native	Pres	May–Sep		x	x	x		
Saxifragaceae	<i>Heuchera rubescens</i>	red alumroot	Native	Rep	Apr–Sep		x	x	x		
Saxifragaceae (Parnassiaceae)	<i>Parnassia palustris</i> var. <i>montanensis</i>	marsh grass-of-Parnassus	Native	Pres	May–Oct					x	
Scrophulariaceae	<i>Castilleja chromosa</i>	desert paintbrush	Native	Pres	Apr–Jun	x	x	x			
Scrophulariaceae	<i>Castilleja linariifolia</i>	Wyoming paintbrush	Native	Pres	Jul–Aug		x	x	x		
Scrophulariaceae	<i>Castilleja scabrida</i> var. <i>scabrida</i>	Eastwood's paintbrush	Native	Pres	May–Jul	x	x	x	x		Sandstone
Scrophulariaceae	<i>Mimulus eastwoodiae</i>	Eastwood's monkey-flower	Native	Pres	May–Sep					x	Sandstone
Scrophulariaceae	<i>Mimulus glabratus</i> var. <i>utahensis</i>	glabrous monkeyflower	Native	Pres	Jun–Aug					x	
Scrophulariaceae	<i>Mimulus guttatus</i>	yellow monkeyflower	Native	Pres	Jun–Aug					x	
Scrophulariaceae	<i>Pedicularis centranthera</i>	dwarf lousewort	Native	Pres	Apr–Jun			x	x		
Scrophulariaceae	<i>Penstemon ambiguus</i> var. <i>laevisimus</i>	bush penstemon	Native	Pres	May–Aug	x	x	x	x		
Scrophulariaceae	<i>Penstemon angustifolius</i> var. <i>venosus</i>	veined penstemon	Native	Pres	May–Jun	x	x	x			
Scrophulariaceae	<i>Penstemon barbatus</i> var. <i>barbatus</i>	beardlip penstemon	Native	Pres	Jun–Jul				x		Sandy soils
Scrophulariaceae	<i>Penstemon caespitosus</i> var. <i>desertipicti</i>	painted penstemon	Native	Pres	May–Jul		x	x	x		Claron F
Scrophulariaceae	<i>Penstemon carnosus</i>	fleshy penstemon	Native	Pres	May–Jul	x	x	x			

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Forbs, cont.</i>											
Scrophulariaceae	<i>Penstemon comarrhenus</i>	dusty penstemon	Native	Pres	Jun–Aug		x	x	x		
Scrophulariaceae	<i>Penstemon eatonii</i> var. <i>eatonii</i>	Eaton's firecracker	Native	Pres	May–Jul	x	x	x	x		
Scrophulariaceae	<i>Penstemon eatonii</i> var. <i>undulosus</i>	undulate penstemon	Native	Pres	May–Jul	x	x	x	x		
Scrophulariaceae	<i>Penstemon moffatii</i>	Moffatt penstemon	Native	Pres	May–Jun	x	x	x			
Scrophulariaceae	<i>Penstemon ophianthus</i>	Loa penstemon	Native	Pres	May–Jun		x	x	x		
Scrophulariaceae	<i>Penstemon pachyphyllus</i> var. <i>congestus</i>	Rockville penstemon	Native	Pres	May–Jul	x	x	x	x		
Scrophulariaceae	<i>Penstemon palmeri</i> var. <i>eglandulosus</i>	Palmer's penstemon	Native	Pres	May–Aug		x	x	x		
Scrophulariaceae	<i>Penstemon rostriflorus</i>	beaked penstemon	Native	Pres	Jun–Aug	x	x	x	x		
Scrophulariaceae	<i>Penstemon scariosus</i> var. <i>scariosus</i>	plateau penstemon	Native	Pres	May–Jul		x	x	x		
Scrophulariaceae	<i>Penstemon strictus</i>	Rocky Mountain penstemon	Native	Pres	Jun–Aug		x	x	x		
Scrophulariaceae	<i>Penstemon utahensis</i>	Utah penstemon	Native	Pres	Apr–Jun	x	x	x			
Scrophulariaceae	<i>Verbascum thapsus</i>	woolly mullein	Intro	Rep	Jun–Aug		x	x	x		Disturbed areas
Scrophulariaceae	<i>Veronica americana</i>	American brooklime	Native	Pres	Jul–Aug					x	
Scrophulariaceae	<i>Veronica anagallis-aquatica</i>	water speedwell	Intro	Pres	Jun–Aug					x	
Solanaceae	<i>Physalis longifolia</i>	long-leaf ground-cherry	Native	Pres	Apr–Aug		x	x		x	
Solanaceae	<i>Solanum elaeagnifolium</i>	silverleaf nightshade	Intro	Pres	Apr–Aug	x	x				Disturbed areas
Umbelliferae (Apiaceae)	<i>Cicuta maculata</i> var. <i>angustifolia</i>	water-hemlock	Native	Pres	Jun–Sep					x	
Umbelliferae (Apiaceae)	<i>Cymopterus acaulis</i> var. <i>fendleri</i>	Fendler's cymopterus	Native	Pres	Apr–May	x	x	x			Sandy soils
Umbelliferae (Apiaceae)	<i>Cymopterus beckii</i>	Beck's spring-parsley	Native	Pres	Apr–Jun			x	x		
Umbelliferae (Apiaceae)	<i>Cymopterus bulbosus</i>	onion spring-parsley	Native	Pres	Apr–May	x	x	x			
Umbelliferae (Apiaceae)	<i>Cymopterus lemmonii</i>	Lemmon's spring-parsley	Native	Pres	Jul–Aug					x	

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Forbs, cont.</i>											
Umbelliferae (Apiaceae)	<i>Cymopterus purpurascens</i>	basin white-cup spring-parsley	Native	Pres	Mar–May	x	x	x	x		Sandy to heavy clay soils
Umbelliferae (Apiaceae)	<i>Cymopterus purpureus</i> var. <i>purpureus</i>	Colorado Plateau spring-parsley	Native	Pres	Apr–Jun	x	x	x	x		Sandy to heavy clay soils
Umbelliferae (Apiaceae)	<i>Ligusticum porteri</i>	southern ligusticum	Native	Rep	Jun–Aug		x		x		
Umbelliferae (Apiaceae)	<i>Lomatium junceum</i>	rush lomatium	Native	Pres	May	x	x	x	x		
Umbelliferae (Apiaceae)	<i>Lomatium parryi</i>	Parry's lomatium	Native	Pres	Apr–Jun	x	x	x	x		
Umbelliferae (Apiaceae)	<i>Lomatium triternatum</i> ssp. <i>platycarpum</i>	flat-seed lomatium	Native	Pres	May–Jul		x	x	x		
Umbelliferae (Apiaceae)	<i>Osmorhiza depauperata</i>	blunt sweet-cicely	Native	Rep	Jun–Jul				x	x	
Umbelliferae (Apiaceae)	<i>Perideridia montana</i> var. <i>borealis</i>	common yampah	Native	Rep	Jul–Aug		x		x	x	
Umbelliferae (Apiaceae)	<i>Sium suave</i>	water parsnip	Native	Rep	Jul–Aug					x	
Urticaceae	<i>Urtica dioica</i> var. <i>occidentalis</i>	stinging nettle	Native	Pres	Jul–Aug		x		x	x	
Verbenaceae	<i>Verbena bracteata</i>	prostrate vervain	Native	Pres	May–Sep		x	x	x		Disturbed areas
Violaceae	<i>Viola adunca</i>	hook-spur violet	Native	Pres	Mar–Aug				x		
Violaceae	<i>Viola nephrophylla</i>	northern bog violet	Native	Pres	Apr–Jul					x	
Viscaceae	<i>Arceuthobium divaricatum</i>	pinyon dwarf-mistletoe	Native	Pres	Aug–Sep			x			
Viscaceae	<i>Arceuthobium douglasii</i>	Douglas-fir dwarf-mistletoe	Native	Pres	Mar–May				x		
Viscaceae	<i>Arceuthobium vaginatum</i> var. <i>cryptopodium</i>	southwestern dwarf-mistletoe	Native	Pres	May–Jun				x		
Viscaceae	<i>Phoradendron juniperinum</i>	juniper mistletoe	Native	Pres	Jul–Sep			x			
Zannichelliaceae	<i>Zannichellia palustris</i>	horned pondweed	Native	Pres	Mar–Nov					x	
<b>Annual Forbs</b>											
Amaranthaceae	<i>Amaranthus albus</i>	tumble pigweed	Intro	Pres	Jun–Oct						Disturbed areas



Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Annual Forbs, cont.</i>											
Amaranthaceae	<i>Amaranthus blitoides</i>	prostrate pigweed	Native	Pres	Jun-Sep						Disturbed areas
Amaranthaceae	<i>Amaranthus retroflexus</i>	redroot pigweed	Intro	Pres	Jun-Sep						Disturbed areas
Boraginaceae	<i>Cryptantha circumscissa</i>	cushion cryptanth	Native	Pres	Apr-Jul	x	x	x			
Boraginaceae	<i>Cryptantha crassisejala</i> var. <i>elachantha</i>	thick-sealed cryptanth	Native	Pres	Apr-Jun	x	x	x			
Boraginaceae	<i>Cryptantha fendleri</i>	sand dune cryptanth	Native	Pres	May-Jul		x	x	x		
Boraginaceae	<i>Cryptantha gracilis</i>	slender cryptanth	Native	Pres	Apr-Jul	x	x	x			
Boraginaceae	<i>Cryptantha micrantha</i>	redroot cryptanth	Native	Pres	Mar-May	x	x	x			
Boraginaceae	<i>Cryptantha pterocarya</i> var. <i>pterocarya</i>	wing-nut cryptanth	Native	Pres	Apr-Jul	x	x	x			
Boraginaceae	<i>Cryptantha recurvata</i>	recurved cryptanth	Native	Pres	Apr-Jun	x	x	x			
Boraginaceae	<i>Heliotropium convolvulaceum</i>	bindweed heliotrope	Native	Pres	May-Sep	x	x				Sandy soils
Boraginaceae	<i>Lappula occidentalis</i> var. <i>cupulata</i>	cupseed stickseed	Native	Pres	Apr-Jun	x	x	x	x		Disturbed areas
Capparaceae (Cleomaceae)	<i>Cleome lutea</i>	yellow beeplant	Native	Pres	Apr-Sep	x	x	x			
Capparaceae (Cleomaceae)	<i>Cleome serrulata</i>	Rocky Mountain beeplant	Native	Pres	May-Oct					x	Disturbed areas
Capparaceae (Cleomaceae)	<i>Cleomella palmeriana</i> var. <i>palmeriana</i>	Palmer's stinkweed	Native	Pres	Apr-Oct	x					Mancos, Morrison, & Tropic F
Caryophyllaceae	<i>Silene antirrhina</i>	sleepy catchfly	Native	Pres	May-Aug	x		x			
Chenopodiaceae	<i>Atriplex argentea</i> var. <i>argentea</i>	silver orach	Native	Rep	Jun-Sep	x					
Chenopodiaceae	<i>Atriplex graciliflora</i>	Blue Valley orach	Native	Pres	Jun-Aug	x				x	Mancos & Tropic F.
Chenopodiaceae	<i>Atriplex powellii</i> var. <i>powellii</i>	Powell's orach	Native	Pres	Jun-Sep	x	x	x			
Chenopodiaceae	<i>Atriplex prostrata</i>	thinleaf orach	Native	Pres	Jun-Sep					x	
Chenopodiaceae	<i>Atriplex saccaria</i> var. <i>saccaria</i>	stalked orach	Native	Pres	Aug-Sep	x	x	x			Mancos & Morrison F
Chenopodiaceae	<i>Atriplex truncata</i>	wedge orach	Native	Pres	Jun-Sep	x				x	
Chenopodiaceae	<i>Bassia hyssopifolia</i>	five-horn smotherweed	Intro	Pres	Aug-Oct	x				x	Disturbed areas

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Annual Forbs, cont.</i>											
Chenopodiaceae	<i>Bassia scoparia</i>	summer-cypress	Intro	Pres	Aug-Oct		x	x		x	Disturbed areas
Chenopodiaceae	<i>Chenopodium album</i> var. <i>album</i>	lambquarter	Intro	Pres	Jun-Sep						Disturbed areas
Chenopodiaceae	<i>Chenopodium atrovirens</i>	mountain goosefoot	Native	Pres	Jul-Sep		x	x	x		
Chenopodiaceae	<i>Chenopodium desiccatum</i>	desert goosefoot	Native	Pres	Jun-Sep	x	x	x		x	
Chenopodiaceae	<i>Chenopodium fremontii</i> var. <i>incanum</i>	silvery goosefoot	Native	Pres	Jun-Aug	x		x	x		
Chenopodiaceae	<i>Chenopodium glaucum</i> var. <i>salinum</i>	oakleaf goosefoot	Native	Pres	Aug-Sep					x	
Chenopodiaceae	<i>Chenopodium graveolens</i> var. <i>neomexicanum</i>	New Mexico goosefoot	Native	Pres	Jul-Sep						Disturbed areas
Chenopodiaceae	<i>Chenopodium leptophyllum</i>	narrow-leaf goosefoot	Native	Pres	Jul-Sep	x	x		x	x	
Chenopodiaceae	<i>Corispermum americanum</i>	American bugseed	Native	Pres	Aug-Oct		x	x			Sandy soils
Chenopodiaceae	<i>Halogeton glomeratus</i>	halogeton	Intro	Pres	Jul-Aug	x		x			Disturbed areas
Chenopodiaceae	<i>Monolepis nuttalliana</i>	Nuttall's poverty-weed	Native	Pres	Apr-Jul	x	x	x	x		
Chenopodiaceae	<i>Salsola paulsenii</i>	barbwire Russian thistle	Intro	Pres	Jun-Sep						Disturbed areas
Chenopodiaceae	<i>Salsola tragus</i>	Russian thistle	Intro	Pres	Jun-Sep						Disturbed areas
Chenopodiaceae	<i>Suaeda calceoliformis</i>	broom seepweed	Native	Pres	Jul-Sep					x	
Chenopodiaceae	<i>Suaeda torreyana</i> var. <i>torreyana</i>	Torrey's seepweed	Native	Pres	Jun-Sep	x				x	
Compositae (Asteraceae)	<i>Ambrosia acanthicarpa</i>	bur ragweed	Native	Pres	Jul-Oct	x	x	x		x	Disturbed areas
Compositae (Asteraceae)	<i>Aster brachyactis</i>	rayless alkali aster	Native	Pres	Aug-Sep					x	
Compositae (Asteraceae)	<i>Aster frondosus</i>	leafy aster	Native	Pres	Aug-Oct					x	
Compositae (Asteraceae)	<i>Chaenactis stevioides</i>	stevia dusty-maiden	Native	Pres	Apr-Jul	x	x	x			
Compositae (Asteraceae)	<i>Conyza canadensis</i> var. <i>glabrata</i>	Canadian horseweed	Native	Pres	Jul-Sep					x	

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Annual Forbs, cont.</i>											
Compositae (Asteraceae)	<i>Dicoria brandegei</i>	Brandegee's sandplant	Native	Pres	Aug-Oct		x				
Compositae (Asteraceae)	<i>Dyssodia papposa</i>	pappose glandweed	Native	Pres	Aug-Sep						Sandy areas
Compositae (Asteraceae)	<i>Erigeron bellidiastrum</i>	pretty daisy	Native	Pres	May-Aug	x	x	x			
Compositae (Asteraceae)	<i>Glyptopleura marginata</i>	crustweed	Native	Pres	May-Jun	x	x				
Compositae (Asteraceae)	<i>Helianthus annuus</i> var. <i>lenticularis</i>	common sunflower	Native	Pres	Jun-Sep	x		x			Disturbed areas
Compositae (Asteraceae)	<i>Helianthus anomalus</i>	sand sunflower	Native	Rep	May-Sep	x	x	x			
Compositae (Asteraceae)	<i>Helianthus petiolaris</i> sp. <i>fallax</i>	prairie sunflower	Native	Pres	Jun-Sep	x	x	x		x	
Compositae (Asteraceae)	<i>Iva xanthifolia</i>	marsh-elder	Native	Pres	Aug-Oct					x	Disturbed areas
Compositae (Asteraceae)	<i>Lactuca serriola</i>	prickly lettuce	Intro	Pres	Jul-Sep		x	x			Disturbed areas
Compositae (Asteraceae)	<i>Lygodesmia spinosa</i>	thorny wirelettuce	Native	Pres	Jul-Sep	x	x	x	x		
Compositae (Asteraceae)	<i>Machaeranthera tanacetifolia</i>	tansyleaf aster	Native	Pres	May-Sep	x	x	x			
Compositae (Asteraceae)	<i>Malacothrix glabrata</i>	filiform desert-dandelion	Native	Pres	Apr-Jul	x	x	x			
Compositae (Asteraceae)	<i>Malacothrix sonchoides</i>	sowthistle desert-dandelion	Native	Pres	Apr-Jun	x	x	x			
Compositae (Asteraceae)	<i>Sonchus asper</i>	spiny-leaf sow-thistle	Intro	Pres	Jul-Oct					x	Disturbed areas
Compositae (Asteraceae)	<i>Stephanomeria exigua</i>	white-plume wirelettuce	Native	Pres	May-Sep	x	x	x			
Compositae (Asteraceae)	<i>Townsendia annua</i>	annual townsendia	Native	Pres	Apr-Jun	x	x				
Compositae (Asteraceae)	<i>Xanthium strumarium</i> var. <i>canadense</i>	rough cocklebur	Native	Pres	Apr-Oct					x	Disturbed areas

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Annual Forbs, cont.</i>											
Convolvulaceae	<i>Cuscuta pentagona</i>	field dodder	Native	Pres	Jul-Sep	x	x	x			
Cruciferae (Brassicaceae)	<i>Alyssum minus</i> var. <i>micranthum</i>	European madwort	Intro	Pres	Apr-Jul		x	x			
Cruciferae (Brassicaceae)	<i>Capsella bursa-pastoris</i>	shepherd's-purse	Intro	Pres	Apr-Sep						Disturbed areas
Cruciferae (Brassicaceae)	<i>Chorispora tenella</i>	blue mustard	Intro	Pres	Apr-Jun						Disturbed areas
Cruciferae (Brassicaceae)	<i>Descurainia incana</i> var. <i>sonnei</i>	mountain tansy-mustard	Native	Pres	Apr-Jul		x		x		
Cruciferae (Brassicaceae)	<i>Descurainia pinnata</i> var. <i>intermedia</i>	western tansy-mustard	Native	Pres	Mar-Aug		x	x			
Cruciferae (Brassicaceae)	<i>Descurainia pinnata</i> var. <i>osmarum</i>	western tansy-mustard	Native	Pres	Mar-Aug	x	x	x	x		
Cruciferae (Brassicaceae)	<i>Descurainia sophia</i>	flixweed	Intro	Pres	Mar-Aug	x	x	x			Disturbed areas
Cruciferae (Brassicaceae)	<i>Dithyrea wislizenii</i>	spectacle-pod	Native	Pres	Apr-Sep	x	x	x	x		Sandy soils
Cruciferae (Brassicaceae)	<i>Draba cuneifolia</i> var. <i>cuneifolia</i>	wedgeleaf draba	Native	Pres	Feb-Jul	x	x	x	x		
Cruciferae (Brassicaceae)	<i>Draba reptans</i>	dwarf draba	Native	Rep	Apr-Jul		x	x	x		
Cruciferae (Brassicaceae)	<i>Hutchinsia procumbens</i>	ovalpurse	Native	Pres	Apr-Jun					x	
Cruciferae (Brassicaceae)	<i>Lepidium densiflorum</i> var. <i>densiflorum</i>	prairie pepperwort	Native	Pres	May-Jul	x	x	x	x		
Cruciferae (Brassicaceae)	<i>Lepidium densiflorum</i> var. <i>ramosum</i>	prairie pepperwort	Native	Pres	May-Jul	x	x	x	x		
Cruciferae (Brassicaceae)	<i>Lepidium perfoliatum</i>	clasping pepperwort	Intro	Pres	May-Jul	x	x	x			Disturbed areas
Cruciferae (Brassicaceae)	<i>Malcolmia africana</i>	African mustard	Intro	Pres	Apr-Jul						Disturbed areas
Cruciferae (Brassicaceae)	<i>Rorippa tenerrima</i>	low yellowcress	Native	Pres	Jun-Sep					x	
Cruciferae (Brassicaceae)	<i>Sisymbrium altissimum</i>	tumble mustard	Intro	Pres	May-Aug						Disturbed areas

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Annual Forbs, cont.</i>											
Cruciferae (Brassicaceae)	<i>Streptanthella longirostris</i>	long-beak fiddle-mustard	Native	Pres	Mar–Jun	x	x	x			Sandy or clayey soils
Euphorbiaceae	<i>Chamaesyce glyptosperma</i>	ridge-seeded spurge	Native	Pres	Jun–Aug	x	x	x	x		Disturbed areas
Euphorbiaceae	<i>Chamaesyce parryi</i>	Parry's spurge	Native	Pres	May–Sep	x	x	x			
Geraniaceae	<i>Erodium cicutarium</i>	stork's-bill	Intro	Pres	Feb–Oct	x	x	x			Disturbed areas
Hydrophyllaceae	<i>Nama retrorsum</i>	Howell's nama	Native	Rep	May–Aug	x	x				
Hydrophyllaceae	<i>Phacelia crenulata</i> var. <i>corrugata</i>	corrugate phacelia	Native	Pres	May–Jun	x	x	x			
Hydrophyllaceae	<i>Phacelia demissa</i> var. <i>demissa</i>	brittle phacelia	Native	Pres	May–Jun	x	x	x			Chinle, Dakota, Mancos, Morrison, & Tropic F.
Hydrophyllaceae	<i>Phacelia ivesiana</i>	Ives' phacelia	Native	Pres	Apr–Jun	x	x	x			
Leguminosae (Fabaceae)	<i>Astragalus nuttallianus</i> var. <i>micranthiformis</i>	small-flowered milkvetch	Native	Pres	Apr–Jun	x	x	x			
Leguminosae (Fabaceae)	<i>Astragalus sabulorum</i>	gravel milkvetch	Native	Pres	Feb–Jul	x	x	x			
Leguminosae (Fabaceae)	<i>Lupinus pusillus</i> var. <i>intermontanus</i>	Great Basin lupine	Native	Pres	Apr–Jul	x	x	x			
Leguminosae (Fabaceae)	<i>Lupinus pusillus</i> var. <i>pusillus</i>	dwarf lupine	Native	Pres	Apr–Jul	x	x	x			Sandy soils
Leguminosae (Fabaceae)	<i>Medicago lupulina</i>	black medick	Intro	Pres	May–Oct					x	Disturbed areas
Leguminosae (Fabaceae)	<i>Melilotus alba</i>	white sweet-clover	Intro	Pres	May–Oct					x	Disturbed areas
Linaceae	<i>Linum aristatum</i>	broom-flax	Native	Pres	Apr–Jun	x	x	x	x		Sandy soils
Linaceae	<i>Linum puberulum</i>	downy flax	Native	Pres	May–Jun	x		x			
Loasaceae	<i>Mentzelia albicaulis</i>	white-stem blazingstar	Native	Pres	Apr–Aug	x	x	x	x		
Malvaceae	<i>Malva neglecta</i>	common mallow	Intro	Pres	Apr–Oct						Disturbed areas
Nyctaginaceae	<i>Tripterocalyx micranthus</i>	small-flower sandpuffs	Native	Pres	Apr–Sep	x	x				
Onagraceae	<i>Camissonia eastwoodiae</i>	Eastwood's camissonia	Native	Pres	Apr–Jun	x		x			

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Annual Forbs, cont.</i>											
Onagraceae	<i>Camissonia scapoidea</i> var. <i>scapoidea</i>	Paiute suncup	Native	Pres	May–Jun	x	x	x			
Onagraceae	<i>Camissonia walkeri</i>	Walker's camissonia	Native	Pres	Apr–Jun	x	x	x			
Onagraceae	<i>Gaura parviflora</i>	small-flowered gaura	Native	Pres	May–Aug					x	
Onagraceae	<i>Gayophytum ramosissimum</i>	branching groundsmoke	Native	Pres	May–Aug		x	x	x		
Onagraceae	<i>Oenothera albicaulis</i>	white-stem evening-primrose	Native	Pres	Mar–Jun	x		x			
Plantaginaceae	<i>Plantago patagonica</i>	woolly plantain	Native	Pres	Mar–Aug	x	x	x			
Polemoniaceae	<i>Eriastrum sparsiflorum</i>	few-flower eriastrum	Native	Pres	May–Aug	x	x	x			
Polemoniaceae	<i>Gilia imperialis</i>	cataract gilia	Native	Pres	Jun–Sep	x					
Polemoniaceae	<i>Gilia inconspicua</i>	shy gilia	Native	Pres	Apr–Jul	x	x	x			
Polemoniaceae	<i>Gilia leptomeria</i> var. <i>leptomeria</i>	common gilia	Native	Pres	May–Jun	x	x	x	x		
Polemoniaceae	<i>Gilia leptomeria</i> var. <i>micromeria</i>	common gilia	Native	Pres	May–Jun	x	x	x			
Polemoniaceae	<i>Ipomopsis gunnisonii</i>	Gunnison's gilia	Native	Pres	May–Jun	x	x	x			Sandy soils
Polemoniaceae	<i>Ipomopsis polycladon</i>	spreading gilia	Native	Pres	Apr–Jun	x	x	x			
Polemoniaceae	<i>Ipomopsis pumila</i>	dwarf gilia	Native	Pres	Apr–Jun	x	x	x			
Polygonaceae	<i>Eriogonum cernuum</i> var. <i>cernuum</i>	nodding wild buckwheat	Native	Pres	Apr–Oct	x	x	x	x		
Polygonaceae	<i>Eriogonum deflexum</i>	skeletonweed wild buckwheat	Native	Pres	Apr–Oct	x		x			
Polygonaceae	<i>Eriogonum flexum</i>	bent wild buckwheat	Native	Pres	Apr–Sep	x		x			
Polygonaceae	<i>Eriogonum gordonii</i>	Gordon's wild buckwheat	Native	Pres	May–Oct	x		x			
Polygonaceae	<i>Eriogonum hookeri</i>	Hooker's wild buckwheat	Native	Pres	Jun–Oct	x	x	x	x		
Polygonaceae	<i>Eriogonum inflatum</i> var. <i>fusifforme</i>	Grand Valley desert trumpet	Native	Pres	Apr–Jul	x					Clay soils
Polygonaceae	<i>Eriogonum palmerianum</i>	Palmer's wild buckwheat	Native	Pres	Mar–Oct	x	x	x			
Polygonaceae	<i>Eriogonum wetherillii</i>	Wetherill's wild buckwheat	Native	Pres	Apr–Oct	x		x			
Polygonaceae	<i>Polygonum aviculare</i>	yard knotweed	Intro	Pres	May–Oct						Disturbed areas

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Annual Forbs, cont.</i>											
Polygonaceae	<i>Polygonum douglasii</i> var. <i>johnstonii</i>	Sawatch knotweed	Native	Pres	Jun-Aug		x	x	x		
Polygonaceae	<i>Polygonum lapathifolium</i>	willow-weed	Intro	Pres	Jul-Nov					x	
Polygonaceae	<i>Rumex maritimus</i> var. <i>fuiginus</i>	golden dock	Native	Pres	May-Sep					x	
Portulacaceae	<i>Portulaca oleracea</i>	common purslane	Intro	Pres	Jun-Sep						Disturbed areas
Primulaceae	<i>Androsace septentrionalis</i>	pygmy-flower rock-jasmine	Native	Pres	May-Aug		x	x	x		
Ranunculaceae	<i>Ranunculus sceleratus</i> var. <i>multifidus</i>	blister buttercup	Native	Pres	May-Sep					x	
Ranunculaceae	<i>Ranunculus testiculatus</i>	bur buttercup	Intro	Pres	Mar-Jun	x	x	x			Disturbed areas
Rubiaceae	<i>Galium aparine</i> var. <i>echinospermon</i>	cleavers	Native	Pres	Apr-Jun	x	x	x	x		
Scrophulariaceae	<i>Castilleja exilis</i>	annual paintbrush	Native	Pres	Jun-Aug					x	
Scrophulariaceae	<i>Cordylanthus parviflorus</i>	smallflower bird's-beak	Native	Pres	Aug-Sep	x	x	x	x		
Scrophulariaceae	<i>Cordylanthus wrightii</i>	Wright's bird's-beak	Native	Pres	Jul-Sep	x	x	x	x		Sandy soils
Solanaceae	<i>Datura wrightii</i>	angel's trumpet	Native	Pres	Apr-Oct	x	x	x			
Solanaceae	<i>Nicotiana attenuata</i>	coyote tobacco	Native	Pres	Jun-Sep	x	x	x			
Solanaceae	<i>Nicotiana trigonophylla</i>	desert tobacco	Native	Pres	Mar-Oct	x					Rock crevices
Solanaceae	<i>Solanum sarrachoides</i>	ground-cherry nightshade	Intro	Pres	May-Oct						Disturbed areas
Solanaceae	<i>Solanum triflorum</i>	cut-leaf nightshade	Native	Pres	May-Sep	x	x	x			
Umbelliferae (Apiaceae)	<i>Anethum graveolens</i>	dill	Intro	Pres	Jul-Aug						
Zygophyllaceae	<i>Tribulus terrestris</i>	puncture vine	Intro	Pres	May-Sep						Disturbed areas
<b>Perennial Graminoids</b>											
Cyperaceae	<i>Carex athrostachya</i>	slender-beaked sedge	Native	Pres	May-Aug				x	x	
Cyperaceae	<i>Carex aurea</i>	golden sedge	Native	Pres	Apr-Aug					x	
Cyperaceae	<i>Carex douglasii</i>	Douglas' sedge	Native	Pres	Apr-Aug		x	x	x		
Cyperaceae	<i>Carex duriuscula</i>	narrowleaf sedge	Native	Rep	Jun-Jul		x	x			
Cyperaceae	<i>Carex filifolia</i>	threadleaf sedge	Native	Pres	Apr-Jul	x	x	x			

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Graminoids, cont.</i>											
Cyperaceae	<i>Carex geophila</i>	White Mountain sedge	Native	Pres	May–Aug			x	x		
Cyperaceae	<i>Carex hystericina</i>	bottlebrush sedge	Native	Pres	May–Jun					x	
Cyperaceae	<i>Carex microptera</i>	small-wing sedge	Native	Pres	Jun–Aug					x	
Cyperaceae	<i>Carex nebrascensis</i>	Nebraska sedge	Native	Pres	May–Jul					x	
Cyperaceae	<i>Carex occidentalis</i>	western sedge	Native	Pres	Jun–Aug				x		
Cyperaceae	<i>Carex pellita</i>	woolly sedge	Native	Pres	May–Sep					x	
Cyperaceae	<i>Carex praegracilis</i>	blackcreeper sedge	Native	Pres	May–Aug					x	
Cyperaceae	<i>Carex rossii</i>	Ross' sedge	Native	Pres	May–Aug		x	x	x		
Cyperaceae	<i>Carex vallicola</i>	valley sedge	Native	Rep	May–Jul		x		x		
Cyperaceae	<i>Eleocharis acicularis</i>	slender spikerush	Native	Pres	Jun–Sep					x	
Cyperaceae	<i>Eleocharis palustris</i>	common spikerush	Native	Pres	May–Aug					x	
Cyperaceae	<i>Eleocharis quinqueflora</i>	few-flower spikerush	Native	Pres	Jun–Aug					x	
Cyperaceae	<i>Scirpus acutus</i>	hardstem bulrush	Native	Pres	Jun–Aug					x	
Cyperaceae	<i>Scirpus americanus</i>	American bulrush	Native	Pres	Jun–Sep					x	
Cyperaceae	<i>Scirpus maritimus</i>	alkali bulrush	Native	Pres	Jun–Sep					x	
Cyperaceae	<i>Scirpus microcarpus</i>	panicked bulrush	Native	Rep	Jun–Aug					x	
Cyperaceae	<i>Scirpus pungens</i> var. <i>longispicatus</i>	three-square bulrush	Native	Pres	May–Aug					x	
Gramineae (Poaceae)	<i>Agropyron cristatum</i>	crested wheatgrass	Intro	Pres	Jun–Aug	x	x	x	x		Disturbed areas
Gramineae (Poaceae)	<i>Agrostis exarata</i>	spike bentgrass	Native	Pres	Jul–Aug					x	
Gramineae (Poaceae)	<i>Agrostis stolonifera</i>	redtop	Intro	Pres	Jun–Sep					x	
Gramineae (Poaceae)	<i>Alopecurus aequalis</i>	shortawn foxtail	Native	Pres	Jun–Aug					x	
Gramineae (Poaceae)	<i>Andropogon gerardii</i> var. <i>chrysocomus</i>	Hall's bluestem	Native	Pres	Jul–Sep		x	x	x	x	
Gramineae (Poaceae)	<i>Andropogon gerardii</i> var. <i>gerardii</i>	big bluestem	Native	Pres	Jul–Sep	x		x	x		
Gramineae (Poaceae)	<i>Andropogon glomeratus</i> var. <i>scabriglumis</i>	bushy bluestem	Native	Pres	Apr–Oct					x	
Gramineae (Poaceae)	<i>Aristida purpurea</i>	purple three-awn	Native	Pres	Mar–Sep	x	x	x	x		
Gramineae (Poaceae)	<i>Bothriochloa springfieldii</i>	Springfield's bluestem	Native	Pres	Jun–Oct	x	x	x		x	
Gramineae (Poaceae)	<i>Bouteloua curtipendula</i>	sideoats grama	Native	Pres	Jul–Sep	x	x	x	x		



Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Graminoids, cont.</i>											
Gramineae (Poaceae)	<i>Bouteloua eriopoda</i>	black grama	Native	Pres	Jun-Aug	x	x	x			
Gramineae (Poaceae)	<i>Bouteloua gracilis</i>	blue grama	Native	Pres	Jul-Sep	x	x	x	x		
Gramineae (Poaceae)	<i>Bromus anomalus</i>	nodding brome	Native	Rep	Jun-Aug		x	x	x		
Gramineae (Poaceae)	<i>Bromus ciliatus</i>	fringed brome		Rep	Jul-Sep				x		
Gramineae (Poaceae)	<i>Bromus inermis</i> var. <i>inermis</i>	smooth brome	Intro	Pres	Jun-Aug			x	x	x	Disturbed areas
Gramineae (Poaceae)	<i>Calamagrostis scopulorum</i>	Jones' reedgrass	Native	Pres	Jul-Aug				x	x	
Gramineae (Poaceae)	<i>Calamagrostis stricta</i>	slimstem reedgrass	Native	Pres	Jul-Aug					x	
Gramineae (Poaceae)	<i>Dactylis glomerata</i>	orchard grass	Intro	Pres	Jun-Aug		x		x		Disturbed areas
Gramineae (Poaceae)	<i>Distichlis spicata</i>	desert saltgrass	Native	Pres	Jun-Sep	x				x	
Gramineae (Poaceae)	<i>Elymus canadensis</i>	Canada wildrye	Native	Pres	Jul-Aug					x	
Gramineae (Poaceae)	<i>Elymus elymoides</i>	squirreltail	Native	Pres	May-Aug	x	x	x	x	x	
Gramineae (Poaceae)	<i>Elymus junceus</i>	Russian wildrye	Intro	Pres	Jun-Jul	x	x	x	x		Disturbed areas
Gramineae (Poaceae)	<i>Elymus lanceolatus</i>	thickspike wheatgrass	Native	Pres	Jun-Aug		x	x	x		
Gramineae (Poaceae)	<i>Elymus repens</i>	quackgrass	Intro	Pres	Jun-Aug				x	x	Disturbed areas
Gramineae (Poaceae)	<i>Elymus salinus</i>	Salina wildrye	Native	Pres	Jun-Jul	x	x	x			
Gramineae (Poaceae)	<i>Elymus smithii</i>	western wheatgrass	Native	Pres	Jun-Aug	x	x	x			
Gramineae (Poaceae)	<i>Elymus spicatus</i>	bluebunch wheatgrass	Native	Pres	Jun-Aug		x	x	x		
Gramineae (Poaceae)	<i>Elymus trachycaulus</i>	slender wheatgrass	Native	Pres	Jun-Aug		x		x	x	
Gramineae (Poaceae)	<i>Elymus x saundersii</i>	Saunders' wheatgrass	Native	Pres	Jul-Aug					x	
Gramineae (Poaceae)	<i>Enneapogon desvauxii</i>	spike pappusgrass	Native	Pres	Aug-Sep		x	x			Slickrock
Gramineae (Poaceae)	<i>Erioneuron pilosum</i>	hairy tridens	Native	Pres	May-Jul	x	x	x			
Gramineae (Poaceae)	<i>Erioneuron pulchellum</i>	fluffgrass	Native	Pres	Apr-Aug	x	x	x			
Gramineae (Poaceae)	<i>Festuca arundinacea</i>	tall fescue	Intro	Pres	May-Jul	x	x				Disturbed areas
Gramineae (Poaceae)	<i>Festuca ovina</i> var. <i>saximontana</i>	Rocky Mountain fescue	Native	Pres	Jul-Aug				x		
Gramineae (Poaceae)	<i>Festuca sororia</i>	ravine fescue	Native	Pres	Aug-Sep				x		
Gramineae (Poaceae)	<i>Glyceria striata</i>	fowl mannagrass	Native	Pres	Jul-Aug					x	
Gramineae (Poaceae)	<i>Hilaria jamesii</i>	galleta	Native	Pres	May-Aug	x	x	x			

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Graminoids, cont.</i>											
Gramineae (Poaceae)	<i>Hordeum jubatum</i>	foxtail barley	Native	Pres	Jun–Aug	x	x	x	x	x	Disturbed areas
Gramineae (Poaceae)	<i>Koeleria macrantha</i>	junegrass	Native	Pres	Jun–Aug		x	x	x		
Gramineae (Poaceae)	<i>Lolium perenne</i>	perennial ryegrass	Intro	Pres	Jun–Aug						Disturbed areas
Gramineae (Poaceae)	<i>Lycurus phleoides</i>	wolftail	Native	Pres	Jun–Aug		x	x			
Gramineae (Poaceae)	<i>Muhlenbergia andina</i>	foxtail muhly	Native	Pres	Jul–Sep				x		
Gramineae (Poaceae)	<i>Muhlenbergia asperifolia</i>	scratchgrass	Native	Pres	Jul–Aug					x	
Gramineae (Poaceae)	<i>Muhlenbergia pauciflora</i>	New Mexican muhly	Native	Pres	Aug–Sep	x	x	x	x		
Gramineae (Poaceae)	<i>Muhlenbergia pungens</i>	sandhill muhly	Native	Pres	Jul–Sep		x	x			
Gramineae (Poaceae)	<i>Muhlenbergia racemosa</i>	green muhly	Native	Pres	Jul–Sep					x	
Gramineae (Poaceae)	<i>Muhlenbergia thurberi</i>	Thurber's muhly	Native	Pres	Jul–Sep		x	x	x	x	
Gramineae (Poaceae)	<i>Onyopsis micrantha</i>	littleseed ricegrass	Native	Pres	Jun–Aug		x	x	x		
Gramineae (Poaceae)	<i>Panicum acuminatum</i>	bundle panicgrass	Native	Pres	Jul–Sep					x	Sandy soils
Gramineae (Poaceae)	<i>Panicum oligosanthes</i> var. <i>scribnerianum</i>	Scribner panicgrass	Native	Pres	Jun–Sep				x	x	
Gramineae (Poaceae)	<i>Panicum virgatum</i>	switchgrass	Native	Pres	Jun–Sep			x		x	
Gramineae (Poaceae)	<i>Phleum pratense</i>	timothy	Intro	Pres	Jun–Sep		x	x	x	x	Disturbed areas
Gramineae (Poaceae)	<i>Phragmites australis</i>	common reed	Native	Pres	Jul–Sep					x	
Gramineae (Poaceae)	<i>Poa compressa</i>	Canada bluegrass	Intro	Pres	Jun–Aug		x	x	x	x	
Gramineae (Poaceae)	<i>Poa fendleriana</i>	muttongrass	Native	Pres	May–Aug	x	x	x	x		
Gramineae (Poaceae)	<i>Poa palustris</i>	fowl bluegrass	Native	Pres	May–Aug					x	
Gramineae (Poaceae)	<i>Poa pratensis</i>	Kentucky bluegrass	Intro	Pres	May–Aug	x	x	x	x	x	Disturbed areas
Gramineae (Poaceae)	<i>Poa secunda</i>	Sandberg's bluegrass	Native	Pres	Apr–Sep	x	x	x	x	x	
Gramineae (Poaceae)	<i>Polypogon semiverticillatus</i>	water polypogon	Intro	Pres	Jul–Aug					x	
Gramineae (Poaceae)	<i>Puccinellia distans</i>	weeping alkaligrass	Intro	Pres	Jun–Aug	x				x	Disturbed areas
Gramineae (Poaceae)	<i>Puccinellia nuttalliana</i>	Nuttall's alkaligrass	Native	Pres	May–Aug	x				x	
Gramineae (Poaceae)	<i>Schedonnardus paniculatus</i>	tumble grass	Native	Pres	Jun–Aug						
Gramineae (Poaceae)	<i>Schizachne purpurascens</i>	false melic	Native	Pres	Jun–Aug				x	x	

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Graminoids, cont.</i>											
Gramineae (Poaceae)	<i>Schizachyrium scoparium</i>	little bluestem	Native	Pres	Jul-Sep		x	x	x	x	
Gramineae (Poaceae)	<i>Spartina gracilis</i>	alkali cordgrass	Native	Pres	Jun-Sep					x	
Gramineae (Poaceae)	<i>Sphenopholis obtusata</i>	prairie wedgegrass	Native	Pres	Jul-Sep				x	x	
Gramineae (Poaceae)	<i>Sporobolus airoides</i> var. <i>airoides</i>	alkali sacaton	Native	Pres	Jun-Aug	x	x	x		x	
Gramineae (Poaceae)	<i>Sporobolus contractus</i>	spike dropseed	Native	Pres	Jun-Sep		x	x			
Gramineae (Poaceae)	<i>Sporobolus cryptandrus</i>	sand dropseed	Native	Pres	Jun-Aug		x	x			
Gramineae (Poaceae)	<i>Sporobolus flexuosus</i>	mesa dropseed	Native	Pres	Jun-Sep	x	x	x			
Gramineae (Poaceae)	<i>Sporobolus giganteus</i>	giant dropseed	Native	Pres	Jun-Sep		x				
Gramineae (Poaceae)	<i>Stipa arida</i>	Mormon needlegrass	Native	Pres	May-Jul	x	x	x			
Gramineae (Poaceae)	<i>Stipa comata</i> var. <i>comata</i>	needle-and-thread	Native	Pres	May-Jul	x	x	x	x		
Gramineae (Poaceae)	<i>Stipa coronata</i> var. <i>parishii</i>	crested needlegrass	Native	Pres	Jun-Jul	x	x	x			
Gramineae (Poaceae)	<i>Stipa hymenoides</i>	Indian ricegrass	Native	Pres	May-Jul	x	x	x	x		
Gramineae (Poaceae)	<i>Stipa lettermanii</i>	Letterman's needlegrass	Native	Rep	Jul-Sep		x	x	x		
Gramineae (Poaceae)	<i>Stipa neomexicana</i>	New Mexico feathergrass	Native	Pres	Jun-Jul	x	x	x			
Gramineae (Poaceae)	<i>Stipa pinetorum</i>	pine needlegrass	Native	Pres	Jun-Aug		x	x	x		
Gramineae (Poaceae)	<i>Stipa scribneri</i>	Scribner needlegrass	Native	Pres	Jun-Aug			x			
Gramineae (Poaceae)	<i>Stipa speciosa</i>	desert needlegrass	Native	Pres	Apr-Jun	x	x	x			
Gramineae (Poaceae)	<i>Stipa x bloomeri</i>	Bloomer's ricegrass	Native	Pres	Jun-Aug	x	x	x			
Juncaceae	<i>Juncus alpinus</i>	northern rush	Native	Pres	Jul					x	
Juncaceae	<i>Juncus arcticus</i>	Baltic rush	Native	Pres	May-Jul					x	
Juncaceae	<i>Juncus ensifolius</i> var. <i>brunnescens</i>	Tracy's rush	Native	Pres	Jun-Aug					x	
Juncaceae	<i>Juncus ensifolius</i> var. <i>montanus</i>	mountain rush	Native	Pres	Jun-Aug					x	
Juncaceae	<i>Juncus longistylus</i>	longstyle rush	Native	Pres	Jun-Aug					x	
Juncaceae	<i>Juncus tenuis</i>	poverty rush	Native	Pres	Jun-Aug					x	
Juncaceae	<i>Juncus torreyi</i>	Torrey's rush	Native	Pres	Jun-Aug					x	
Juncaceae	<i>Triglochin concinnum</i> var. <i>debilis</i>	low arrowgrass	Native	Pres	May-Aug					x	
Juncaginaceae	<i>Triglochin maritima</i>	seaside arrowgrass	Native	Pres	May-Aug					x	
Typhaceae	<i>Typha domingensis</i>	southern cattail	Native	Pres	Jul-Aug					x	

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Perennial Graminoids, cont.</i>											
Typhaceae	<i>Typha latifolia</i>	broad-leaved cattail	Native	Pres	Jun-Aug					x	
<b>Annual Graminoids</b>											
Cyperaceae	<i>Cyperus squarrosus</i>	bearded flat-sedge	Native	Pres	Jun-Aug					x	
Gramineae (Poaceae)	<i>Aristida adscensionis</i>	sixweeks three-awn	Native	Pres	Mar-Sep	x					
Gramineae (Poaceae)	<i>Avena fatua</i> var. <i>sativa</i>	oats	Intro	Rep	Jun-Aug						Disturbed areas
Gramineae (Poaceae)	<i>Bouteloua barbata</i>	sixweeks grama	Native	Pres	Aug-Sep	x	x				
Gramineae (Poaceae)	<i>Bromus catharticus</i>	rescue grass	Intro	Pres	Mar-Jun					x	Disturbed areas
Gramineae (Poaceae)	<i>Bromus japonicus</i>	Japanese chess	Intro	Pres	Jun-Aug	x	x	x		x	
Gramineae (Poaceae)	<i>Bromus rubens</i>	red brome	Intro	Pres	Mar-Jun	x					
Gramineae (Poaceae)	<i>Bromus tectorum</i>	cheatgrass	Intro	Pres	May-Jul	x	x	x			Disturbed areas
Gramineae (Poaceae)	<i>Cenchrus longispinus</i>	field sandbur	Native	Pres	Jul-Sep						Disturbed areas
Gramineae (Poaceae)	<i>Echinochloa crus-galli</i>	barnyard-grass	Intro	Pres	Aug-Sep					x	Disturbed areas
Gramineae (Poaceae)	<i>Eragrostis pectinacea</i>	tufted lovegrass	Native	Pres	Jul-Aug						Disturbed areas
Gramineae (Poaceae)	<i>Festuca octoflora</i>	six-weeks fescue	Native	Pres	Apr-Jun	x	x	x	x	x	
Gramineae (Poaceae)	<i>Hordeum murinum</i>	rabbit barley	Intro	Pres	May-Jul		x				Disturbed areas
Gramineae (Poaceae)	<i>Hordeum pusillum</i>	little barley	Native	Pres	May-Aug	x	x	x			
Gramineae (Poaceae)	<i>Munroa squarrosa</i>	false buffalograss	Native	Pres	Jun-Sep	x	x	x			
Gramineae (Poaceae)	<i>Panicum capillare</i>	witchgrass	Native	Pres	Jun-Sep	x	x			x	
Gramineae (Poaceae)	<i>Panicum miliaceum</i>	broomcorn panicgrass	Intro	Pres	Jul-Aug						Disturbed areas
Gramineae (Poaceae)	<i>Poa bigelovii</i>	Bigelow's bluegrass	Native	Pres	Mar-May	x	x	x			
Gramineae (Poaceae)	<i>Polypogon monspeliensis</i>	rabbitfoot-grass	Intro	Pres	Jun-Aug					x	
Gramineae (Poaceae)	<i>Setaria glauca</i>	yellow bristlegrass	Intro	Pres	Jul-Sep						Disturbed areas
Gramineae (Poaceae)	<i>Setaria viridis</i>	green bristlegrass	Intro	Pres	Jun-Sep						Disturbed areas

Appendix D. Confirmed, historical, and reported taxa of Capitol Reef National Park, organized by life form with ecological notes, cont.

Family	Species name	Common name	Nativity	Park status	Flower time	Salt des	Sage	PJ	Mix con	Wet	Comments
<i>Annual Graminoids, cont.</i>											
Gramineae (Poaceae)	<i>Zea mays</i>	maize	Intro	Pres	Jul–Aug						Disturbed areas
Juncaceae	<i>Juncus bufonius</i>	toad rush	Native	Pres	Jun–Aug					x	
<b>Ferns and Allies</b>											
Equisetaceae	<i>Equisetum arvense</i>	field horsetail	Native	Pres	NA		x	x	x	x	
Equisetaceae	<i>Equisetum hyemale</i> var. <i>affine</i>	tall scouring-rush	Native	Pres	NA					x	
Equisetaceae	<i>Equisetum laevigatum</i>	smooth scouring-rush	Native	Pres	NA					x	
Polypodiaceae (Adiantaceae)	<i>Adiantum capillus-veneris</i>	southern maidenhair fern	Native	Pres	NA					x	
Polypodiaceae (Adiantaceae)	<i>Cheilanthes feei</i>	slender lip-fern	Native	Pres	NA		x	x	x		Rock crevices
Polypodiaceae (Adiantaceae, Sinopteridaceae)	<i>Pellaea limitanea</i>	border cloak-fern	Native	Pres	NA		x				Rock crevices
Polypodiaceae (Aspleniaceae)	<i>Cystopteris fragilis</i>	brittle bladder fern	Native	Pres	NA				x	x	
Polypodiaceae (Aspleniaceae)	<i>Dryopteris filix-mas</i>	male fern	Native	Pres	NA				x		Rock crevices
Polypodiaceae (Aspleniaceae, Woodsiaceae)	<i>Woodsia oregana</i>	Oregon woodsia	Native	Pres	NA		x	x	x		
Selaginellaceae	<i>Selaginella mutica</i>	blunt-leaf spike-moss	Native	Pres	NA		x	x	x		



The Department of the Interior protects and manages the nation's natural resources and cultural heritage; provides scientific and other information about those resources; and honors its special responsibilities to American Indians, Alaska Natives, and affiliated Island Communities.

NPS D-243, January 2009

National Park Service  
U.S. Department of the Interior



---

**Natural Resource Program Center**

1201 Oak Ridge Drive, Suite 150  
Fort Collins, Colorado 80525

[www.nature.nps.gov](http://www.nature.nps.gov)