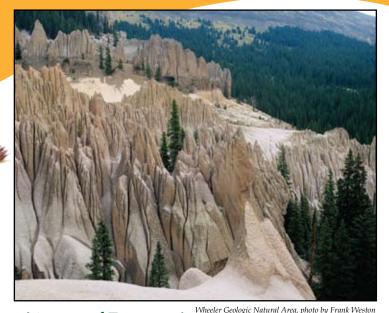
# 2009 Triennial Report to Governor Ritter Colorado Natural Areas Program





# Thirty Years of Protecting Colorado's Natural Treasures

he Colorado Natural Areas Program is a unique statewide agency that has protected Colorado's natural treasures since its inception in 1978. For thirty years, the most significant natural features in Colorado have been identified, monitored and conserved through voluntary land management agreements between the Natural Areas Program and federal, state, local or private landowners. Through cooperative work with landowners who wish to be good stewards of Colorado's natural treasures, this program provides an invaluable service to the citizens of Colorado by protecting our most significant natural features. Colorado's best rare animal habitats, rare plant habitats, unique ecosystems, geologic sites and fossil localities are protected in the Natural Areas system.

Through the passage of the Natural Areas Act in the late 1970s, the Colorado General Assembly recognized that the best places in Colorado are "increasingly threatened with irreversible change and are in need of special identification and protection." Now more than ever, the Colorado Natural Areas Program fulfills the role of a persistent steward, working cooperatively to alleviate growing threats to the most significant natural features in Colorado. As required in the Natural Areas Act, the Natural Areas Program submits this report to Governor Ritter documenting our recent accomplishments and highlighting the best places in Colorado.



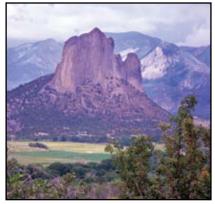
### Colorado Natural Areas Program



Colorado State Parks



Printed by Friends of the Colorado Natural Areas Program



Needle Rock Natural Area photo by Frank Weston

The Colorado Tourism Office has identified 98 destinations highlighted for their natural beauty. 34 Natural Areas are included in these top tourist destinations, where the Colorado Natural Areas Program is working to protect sensitive features and keep the most attractive areas in the state in pristine condition.



ver the past three years, the Colorado Natural Areas Program has maximized its budget and staff to conserve Colorado's most significant natural features. With 1.5 full-time employees, a handful of committed seasonals and a legion of volunteers, the Program has bolstered the protection of state Natural Areas while extending its reach to include new areas, supporters and conservation successes. The Natural Areas Program has made great progress over the past three years, but the threats to natural resources in Colorado are also increasing at an alarming rate. The challenges that face Colorado Natural Areas are mounting, and the work that the Natural Areas Program does has never been more pressing.

### **Program Accomplishments**

As a steward to the best places in Colorado, the Colorado Natural Areas Program has sought to work with a variety of Colorado landowners (see chart on p. 2) to monitor and protect those places of greatest conservation need. By increasing its role in conservation work across the state, the Program is surviving to keep pace with increasing conservation threats.

- **10,000 acres** of the finest lands in Colorado were added to the Natural Areas System, increasing the number of **registered and designated Natural Areas** from 105 to **113**.
- The Natural Areas System has grown to encompass **77 species of non-listed rare animals and plants** to keep these species *off* **of federal Endangered Species lists.** Also, **35 federally listed species** occur on Natural Areas where the Program is assisting in recovery efforts.
- For the first time in Colorado history, **Species Conservation Trust Funding** has been committed to protect Colorado's threatened wildflowers and is supporting a variety of rare plant conservation projects (see '*Rare Plant Protection' on page 4*).
- Staff **evaluated 20 potential natural areas** to assess their qualifications for inclusion in the Natural Area System.
- **100 committed volunteers** now help to monitor state Natural Areas.



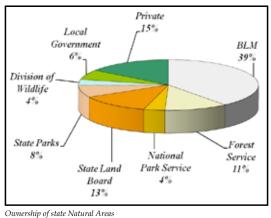
Photos left to right: Slumgullion Natural Area, Kremmling Cretaceous Natural Area, photos by Frank Weston

1

### **Private Land Conservation**

Conservation projects on private lands occur through voluntary landowner collaboration with the Natural Areas Program.

- Several private landowners have sought monitoring assistance and management advice on privately owned Natural Areas.
- Working cooperatively with ranch owners in Montrose County, the Natural Areas Program **acquired a portion of the Wacker Ranch** to protect an essential population of a federally endangered plant. With this protection project, the Natural Areas Program worked to move this listed species one step closer to de-listing (see sidebar to the right).
- In Prowers County, a **cattle rancher is working with the Program to provide stewardship** to unique geologic and biologic features on his private ranch.



"I've worked with the Colorado Natural Areas Program over the last 20 years to help protect this [rare] plant and I'm happy to see interest in protecting this land."

Harold Wacker, Prívate Landowner



Photos left to right: Gothic Research Natural Area, Escalante Canyon Natural Area, photos by Frank Weston





Clay-loving wild buckwheat, photo by Dickson Pratt

Harold and Kathleen Wacker are private ranchers in Montrose County who worked closely with the Natural Areas Program to assure that the federally-listed clay-loving wild buckwheat will be protected. With the help of funding from the U.S. Fish & Wildlife Service, the *Colorado Lottery, The Nature Conservancy and others,* Wacker Ranch Natural Area now commemorates the Wacker's stewardship to one of Colorado's rarest plants.



Harold and Kathleen Wacker

Printed by Friends of the Colorado Natural Areas Program

#### Energy company, state

### team up to protect site with rare GarCo flower



By DENNIS WEBB **E** Tuesday, August 05, 2008

The Grand Junction Daily Sentinel

cross the world, the Parachute penstemon is known to grow only in Garfield County, where it clings to steep shale slopes in just four viable populations.

The two best sites are on Mount Callahan, about three miles west of the town that shares the plant's name. The land is owned by OXY USA WTP LP, which wants to drill for natural gas on its property.

OXY and a state agency say they have come up with a plan that allows for such development while protecting the Parachute penstemon, which is a candidate for federal Endangered Species Act designation.

OXY and the Colorado Natural Areas Program are seeking to expand a 21-year-old State Natural Area designation for Mount Callahan. Under the proposal, OXY also has agreed to practices designed to safeguard the plant as gas development proceeds.

With OXY's permission, the state has been monitoring the Parachute penstemon population on Mount Callahan for 21 years. Now that the company wants to drill there, it has agreed to buffer zones, motorized travel limits and other measures designed to protect the plant.



Parachute penstemon, photo by Andrea Wolfe

### The New Energy Economy

The Natural Areas Program has worked closely with energy companies to minimize the impacts of energy development on significant natural features while providing guidelines that allow for sensible energy development. As fossil fuels and renewable energy are booming across the state, the Program is attempting to monitor the impacts to Colorado's rarest and most unique features.

- Working as an advisor to the State Land Board, the Program provided **lease stipulations for wind energy development** that protected rare plants and raptors in Weld County.
- In a model of collaboration with the oil and gas industry, the Natural Areas Program worked with OXY USA to protect the rare Parachute penstemon, which is being considered for federal listing under the Endangered Species Act (see story on the left).
- A threatened plant species in the Piceance Basin has received added protection through the registration of a natural area on property owned by Shell, Inc. in Rio Blanco County.





Colorado Senator Ken Salazar, Colorado Governor Bill Ritter and Executive Director of the DNR Harris Sherman visit the WesternSlope of Colorado to view the energy developments occuring there. Photo by Kim Kaal.



3

Photos left to right: Colorado Tallgrass Prairie Natural Area, Specimen Mountain Research Natural Area, photo by Frank Weston 2009 Triennial Report to Governor Ritter Natural Area Status and Condition Report



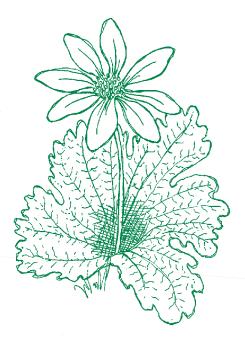
**Designated Colorado Natural Areas: Features and Conditions** Table 1

# Registered Colorado Natural Areas: Features and Conditions Table 2

Colorado Natural Areas Council:

## **Current Members**

Table 3



### Table 1: Designated Colorado Natural Areas : Features and Condition

			al Areas : Features and	
Natural Area	Owner	County	Significant Features	Condition/ Management Action
Aiken Canyon	SLB	El Paso	Plants, Geology, Animals	Stable
Badger Wash	BLM	Mesa	Plants, Plant Communities	Stable
Blue Mountain-Little Thompson Fault	Private	Larimer	Plant, Geology	Stable
Bonny Prairie Natural Area	State Parks	Yuma	Plant, Plant Communities	Stable
Brush Creek Fen	Private	Custer	Plants, Geology	Weed treatment ongoing
California Park	SLB	Routt	Plants, Animal, Plant Community	Stable
Castlewood Canyon	State Parks/SLB	Douglas	Plants, Plant Communities	Stable
Chalk Bluffs	SLB	Larimer/Weld/Logan	Plants, Geology, Plant Community	Wind turbines monitored for potential impacts
Colorado Tallgrass Prairie	City of Boulder	Boulder	Plant Communities	Stable
Comanche Grassland Lesser Prairie Chicken	USFS	Baca, Prowers	Animals	Surrounding oil and gas development being monitored
Copeland Willow Carr	City of Longmont	Boulder	Plant, Animals, Plant Community	Secure
Cross Mountain Canyon	BLM	Moffat	Plants, Geology, Fossils, Animals	Stable
Dakota Hogback Deer Gulch	Jefferson County BLM	Jefferson Rio Blanco	Plant Communities, Fossils Plants, Plant Communities	Stable Stable
Dome Rock	CDOW	Teller	Geology, Animals, Communities	Weed treatment ongoing
Droney Gulch	BLM/SLB	Chaffee	Plants	Stable
Dudley Bluffs	BLM	Rio Blanco	Plants, Plant Communities	Surrounding oil and gas development being monitored
East Sand Dunes	SLB	Jackson	Plants, Rare Geology	Secure
Elephant Rocks	BLM	Rio Grande	Geology, Plant	Off-road vehicles managed through planning efforts
Escalante Canyon	BLM	Montrose/Delta	Plants, Geology, Animals	Stable
		WORLOSE/Delta		Off-road vehicle access addressed through fencing and
Fairview	BLM	Montrose	Plants	restoration
Fruita Paleontological Locality	BLM	Mesa	Fossils	Stable
Garden Park Fossil Locality	BLM	Fremont	Fossils, Plants	Stable
Gateway Palisade	BLM	Mesa	Geology, Plants	Stable
				Off-road vehicle access addressed through fencing and
Geneva Basin Iron Fens	Clear Creek County	Clear Creek	Plants, Rare Habitat	restoration
Gothic	USFS	Gunnison	Rare Communities	Secure
Gunnison Gravels	BLM	Mesa	Geology	Stable
High Creek Fen	TNC/SLB	Park	Plants, Geology, Animals	Secure
High Mesa Grassland	BLM	Fremont	Geology, Plants	Stable
Hurricane Canyon	USFS	El Paso	Geology, Plant Communities	Secure
Indian Spring	SLB	Saguache	Geology, Animals	Stable
Indian Springs Trace Fossil Locality	Private	Fremont	Fossils	Stable
Irish Canyon	BLM/SLB	Moffat	Plants, Geology, Plant Community	Stable
Jimmy Creek	SLB	Larimer	Plants	Weed treatment ongoing
Ken Caryl Ranch	Private	Jefferson	Plants, Geology, Plant Community	Stable
Kremmling Cretaceous Ammonite Locality	BLM/SLB	Grand	Fossils	Stable
Limestone Ridge	BLM/SLB	Moffat	Plants, Geology, Plant Community	Stable
Lookout Mountain	BLM	Moffat	Plants, Geology	Stable
Lower Greasewood Creek	BLM	Rio Blanco	Plants, Plant Communities	Stable
McElmo	BLM	Montezuma	Geology, Animals	Stable
Mexican Cut	TNC	Gunnison	Plants, Geology, Animals	Stable
Mini-Wheeler	SLB	Fremont	Geology, Plant Community	Stable
Mishak Lakes	TNC	Saguache	Animals, Plant Communities	Hydrologic monitoring of water table
Mount Callahan	Private	Garfield	Plants, Plant Communities	Limited gas development done with extensive controls to minimize impacts
Mount Callahan Saddle	Private	Garfield	Plants, Plant Communities	Limited gas development done with extensive controls to minimize impacts
Mount Emmons Iron Fen	USFS	Gunnison	Plants, Insects	Stable
Mount Goliath	USFS	Clear Creek	Plant Communities	Secure
Narraguinnep	USFS	Dolores	Plants, Geology	Secure
Needle Rock	BLM	Delta	Geology	Stable
North Park Phacelia	BLM	Jackson	Plants, Plant Communities	Stable
Orient Mine	Private	Saguache	Animals, Plant Communities	Stable
Owl Canyon Pinyon Grove	Private/ DOW/SLB	Larimer	Plants	Stable
Paradise Park	NPS SLB	Grand	Animals, Plant Communities	Secure
Park Creek Hogback		Larimer	Plants	Weed treatment ongoing Off-road vehicles managed through fencing and
Pyramid Rock	BLM	Mesa	Plants	signage
Rabbit Valley	BLM	Mesa	Fossils	Stable
Rajadero Canyon	BLM/SLB	Conejos	Plants, Plant Communities	Stable
Raven Ridge	BLM	Rio Blanco	Plants, Fossils, Plant Communities	Stable
Redcloud Peak	BLM	Hinsdale	Animals	Stable
Rough Canyon	BLM	Mesa	Plants, Animals, Geology	Stable
Roxborough	State Parks/SLB	Douglas	Geology, Plant Communities	Stable
Saddle Mountain	USFS/SLB	Park	Plant Communities	Stable
San Miguel River at Tabeguache Creek	TNC	Montrose	Geology, Plant Community	Stable
Sand Creek	SLB	Larimer	Geology, Plant Community	Stable
Shell Rock	SLB	Baca	Plants, Plant Community	Stable
Slumgullion Earthflow	USFS/BLM	Hinsdale	Geology	Stable
South Beaver Creek	BLM	Gunnison	Plant, Animals	Stable
South Boulder Creek	Boulder City Open Space	Boulder	Plant, Animals, Plant Communities	Stable
South Cathedral Bluffs	BLM	Rio Blanco	Plants	Stable
Specimen Mountain	NPS	Larimer/Grand	Plants, Geology, Animals	Secure
Tamarack Ranch	CDOW	Logan	Plants, Animals	Stable
	SLB	Park/Lake	Plants,	Secure
Treasurevault Mountain		Las Animas	Geology	Stable
Treasurevault Mountain Trinidad K-T Boundary	State Parks	Las Animas		
	State Parks BLM	Mesa	Plants, Animals	Stable
Trinidad K-T Boundary			Plants, Animals Plants	Stable Stable
Trinidad K-T Boundary Unaweep Seep	BLM	Mesa	Plants Animals, Plant Communities	
Trinidad K-T Boundary Unaweep Seep Wacker Ranch	BLM CNAP	Mesa Montrose	Plants	Stable
Trinidad K-T Boundary Unaweep Seep Wacker Ranch West Creek	BLM CNAP NPS	Mesa Montrose Larimer	Plants Animals, Plant Communities	Stable Secure
Trinidad K-T Boundary Unaweep Seep Wacker Ranch West Creek Wheeler Geologic	BLM CNAP NPS USFS	Mesa Montrose Larimer Mineral/Saguache	Plants Animals, Plant Communities Geology, Plant Community	Stable Secure Stable

BLM- Bureau of Land Management, CDOW- Colorado Division of Wildlife, CNAP- Colorado Natural Areas Program, SLB- State Land Board, TNC- The Nature Conservancy, USFS- US Forest Service

### Table 2: Registered Colorado Natural Areas: Features and Conditions

Natural Area	Owner	County	Significant Features	Condition/ Management Action
Aiken Canyon	TNC	El Paso	Geology, Plant Communities, Animals	Stable
Antero-Salt Creek	SLB	Park	Plants	Stable
Arikaree River	SLB/Private	Yuma	Plant Communities	Stable
Blacks Gulch	BLM	Rio Blanco	Fossils	Stable
Boston Peak Fen	USFS	Larimer	Plants	Stable
Boulder Mountain Park	City of Boulder	Boulder	Plants, Plant Communities	Stable
California Park	USFS	Routt	Plants, Plant Communities, Animal	Stable
Dave's Draw Research	USFS	Weld	Plant Communities	Stable
Deep Creek	USFS	Garfield	Geology, Plants	Stable
Duck Creek	BLM	Rio Blanco	Plants, Plant Community	Off-road vehicles managed through fencing and signage
East Lost Park	USFS	Park	Plants	Stable
Elk River At Moon Hill	Private	Routt	Plant Community	Stable
Escalante Creek	USFS	Montrose/Mesa	Plant Community	Stable
Farm In Boulder Valley Heronry	Private	Boulder	Animals	Stable
Fourmile Creek	SLB	Park	Plants, Plant Communities	Stable
Hoosier Ridge	USFS	Park/Summit	Plants	Stable
Lake Pasture	Private	Larimer	Geology	Stable
Lake San Cristobal	Private	Hinsdale	Geology, Plant Community	Stable
Lost Park	USFS	Park	Plants	Stable
Miramonte Reservoir	CDOW	San Miguel	Plants, Animals	Stable
Moosehead Mountain	BLM	Moffat	Plant Communities	Stable
Pawnee Woodlands	Private	Weld	Plants, Plant Communities	Stable
Rocky Mountain Woodfrog Pond	Private	Grand	Animals	Stable
Running Creek	Private	Elbert	Plant Communities	Stable
Ryan Gulch	BLM	Rio Blanco	Plants	Surrounding oil and gas development being monitored
Shell Duck Creek	Private	Rio Blanco	Plants	Stable
Staunton	State Parks/SLB	Park/Jefferson	Geology, Animals, Plant Communities	Stable
Tabeguache	USFS	Montrose	Plant Communities	Stable
Tern Island	SLB/BLM	Bent	Animals, Geology	Stable
Two Buttes	Private	Prowers/Baca	Geology, Animals	Stable
Uncompahgre Fritillary	USFS	Hinsdale	Animals	Stable
Williams Creek	USFS	Hinsdale	Plant Community	Stable

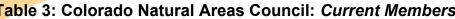
BLM- Bureau of Land Management, CDOW- Colorado Division of Wildlife, CNAP- Colorado Natural Areas Program, SLB- State Land Board, TNC- The Nature Conservancy, USFS- US Forest Service

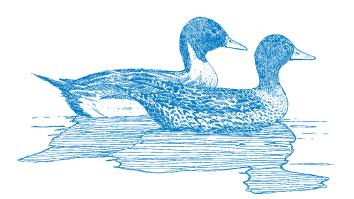


CNAP staff, Partners and Rare Plant Monitoring Stewards teamed up for a day of plant monitoring at Mount Callahan Natural Area. Photo by Nicola Ripley



Table 3: Colorado Natural Areas Council: Current Members					
Name	Appointment Date	Affiliation			
Governor Appointed					
Kathy Yates, Chair	2001	Think 360: Arts Complete Education			
Dr. Lee Shropshire, Vice-Chair	2004	University of Northern Colorado			
Jill Ozarski	2007	Colorado Coalition of Land Trusts			
Renée Rondeau	2007	Colorado Natural Heritage Program			
Board and Committee Representatives					
Michele Bloom	2008	Board of Land Commissioners			
Dennis Buechler	2007	Colorado Wildlife Commission			
Lenna Watson	2009	Colorado State Parks Board			







Photos left to right: Irish Canyon Natural Area, East Sand Dune Natural Area, photo by Frank Weston, Rough Canyon Natural Area, photo by Barbara Galloway

### **Rare Plant Protection**

Impacts to Colorado's rare plants are at an all time high. The only state agency that is legislatively mandated to work on rare plant protection is the Natural Areas Program, and recent efforts have brought the Program to the forefront of rare plant conservation in Colorado.

- **37,500 acres of habitat for the rarest plants** in Colorado occur on state Natural Areas, where the Natural Areas Program is working cooperatively to protect these species from growing threats.
- For each of the past three years, \$30,000 has been acquired through U.S. Fish and Wildlife Service Endangered Species grants, and has assisted in the conservation of 22 of the rarest plants in Colorado with the aim of recovering listed species and keeping imperiled species off federal lists.
- The Program has begun to utilize **Species Conservation Trust Funding for 30 conservation projects** that will result in research, monitoring and protection of the rarest plants in Colorado

Duck Creek Natural Area is home to a rare wildflower that only occurs in Rio Blanco County. Ken Holsinger, botanist with the Bureau of Land Management, has teamed with Colorado Natural Areas Program staff to monitor threats and build fences to reduce impacts to this beautiful plant.

The rare Dudley Bluffs Bladderpod





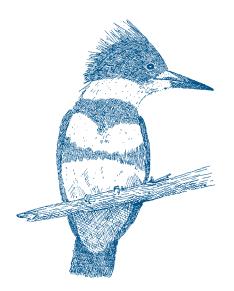
Photos left to right: Elephant Rocks Natural Area, photo by Frank Weston Parachute penstemon at Mount Callahan Natural Area, photo by Andrea Wolfe

With the growth of wind energy in eastern Colorado, there are places where development and sensitive natural features need to co-exist. The Natural Areas Program has been active on Chalk Bluffs Natural Area, a parcel owned by the State Land Board, to provide Best Management Practices for wind energy development near rare plants.



Wind Turbines near Chalk Bluffs Natural Area







Geneva Basin Iron Fen Natural Area, photo by Frank Weston

The Geneva Basin Iron Fen is a rare wetland that has taken millenia to form. Illegal use of off-road vehicles has threatened the sensitive area, so Clear Creek County and the Pike National Forest are working with the Program to monitor impacts and close the area to illegal use.

A partnership between the Friends of Dinosaur Ridge, Jefferson County and the Natural Areas Program resulted in the stablization of irreplacable dinosaur tracks that were cracking and weathering on the Dakota Hogback Natural Area. State Lottery funding provided essential support to assure a rare Colorado treasure was not lost.



Dinosaur tracks at Dakota Hogback Natural Area

#### **Partnerships**

Facing the growing threats to Colorado's natural values is easier with collaboration. Protection of Colorado's best natural features has been accomplished through partnerships with landowners and scientific experts who know the land best.

- The Natural Areas Program has served as an **internal resource for the Department of Natural Resource** agencies on such topics as rare plant protection, ecological restoration and noxious weed management.
- **43 Federal properties** (31 BLM, 9 U.S. Forest Service and 3 National Parks Service) are in the Natural Areas System. The Program has provided management recommendations, conservation assistance and thousands of volunteer hours to **protect Colorado's most sensitive features on federal land.**
- **Protection Projects on 18 natural areas** resulted from cooperation with landowners, scientists and other partners.



5 Photos left to right: CNAP staff work with partners to build fences at High Mesa Natural Area, and to monitor rare plants at Duck Creek Natural Area

Printed by Friends of the Colorado Natural Areas Program

"The Natural Areas Program is invaluable to federal land management agencies. The Program provides invaluable professional expertise and volunteers who assist the agencies in resource monitoring and scientific study. Through the Program's efforts, federal agencies are able to more effectively make sound management decisions." BLM Botanist, Montrose Field Office



### Outreach

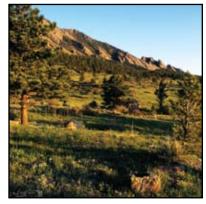
In order to increase the capacity for conservation, the Program has focused on strengthening public support and engaging stakeholders over the past three years.

- In 2008, a large format book, entitled "Colorado State Parks & Natural Areas," was published with the help of the Foundation for Colorado State Parks, Friends of the Natural Areas and a Natural Areas volunteer. This beautifully photographed guide book will promote public awareness of the state's most significant places.
- Friends of Colorado Natural Areas hosted a 30th Anniversary 'Friend-Raiser' that brought together three-decades of natural areas supporters, including Harris Sherman, who was the Director of DNR during the Program's inception in the late 1970s.
- Promotion of 15 visitable Natural Areas brought awareness of the best natural features in the state to the Colorado public.



Photos left to right: Dakota Hogback Natural Area, photo by Frank Weston, Lake Fork Registered Natural Area

6



Boulder Mountain Park Natural Area, photo by Frank Weston

One of the most dramatic, well-known and highly visited features in Colorado,the Boulder Flatirons, are included in the most recent Natural Area designations. Boulder Mountain Park Natural Area is invaluable for its recreational, scientific and aesthetic values.



Photos left to right: Gateway Palisade Natural Area, Dakota Ridge Natural Area, Slumgullion Slide Natural Area, Deep Creek Natural Area

"Let's fulfill the Colorado Promise... by being stubborn stewards of our land, our air, our water and our wildlife." Bill Ritter, Inaugural Address, January 9th, 2007







Colorado State Parks





#### STATE OF COLORADO • COLORADO STATE PARKS

Bill Ritter, Governor

Harris Sherman, Executive Director, Department of Natural Resources

Dean Winstanley, Director, Colorado State Parks

Colorado Natural Areas Council: Kathy Yates, Chair • Dr. Lee Shropshire, Vice-Chair • Michele Bloom, Board of Land Commissioners Dennis Buechler, Wildlife Commission • Lenna Watson, State Parks Board • Reneé Rondeau, Member • Jill Ozarski, Member

> Colorado State Parks/Colorado Natural Areas Program 1313 Sherman Street, Room 618, Denver, Colorado 80203 • 303-866-3437 • www.colorado.gov/parks

> > Cover photos bottom left: Indian Paintbrush at Aiken Canyon Natural Area, Dakota Hogback Natural Area, Mexican Cut Natural Area, photos by Frank Weston