

ARCHAEOLOGICAL INVESTIGATIONS OF TWO UTE TRAILS IN MESA COUNTY, COLORADO



15 AUGUST 2016

COMPLETED FOR
HISTORY COLORADO
STATE HISTORICAL
FUND AND THE BUREAU
OF LAND MANAGEMENT
GRAND JUNCTION FIELD
OFFICE

DARG Dominquez Archaeological Research Group 

A CONSORTIUM FOR CULTURAL RESOURCES
RESEARCH, PRESERVATION AND EDUCATION
IN THE NORTHERN COLORADO PLATEAU

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UTE TRAILS IN MESA COUNTY, COLORADO

Including Appendix B:

IDENTIFYING CULTURAL LANDSCAPES: ARCHAEOLOGICAL
DOCUMENTATION AND ANALYSIS OF NATIVE AMERICAN ROCK ART
ALONG PROPOSED PREHISTORIC-TO-HISTORIC TRAILS IN MESA
COUNTY, WEST CENTRAL COLORADO

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FOR THE
HISTORY COLORADO STATE HISTORICAL FUND
AND THE BUREAU OF LAND MANAGEMENT
GRAND JUNCTION FIELD OFFICE
OAHP #ME.LM.R859 & BLM-GJFO #15814-01**

SHF Project #2014-01-054

DARG Project No. D2013-2

15 August 2016

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BLM Antiquities Permit No. C-67009

Submitted to

BUREAU OF LAND MANAGEMENT

GRAND JUNCTION FIELD OFFICE

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FORWARD

Dominquez Archaeological Research Group, Inc. (DARG) is a 501(c)(3) non-profit corporation established in 2003 to serve as a catalyst for innovative and collaborative archaeological and anthropological research, preservation, and education in the northern Colorado Plateau region. Functioning as a consortium of research associates and technical advisors, DARG's operational focus is to coordinate research, raise and administer funding, and manage projects that advance our shared values and mission.

DARG has successfully administered several major past and on-going projects that have significantly expanded baseline knowledge of western Colorado archaeology, notably including the Colorado Wickiup Project and the Colorado Radiocarbon Database Project. Our Ute ethnohistory and ethnobotany studies have opened important new channels of communication with Ute consultants and research partners, and a series of bison studies we recently conducted have revealed a more complete picture of the occurrence of this important resource during the Early Numic and Historic Ute periods in western Colorado. These projects have and will continue to provide us with a solid foundation of baseline knowledge and organizational experience for this and future Ute Trails Projects.

DARG team members for the Ute Trails Project include: Carl E. Conner, Principal Investigator and Ute Trails Project Director; Michael S. Berry, Principal Investigator for Database Development, Chronometry and Multivariate Analyses; Curtis Martin, Principal Investigator for Colorado Wickiup Project; Richard Ott, Ute Consultation Coordinator; and Sally Cole, Rock Art Documentation Specialist. Ute participants in the project include: Betsy Champoos, Cultural Rights and Protection Director, and Clifford Duncan, Tribal Elder and Cultural Advisor, for the Ute Tribe of the Uintah and Ouray Reservation; and Terry G. Knight, Sr., Ute Mountain Ute Tribal Historic Preservation Officer and NAGPRA Liaison. Lynn Hartman, Ute Mountain Ute THPO administrator coordinated archival research.

DARG projects are funded through grants from the State Historical Fund, various offices of the Colorado Bureau of Land Management and the U.S. Forest Service, and through private contributors including: EnCana Oil & Gas USA, Inc.; EPCO, Inc; Rhino Energy; Grand River Institute; and The Williams Companies, Inc. In addition, DARG research associates regularly contribute significant pro bono hours working both on funded projects and organizational development.

DARG will continue to seek funding for the Ute Trails Project from state and federal grant programs and private foundations, and through our education and outreach efforts we will continue to foster funding relationships with private interests and public groups that support the project's goals. We will also continue our proactive efforts to share our research and educational databases through the cooperative development of a sustainable, internet-based, user-supported program.

ABSTRACT

Dominquez Archaeological Research Group (DARG) pursued this project, entitled Ute Trails of Mesa County, for the purpose of conducting a landscape-scale, multi-disciplinary study of two sections of the historic/prehistoric Ute Trails in Mesa County Colorado. This research project was funded by cultural resource grants from History Colorado State Historical Fund (SHF Project #2015-02-024), the Bureau of Land Management Grand Junction Field Office (BLM), and Grand River Institute. This project was conducted under Section 110 of the National Historic Preservation Act (NHPA, 16 U.S.C. § 360), and authorized by BLM Permit No. C-67009.

This study integrates archaeological, ethnohistoric and contemporary Native American perspectives. The purposes of the study were to conduct database work, fieldwork school, Ute consultation, rock art documentation, field survey of sites, analysis and completion of the final report and public outreach and information sharing. This included the identification of suspected prehistoric and historic trails or travel routes, the investigation and recording of the general distribution of associated cultural resources, and the evaluation of the significance of the cultural resources for inclusion on the National Register of Historic Places (NRHP).

Two potential aboriginal trails were selected for the project. Located in the Northern Utes' aboriginal territory, both trails were important corridors linking key river crossings and seasonal destination locales for aboriginal inhabitants in west-central Colorado as evidenced by the clustering of Early Numic, Historic Ute and other archaeological sites that have been recorded in the selected study areas. The nature of this study encompassed revisiting and reevaluating 34 selected sites and the recording of 15 sites and 84 isolates that were newly discovered within 20 (randomly selected) 20-acre inventory blocks. Thus, a total of 400 acres of BLM land was newly inventoried and 133 resources were addressed.

Information about the recorded sites was included in a database for the Ute Trails of Colorado and is augmented by a map-based findings review – both of which are accessed through the DARG website under password. Ute tribal participation has occurred at the development and findings stages. Additional involvement is expected during official consultation and specific site visitations that will be co-sponsored by BLM.

**APPENDIX B: IDENTIFYING CULTURAL LANDSCAPES: ARCHAEOLOGICAL
DOCUMENTATION AND ANALYSIS OF NATIVE AMERICAN ROCK ART ALONG PROPOSED
PREHISTORIC-TO-HISTORIC TRAILS IN MESA COUNTY, WEST CENTRAL COLORADO**

Identifying Cultural Landscapes: Archaeological Documentation and Analysis of Native American Rock Art along Proposed Prehistoric-to-Historic Trails in Mesa County, West Central Colorado

Sally J. Cole, Rock Art Principal Investigator

Ute Trails of Mesa County, Colorado State Historical Fund Project No. 2014-01-054

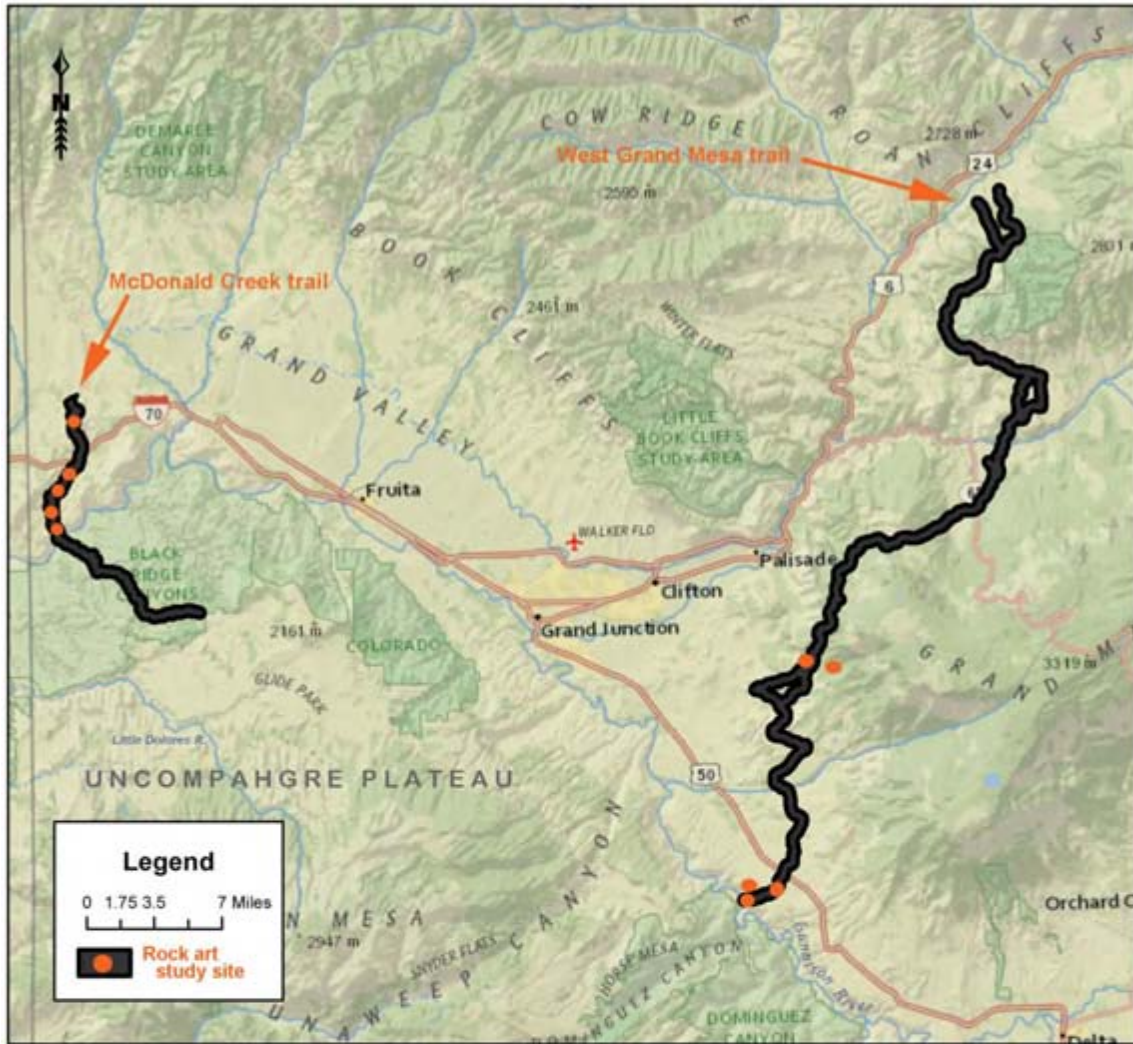
Dominquez Archaeological Research Group, Grand Junction, Colorado

Introduction

Rock art research has proved useful for distinguishing populations and patterns of behavior over time on the Colorado Plateau and in the Intermountain region. Petroglyphs and rock paintings are fixed in place and as communication were integral to group identities and rituals whether sedentary or mobile. They are marks and markers of culture and society on the landscapes where they were placed (Bernardini 2005; Buckles 1971; Castleton 1978–1979; Christensen 2007; Christensen et al. 2013; Cole 1989, 1990, 1992–1994, 1996, 2004a-b, 2009, 2011a-b; 2013; Grant 1978; Guernsey and Kidder 1921; Heizer and Baumhof 1962; Heizer and Clewlow 1973; Ives 1986; Keyser 1975, 1977, 2011; Kidder and Guernsey 1919; Matheny et al. 2004; Olsen 1985; Quinlan and Woody 2003; Robins 1997; Schaafsma 1971, 1980; Schaafsma and Schaafsma 1974; Spangler 2004; Stephen 1969; Stevenson 1904; Terlep 2012; Tipps 1995; Young 1985).

The present research examines the nature and timing of Archaic, Formative (Fremont and Ancestral Pueblo), and historical Ute developments in west central Colorado through documentation and comparative analysis of rock art at 11 sample sites along the projected McDonald Creek and West Grand Mesa cultural trails or corridors (Dominquez Archaeological Research Group, Colorado State Historical Fund Project #2014-01-054). The subject petroglyphs and paintings are models for the range of reported styles in the region and patterns of distribution along the trails and in surrounding areas. Although broadly dated, the stylistic patterns point to routes for migration and settlements through time.

The proposed McDonald Creek trail crosses the Colorado River near the Utah line, connecting Glade Park and the Little Dolores River on the northern Uncompahgre Plateau to the Book Cliffs and Roan and Tavaputs plateaus, and beyond to the Uintah Basin. The West Grand Mesa trail would link Battlement Mesa and the upper Colorado River to the Gunnison River, gateway to the central and southern Uncompahgre Plateau and the Dolores and San Juan River drainages (Figure 1). Here, groups of prehistoric hunter-gatherers and Fremont and Ancestral Pueblo farmers marked distinctive landscapes; historical Ute (horse and rider) markers cross earlier boundaries. The rock art enhances knowledge of cultural dynamics and offers insights into past traditions and territories.



Ute Trails in Mesa County, Colorado. Maps show potential trail locations with approximate distribution of 11 rock art study sample sites (above) and the project area within a larger geophysical-political landscape (left). (Adapted from DARG-Ute Trails of Mesa County Project, 2012)

Figure 1. Proposed prehistoric-to-historic travel corridors and rock art focus sites within local and regional landscapes.

The research comprises documentation and assessment of rock art at the 11 sample study sites and comparative analysis and identification of wider cultural affiliations and relationships exemplified by style and distribution within the regional cultural context (Baker et al. 2007, 2009; Black 1991; Blinman 2000; Bradley et al. 1986; Buckles 1971; Cassells 1997; Charles and Cole 2006; Conner et al. 2011, 2014; Creasman 1981, 1982; Fahrni 2004; Graham and Cole 2014; Gruebel et al. 2006; Hovezak 2003; Hurst 1940-1941, 1945-1948; Kinnear-Ferris 2011; Lister and Dick 1952; Lutz 1978; Madsen and Metcalf 2000; Marwitt 1973; McDonald 1997; Reed 2005; Reed and Metcalf 1999; Simms 2008; Smith-McDonald 1989; Spangler 2000; Stiger 2001; Stiger and Larson 1992; Talbot and Wilde 1989; Toll 1977; Tucker 1989; Wormington and Lister 1956). The study addresses Archaic dynamics investigated by Wormington and Lister (1956), Buckles (1971), and Black (1991) and recently identified in the radiocarbon record (Conner et al. 2014). Of particular interest in the latest study are Periods 3–5 (1750 B.C. to A.D. 1250) that span the late Archaic into Formative eras with which regional rock art styles examined here are most closely associated (Cole 1999, 2009, 2011a). The stylistic affiliations point to the presence of long term residents and origins of migrating populations.

The nature of trailside rock art and its potential contributions to cultural exchange and territorial control or passage are of interest to the research. To the degree it was public communication, openly signifying information about the makers and their societies; it is likely to have reinforced group identities and connections to the landscape. Depending upon the message and the nature of the societies involved, outsiders may have been welcomed or excluded from interaction. The public vs. private nature of rock art at the 11 study sites is examined in the framework of the corridor settings. This report summarizes documentation results; describes the rock art sites, settings, and stylistic associations; and examines questions of cultural affiliation and regional relationships with regard to migration, immigration, and settlement through time.

Research Methods, Results, and Personnel

Project work comprised records search, site survey, documentation, and assessment. The field work and subsequent analysis were conducted between June 2014 and May 2015 for the Dominquez Archaeological Research Group (DARG). The 2014 Utah State University (USU) Archaeological Field School (Steven R. Simms, Ph.D., Director) participated in the initial McDonald Creek rock art field and laboratory work supervised by Sally J. Cole. The USU field school technical assistant was Anastasia Lugo Mendez and the student archaeologists were Brandi Allred, Kylie Christensen, Ryan Gerstner, Jill Montgomery, Alicia Olea, Kristi Tuttle, Terry M. Williams, and Bethany M. Wurster. Sally J. Cole and Curtis Martin, individually, made field data checks and documented and assessed additional rock art sites in the two corridors.

Six previously recorded rock art sites in the proposed McDonald Creek corridor between the open terrain of the upper slopes and the Colorado River at the sandstone canyon mouth

(5ME529, 5ME538, 5ME540, 5ME1356, 5ME5247, and 5ME5259) and five sites in the West Grand Mesa corridor, two on the west bench of Grand Mesa (5ME3768, 5ME8047) and three near the Gunnison River to the south (5ME163, 5ME164, and 5ME580) were surveyed and documented for the Ute Trails project. The sites and rock art were assessed for condition, age, and cultural affiliation.

Existing records were updated for all study sites. Rock art panels were newly recorded or reevaluated with comments to provide additional information. The body of documentation is baseline data for this study and comprises site plans (new and adapted), high resolution digital photographs including annotated site-panel layouts and panel motif and attribute assessments, color-enhanced images to improve motif visibility, scaled and annotated rock art drawings, and applicable Colorado Cultural Resource Survey forms with comments (see DARG final report and attachments for Colorado Historical Fund project No. 2014-01-054).

Comparative Styles

Culturally affiliated rock art expressions utilized in the study are associated with Archaic hunter-gatherers, Ancestral Pueblo and Fremont farmers, and historical Ute. The Archaic-based expressions are the: Abstract-Geometric style tradition (petroglyphs and paintings) with links to the Great Basin and Southwest; Uncompahgre style (few paintings, predominantly petroglyphs) are most obviously manifested in the west central Colorado area; and Barrier Canyon style paintings and petroglyphs of the Colorado Plateau north of the San Juan River and south of the Uintah Basin. Unlike the other two, Barrier Canyon style is a component of anthropomorphic-centered iconography that characterizes Archaic and Formative expressions (rock art and material culture) on the plateau and provides major comparative data (Cole 2004a).

The proposed chronologies of the three Archaic-derived styles extend into the Formative era represented by generalized Basketmaker II-III petroglyphs and paintings connected to the greater San Juan and Canyonlands regions; generalized Fremont style petroglyphs and paintings associated with Uintah Basin-Roan and Tavaputs plateaus-Little Dolores River-Glade Park as well as the more remote San Rafael region; and Ancestral Pueblo I-II-early Pueblo III paintings and petroglyphs related to the greater San Juan, Canyonlands, and San Miguel-Dolores River regions (Figure 1). Historic Ute style petroglyphs and paintings are known from western Colorado, southern Wyoming, and eastern Utah where earlier and later expressions have been identified (Buckles 1971; Castleton 1978-1979; Cole 1988, 1989, 1990, 2004a, 2009, 2011a; Conner and Ott 1978; Creasman 1982; Grant 1978; Keyser 2011; Keyser and Poetschat 2008; Lutz 1978; Schaafsma 1971, 1980; Spangler 2004; Spangler and Spangler 2007; Wormington and Lister 1956).

The style chronologies generally follow Cole (1990, 2009): Abstract-Geometric Tradition (~4000 B.C.–500/1000 A.D.); Barrier Canyon style (~2000 B.C.–A.D. 400); Uncompahgre style (~1000 B. C. or earlier–A.D. 1000); generalized Basketmaker II-III (~1000/400 B.C.–A.D. 600);

generalized Basketmaker III–Pueblo I and Pueblo II–III (~A.D. 600–1350); generalized Fremont (~A.D. 400/600–1300/1500); early historic Ute (~1500s–1825/1850) and late historic Ute (~1825/1850–1900 and later). Uncompahgre style, in particular, may have earlier origins as suggested by stylistic and geographic overlaps with Abstract-Geometric rock art (and somewhat with Glen Canyon Style 5 not addressed in the present study). Uncompahgre and Abstract-Geometric styles appear deeply rooted in the study region.

Age estimates for the subject styles come with the proviso that sandstone surfaces upon which most occur may not have survived more than a few thousand years and relatively little comparable material culture from the Archaic era is reported. An abundance of material culture and records insure fewer uncertainties with regard to Ancestral Pueblo, Fremont, and historic Ute expressions. Present-day discussions about the age of a potential mammoth petroglyph and age of Barrier Canyon style paintings in southeastern Utah make the point (Hurst 2011; Malotki and Wallace 2010; Pederson et al. 2014; Steven Simms, personal communication 2014). Examples of relevant cultural styles and subject matter discussed in the study are illustrated in Figures 2 –7.



2a



2b



2c



2d



2e

Figure 2a–e. Abstract-Geometric style paintings and petroglyphs: (a)-(b) San Rafael Swell, Utah; (c) tipped boulder with multiple Archaic–Basketmaker II-III styles, San Juan River drainage, Utah; and (d)-(e) 5DT355, North Fork Gunnison River drainage, Colorado (note pecking around natural contours; some animals and human figures may be associated with Uncompahgre style that also occurs at the site).



3a



3b

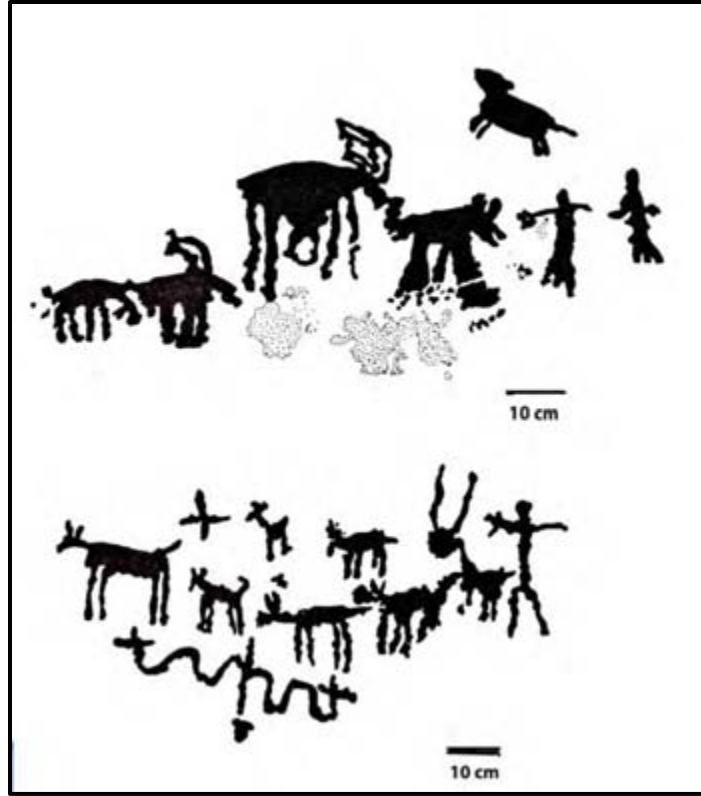


3c

Figure 3. Barrier Canyon style paintings and petroglyphs: (a)-(b) Book Cliffs-Roan Plateau area, Colorado; and (c) Near Moab, Utah.



4a



4b

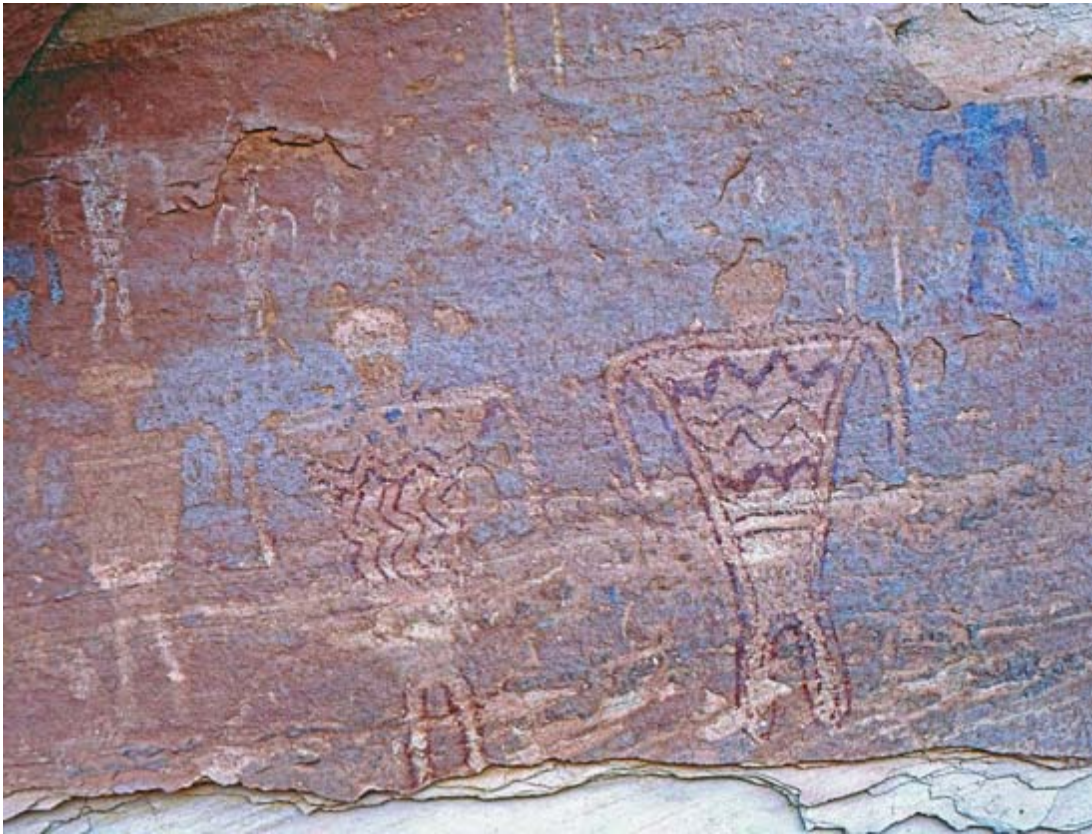


4c

Figure 4. Uncompahgre style petroglyphs at: (a) 5ME468 type-site; (b) 5ME228; and (c) 5DT355 with possibly masked anthropomorph; all in the Gunnison River drainage, Colorado.



5a



5b



5c

Figure 5. Basketmaker II-III style petroglyphs and paintings: (a)-(b) San Juan River drainage, Utah; and (c) San Miguel River drainage, Colorado.



6a



6b



6c



6d



6e



6f

Figure 6. Fremont style paintings and petroglyphs: (a)-(b) Uintah Basin, Utah; (c)-(d) Tavaputs Plateau, Utah; (e) Book Cliffs-Roan Plateau area, Colorado; and (e) Glade Park area, Colorado.



7a



7b

Figure 7. Historic Ute paintings and petroglyphs, probably pre-1850: (a) Colorado River and (b) San Juan River drainages, Utah.

The Study Sites

West Trail

The six rock art sites along the proposed McDonald Creek trail are described and discussed in order of occurrence, north to south, from the uplands to the confluence with the Colorado River near the Colorado-Utah line (Figure 1). Site type descriptions beyond rock art are derived from Colorado Cultural Resource Survey records and field data.

5ME5247

The northernmost site, a sheltered camp with rock art, is located near the streambed in the open terrain of the upper drainage. Two small, partially eroded red paintings (10 cm and less in length) and surrounding inscriptions and graffiti, soot deposits, and indistinct stains comprise Panel 1 located on the overhanging ceiling of a boulder-shelter near the streambed (Figure 8). The red motifs of interest here comprise an animal with spread legs and paws with prominent claws and a smaller, similarly shaped but indistinct form with fringelike appendages (possibly insect). The animal (or pelt as suggested by the pose) may represent a badger with an inconspicuous tail. The paintings are tentatively assigned to Fremont culture (~A.D. 400/600–1300 or later) (Bradley et al. 1989; Conner et al. 2011, 2014; Creasman 1981; Simms 2008; Spangler 2000) based on similarities in subject matter and painting techniques at downstream site 5ME538. Unlike that site, the diminutive size and setting of the present paintings within the modest shelter indicate they were not created for broad, public viewing and are unlikely to have communicated to outsiders traveling the corridor.

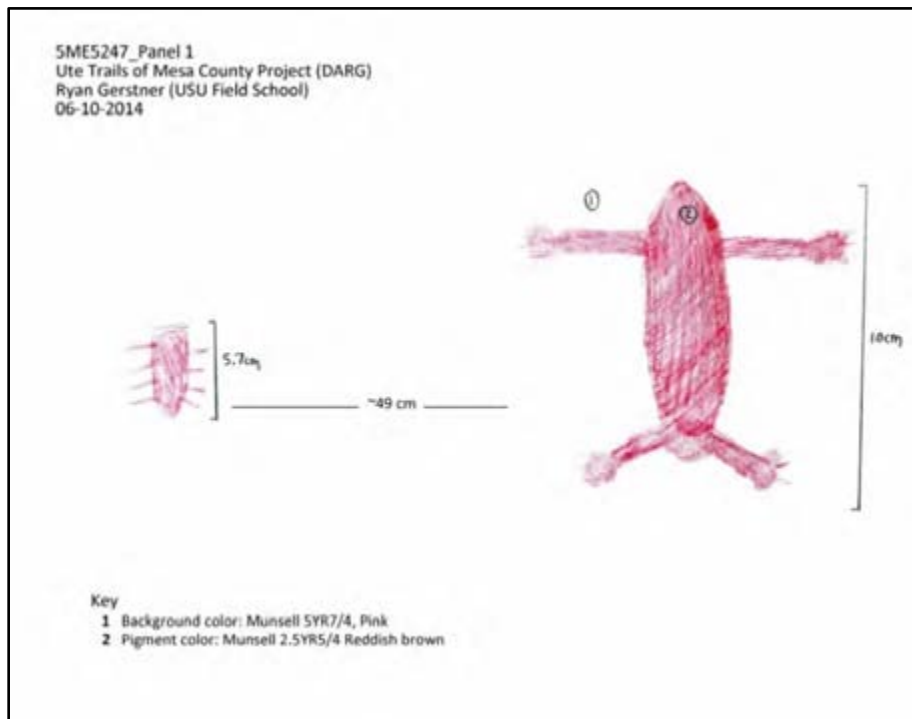
5ME1356

The second McDonald Creek site is near the point the canyon narrows. Here, the streambed makes a sharp bend around a prominent, overhanging sandstone cliff embellished with 9 panels of prehistoric and historic rock art, historic inscriptions, and numerous examples of graffiti. The various subjects are visible, exclusively, from upstream or downstream. Panels 2, 3, and 9 were assessed for the present study.

Panel 2 (visible from downstream) comprises eroded black paintings showing a pedestrian with a possible backpack and rifle pointed toward an equestrian; the cliff overhang is not significant and erosion and spall are significant. The paintings are probably of historic Ute origin and may chronicle a shooting event in the area. The style of paintings is consistent with late historic Ute expressions on the Uncompahgre Plateau and in eastern Utah and probably dates after 1750 (Baker 2013; Baker et al. 2009; Buckles 1971; Cole 1989, 1990, 2013). Ute paintings and petroglyphs commonly appear to represent encampments, individual accomplishments and characteristics; hunting events and raids and conflicts (Cole 1988, 1989, 1990, 2013; Keyser 2011; Keyser and Poetschat, eds. 2008). The Ute are credited with San Juan



8a



8b

Figure 8a–b. 5ME5247, Panel 1: (a) overview and (b) detail drawing.

River petroglyphs depicting a skirmish between Anglos and Indians, possibly involving a Colorado posse and Polk Narraguinip's Ute band (Hurst 2011).

The relatively small, dark paintings are openly accessible and viewed from the terrace at the base of the cliff but require close examination. In this sense they are not public displays and are more likely to have communicated to a relatively small and select group of travelers, perhaps Ute bands that occupied the canyon and/or regularly passed through from downstream (Figure 9).

In contrast to the Ute work, Panels 3 and 9 at 5ME1356 (visible from upstream) are natural billboards. The now eroded and faint motifs may have been components of a continuous, colorful array that spanned 50 m or more of the cliff above the stream. Surface spall is obvious and extensive on Panel 3 and erosion and mineral accretion and/or dust deposits have made most motifs faint. The relatively well preserved elements in Panel 9 are bright but areas of spall are evident near the paintings. Collectively, the panels comprise red in various shades and black and gray paintings of linear geometric motifs (some resembling plants and bird or other animal tracks), parallel lines and/or finger "swipes" or "prints", circular forms, and dots (Figures 10–13).



9a

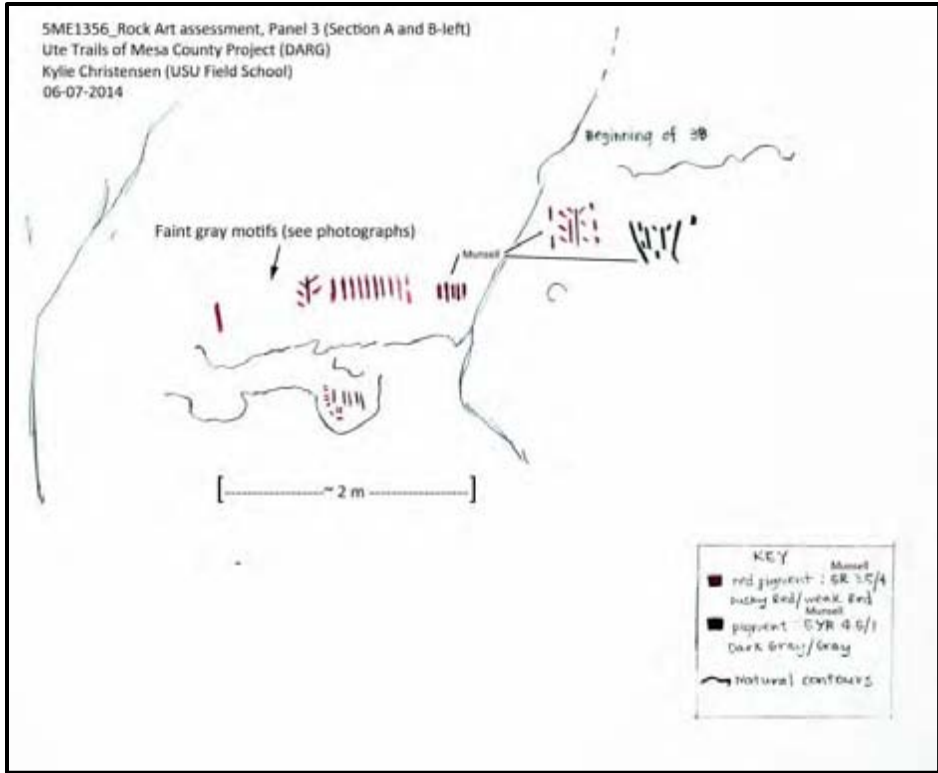


9b

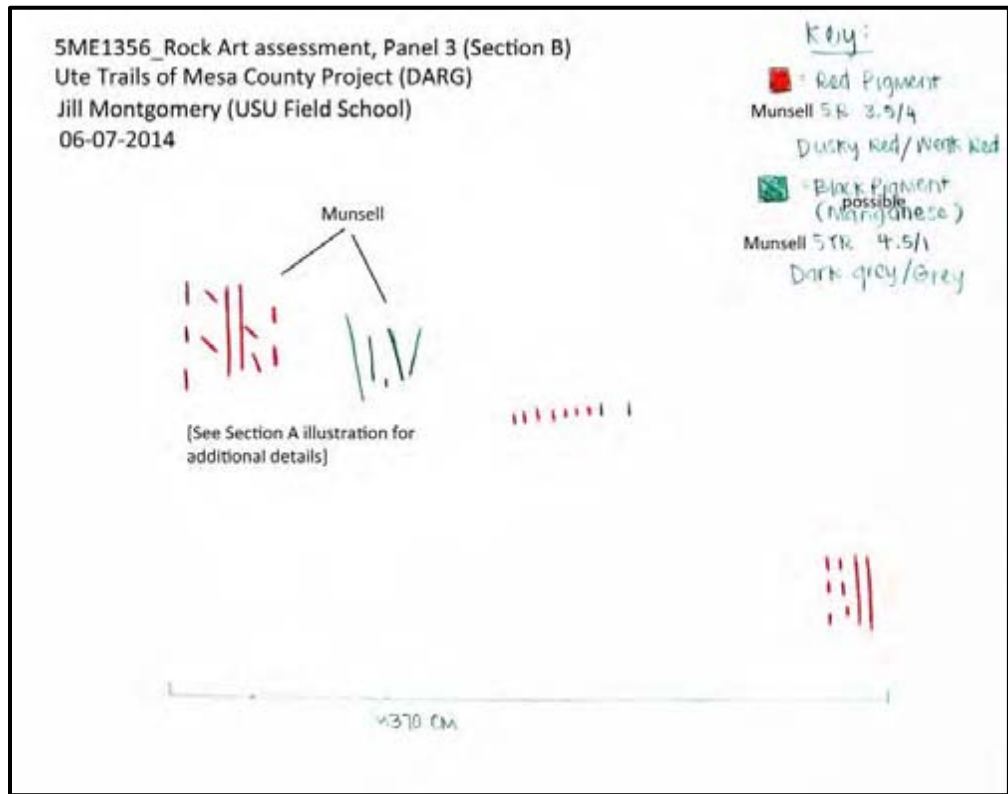
Figure 9a–b. 5ME1356, Panel 2: (a) overview and (b) detail.



Figure 10. 5ME1356 with streambed approximately 5 m below Panel 3; view upstream toward Panel 9.

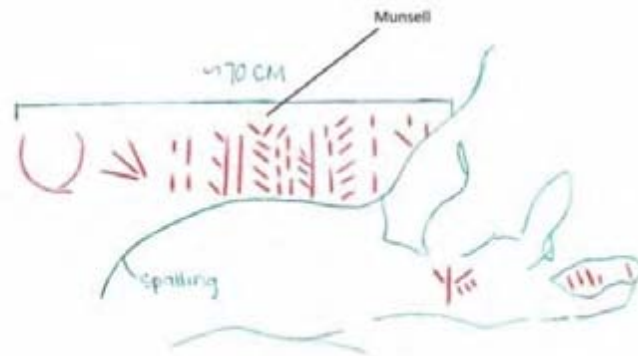


11a



11b

5ME1356_Rock Art assessment, Panel 3 (Section C)
Ute Trails of Mesa County Project (DARG)
Jill Montgomery (USU Field School)
06-07-2014



11c

Figure 11a–c. 5ME1356, Panel 3: Drawings of (a) Sections A–B; (b) Section B; and (c) Section C.



12a



12b



12c



12d

Figure 12a–d. 5ME1356, Panel 3 details: (a) gray and red paintings and associated spall, Section A; (b) black lines and dot, Section B; (c) dark red circle, possible animal track, and lines and/or fingerprints, Section C; and (d) dark red lines or fingerprints, plantlike forms, and dot, Section C.



Figure 13. 5ME1356, Panel 9 paintings.

The rock art corresponds to paintings of the Abstract-Geometric style tradition of Archaic origin in the Great Basin, Colorado Plateau, and Chihuahuan desert (Cole 1990, 2009; Schaafsma 1980). The style is estimated to date 4000 B.C. to as late as A.D. 500/1000 in some areas and occurs at Utah locations with Barrier Canyon style; the two expressions may be contemporaneous after 2000-1000 B.C. (Abstract-Geometric petroglyphs and Barrier Canyon style petroglyphs are downstream at site 5ME5259). Panels 3 and 9 were openly displayed and public with regard to downstream travelers, especially when the paint was fresh and bright. The imagery potentially informed and influenced a wide range of residents and visitors well beyond the Archaic era.

5ME538

Red paintings at the third study site (a possible camp with rock art) along McDonald Creek are situated in a bend that provides a direct view from the canyon floor and present day trail (Figure 14). The paintings (Panel 1) are on an overhanging sandstone cliff above the streambed (Figure 15) and are partially eroded and damaged by bullet holes. Additional paintings may have existed on the lower cliff but the surface appears subject to flooding and spall is evident. The better preserved paintings, particularly those with thickly applied paint, remain vivid (Figure 16). As such, the rock art probably attracted and communicated information to the travelling public. The site is bordered by grassy terraces that form the wide canyon floor and is a natural camp and place for people to gather. In addition to being a marker, the rock art site may have been a regular or ritual stopping place (possibly a shrine) for culturally and socially related groups.



Figure 14. Bend in McDonald Creek trail from Panel 1 area, 5ME538; view west with upstream at right.



Figure 15. 5ME538, setting of Panel 1 above streambed; view east.



16a

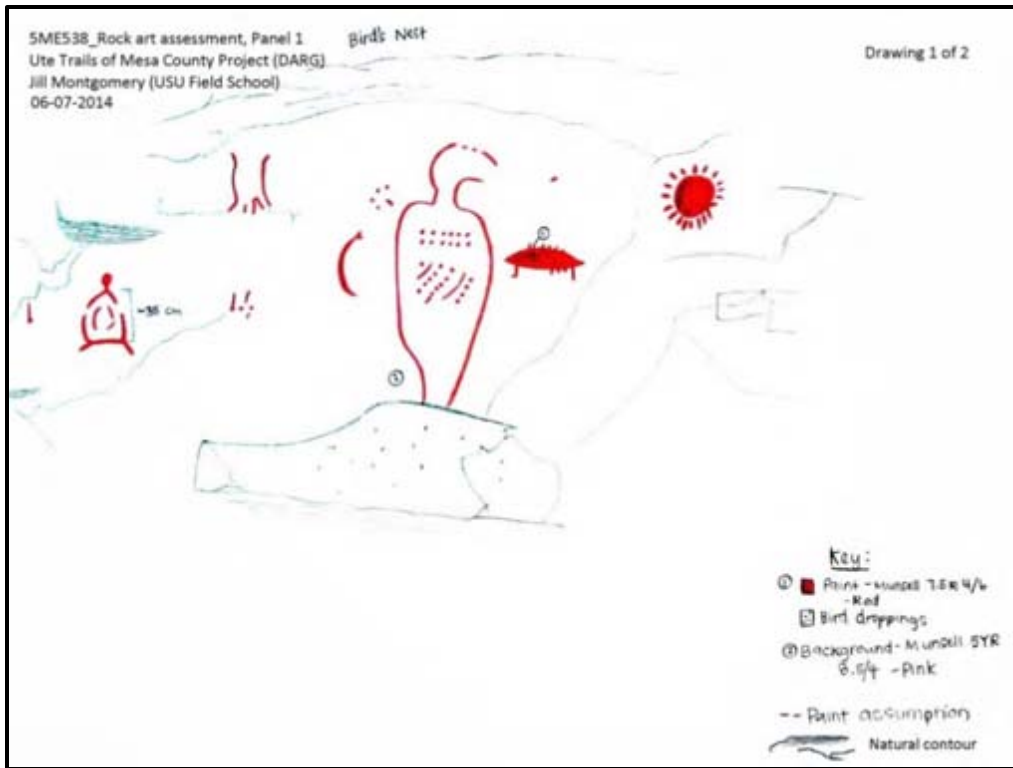


16b

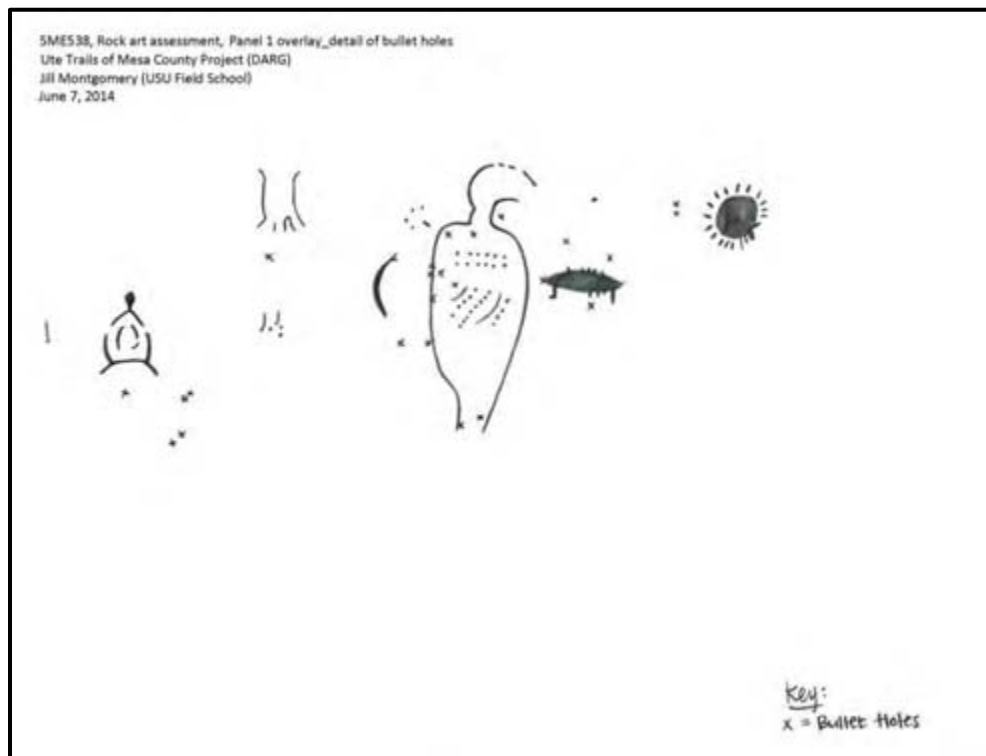
Figure 16a–b. 5ME538, Panel 1: (a) cliff setting and student archaeologist with scale (50 cm); (b) overview of rock art with bullet holes.

The panel motifs comprise an outlined and embellished wading bird (likely heron or crane); a possible turtle; possible insect larva with “horns”; and a crustacean or insect –like form with legs, ball-shaped feet, short tail, and bumpy (dotted) exterior (Figures 17-18). The bird and other subjects are associated with water and riparian environments such as that of the Colorado River. The body of the bird is marked by blocks of fingerprint-like dots. The painting technique and legs of the insect or crustacean form suggest the small red animal painting upstream at 5ME5247. Conner and Born (1976) propose the bird may have provided a directional sign to the river; the long beak points downstream. A possible sun, flower, or seed motif with finger or toe print-like “rays” is above the bird.

The subject paintings are attributed to Fremont culture, which is stylistically more definitive downstream at sites 5ME540 and 5ME529. In the Uintah Basin and Tavaputs Plateau and in nearby Little Dolores River-Glade Park areas, Fremont-related petroglyphs show rows and groups of dots and anthropomorphs with torsos embellished by dots suggestive of the



17a



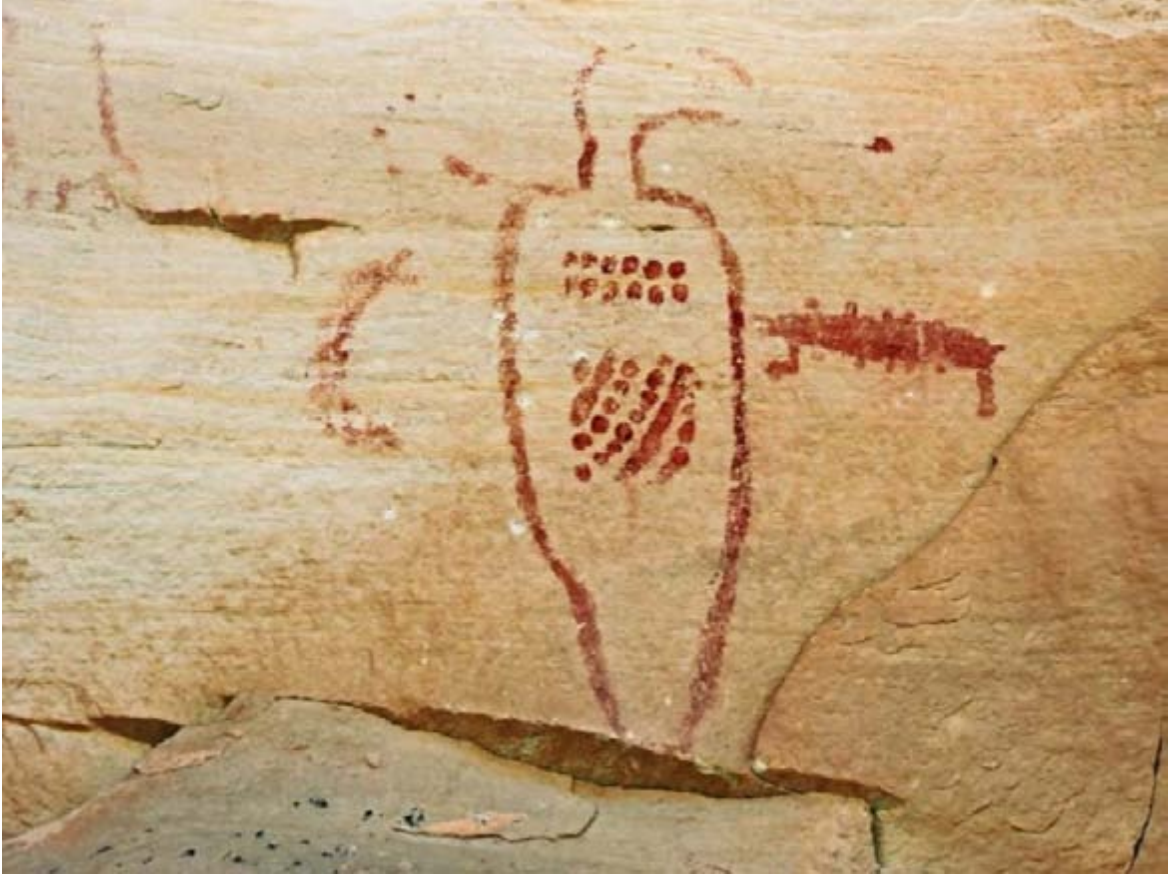
17b

Figure 17a–b. Drawings of Panel 1, 5ME538: (a) overview and (b) detail showing bullet holes.

painted bird (Castleton 1978; Cole 1990, 2009, 2011a; Schaafsma 1971). Fremont occupations in those areas and the Roan and Tavaputs plateaus date approximately A.D.400/600 to 1300/1500 (Bradley et al. 1989; Conner et al. 2011, 2014; Creasman 1981; Spangler 2000). It is possible that the “bird semaphore” provided direction to 5ME529, a likely ceremonial site in an alcove overlooking the Colorado River. Birds (wading and other species), insect forms, and sun-like motifs are common subjects of Ancestral Pueblo and Fremont rock art and are well represented in historical Hopi and Pueblo ritual objects with archaeological and traditional links to the generalized study area (Cole 1994, 2004b; 2006, 2009).



18a



18b



18c



18d



18e

Figure 18a–e. Panel 1, 5ME538: (a) detail of turtle-like motif; (b) detail of bird embellished with possible fingerprint dots, horned larva-like form to left, and possible, bumpy crustacean at right; (c) detail of possible crustacean showing legs, ball shaped feet, and short “tail”; (d) detail of possible sun or flower; (e) detail of toe or finger-like “rays.”

5ME5259

Petroglyphs (Panels 1–4) at the fourth McDonald Creek trail site are situated on an overhanging cliff adjacent to the streambed (Figure 19). The setting is similar to those at 5ME1356 and 5ME538 but the rock art is more secluded within an entrenched section of the canyon that can be bypassed from above or along the open terrace on the opposite side. In that context, the rock art is less obvious and public in nature but presently can be openly and closely viewed at eye level from the streambed. The imagery may have been regularly observed by travelers but probably communicated most directly with select, perhaps ritualistic, groups over time (ceremonial subjects and themes are indicated). The full complex of images is difficult to study in detail. The petroglyphs (obviously subject to flooding) are heavily repatinated and eroded, and some elements are damaged by scratches and other graffiti.

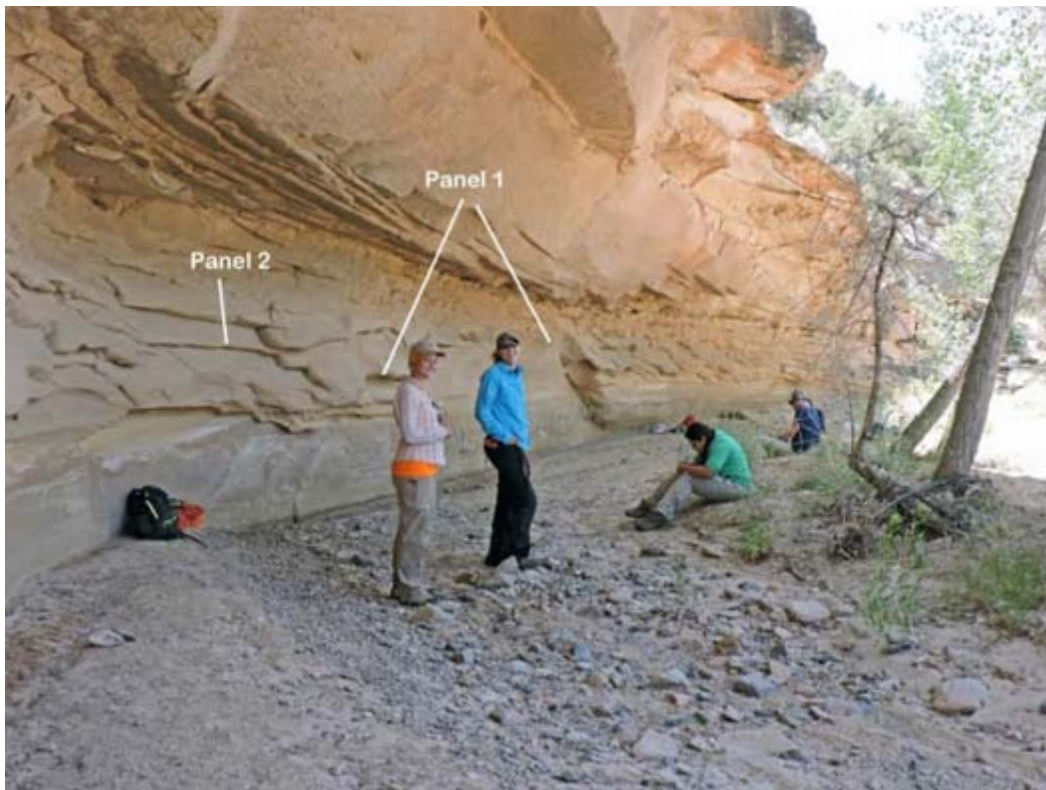
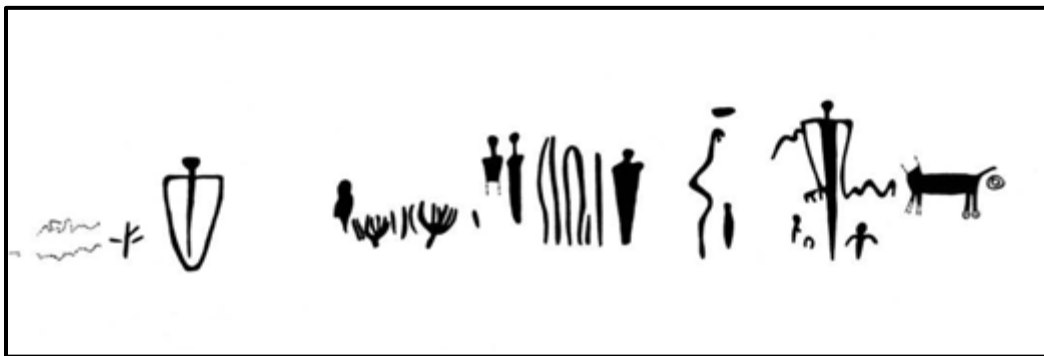


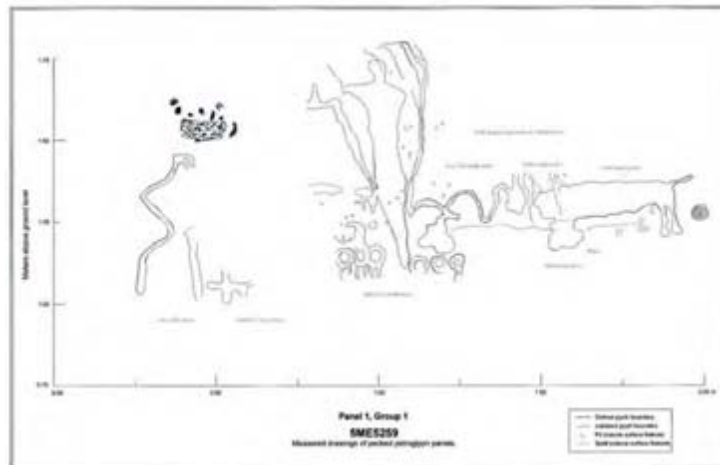
Figure 19. Setting of 5ME5259 with student archaeologists.

Panel 1 comprises groups of petroglyphs including tapered, elongated, and broad-shouldered anthropomorphic figures (some with embellished bodies); an eroded, elongated quadruped with “paws” and raised tail (possible canine), snakelike forms; a bull’s eye motif, pecked “dots”, pecked discs with linear attachments, a variety of circular and linear-geometric

motifs including interconnected forms; and pecked depressions or cupules and/or modified-natural depressions (Figures 20-24). The anthropomorphic subjects combined with various dot and linear motifs, snakes, and canine-like representations are characteristic of Barrier Canyon style (petroglyphs and paintings) dating from late Archaic into early Formative/Basketmaker II times (~2000 B.C. to A.D. 400) across much of the northern Colorado Plateau. Quite similar petroglyphs occur at sites in the Book Cliffs and Roan Plateau north of McDonald Creek (Cole 2004a, 2009; 2011a; Creasman 1982; Schaafsma 1971, 1980; Pederson et al. 2014; Steven Simms, personal communication 2014; Tipps 1995). Although linear-geometric imagery appears in Barrier Canyon style, it is not dominant and some or most examples in Panel 1 may be associated with the Abstract-Geometric tradition previously discussed for paintings at 5ME1356. At Utah and Colorado sites, paintings and petroglyphs of both styles, respectively, occur at the same sites (Cole 1990:Fig. 21; 2004a; 2009:Fig. 21–25).



20a



20b

Figure 20a–b. 5ME5259, Panel 1-Group 1: (a) 1987 drawing from projected slide; and (b) detail of 2006 documentation tracing by N. Darnell (upper left motif added 2014).



21a



21b



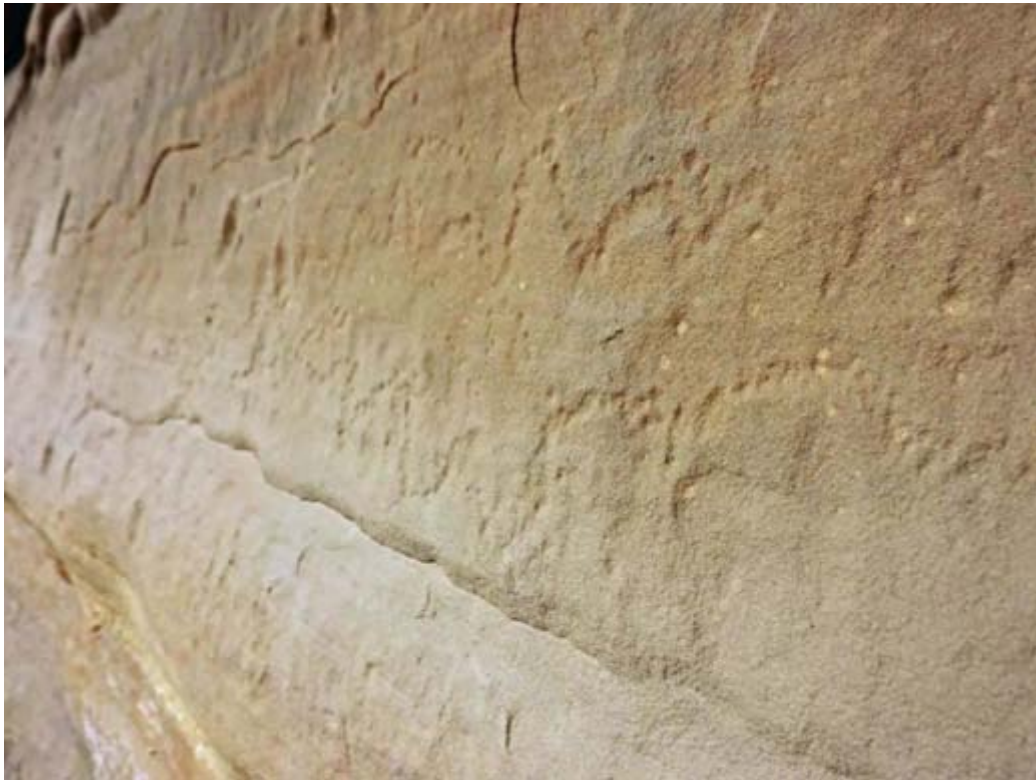
21c



21d



21e



21f



21g

Figure 21a–g. 5ME5256, Panel 1-Group 1: (a) overview from south end showing bull’s eye motif below tail of quadruped, vertical snakelike form, pecked lines, pecked and possibly ground depressions or cupules and/or modified/enhanced natural depressions (pecking and grinding); (b) lines (some interconnected), pecked and possibly modified natural depressions, two elongated anthropomorphic figures embellished by lines and pecked dots (natural or embellished depression may represent vulva (modern scratch visible)); (c) closer detail of elements in 14b; (d) complex anthropomorphic imagery (elongated, solid pecked figure within outline of broad-shouldered figure, solid pecked form below, and linear attachments); (e) pecked zigzag and curved lines, snakelike form with head down, anthropomorph with hunched shoulders, row of indistinct, elongated anthropomorphs and/or thin vertical lines; all elements intermingled with natural and possibly modified holes or depressions; (f) arcs and curved and zigzag lines; (g) solid pecked circular forms with attached lines (modern scratching at lower right).

Panel 2 is sloped, smoothly eroded (probably by repeated floods), and stained. A few distinct petroglyphs comprise parallel lines, a horseshoe-dot motif, and a small, finely pecked concentric circle-“sunburst” (Figure 22). Similar horseshoe shaped motifs appear in the context of Archaic Abstract-Geometric and Uncompahgre Style petroglyphs at Utah sites in the San Juan and Colorado River drainages, respectively (Cole 2009).



Figure 22. 5ME5259, Panel 2 overview showing pecked parallel lines, a horseshoe-dot motif, and a small, concentric circle-sunburst motif.

Panel 3 petroglyphs are separated (~ 14 m) from the area of Panels 1 and 2 and are in one of a pair of small natural openings in the lower cliff. The two small motifs are pecked and scraped (the latter possibly vandalism intended to remove surface dirt or modify) and comprise a quadruped and human form with spread legs and arms (Figures 23). The figures are stylistically distinct from discernable elements in Panels 1 and 2 and the pecking (some obscured by stain) is more recent in appearance despite equal or greater exposure to flood water. The style is not distinctive and the subject matter occurs in prehistoric and historic contexts. With the exception of the scraped portions, the panel does not appear recent and is likely to be at least historic in age and possibly Ute.



23a



23b

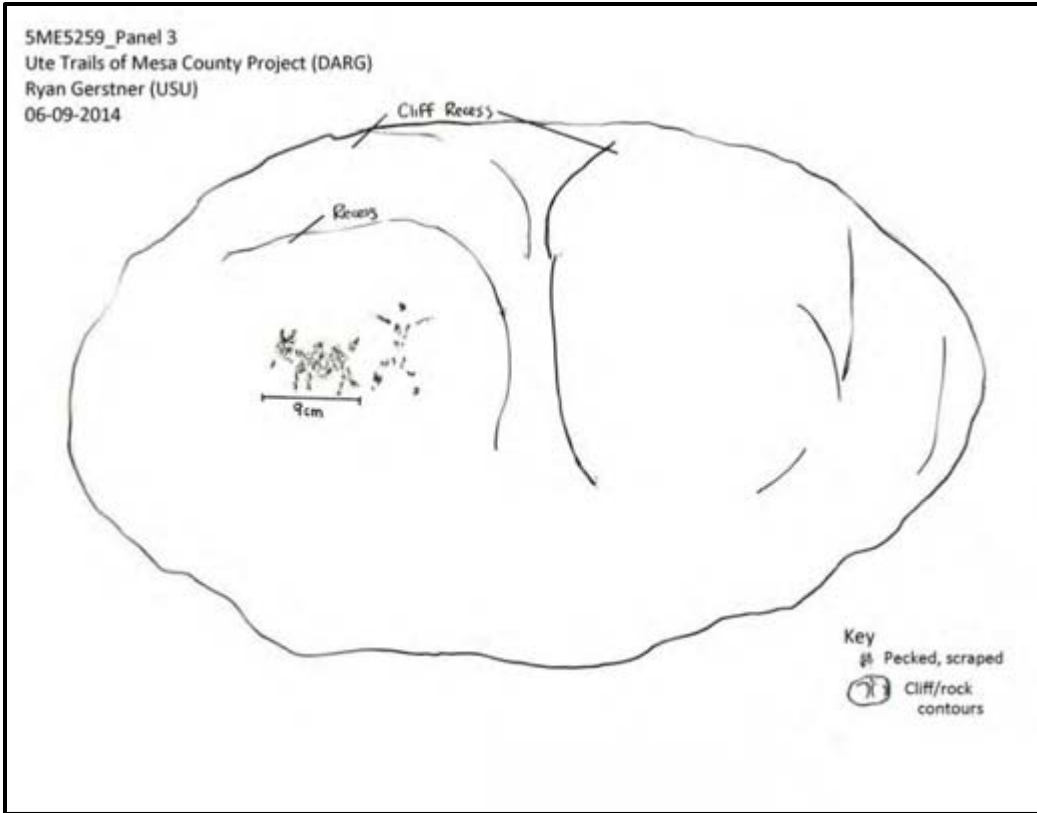


Figure 23a–c. 5ME5259, Panel 3: (a) overview of natural depressions with petroglyphs at left; (b) detail of pecked, stained, and scraped animal and human forms; and (c) drawing.

5ME540

The fifth site is a sheltered habitation and camp with prehistoric and historic rock art, historical inscriptions, and extensive graffiti. The site is in an entrenched, narrow portion of the canyon below a dry waterfall or pour-off where pools form intermittently. Seven rock art panels considered for this study are on the overhanging cliffs east and west of the site. On the east, Panels 1–3 are directly above the streambed; to the west, Panels 4–7 border sandy terraces. The panels evince erosion, spall, and areas of cliff where rock art appears to have been removed (Figure 24).

The box canyon setting promotes pedestrian entry from the south along the streambed, which represents a detour for both downstream and upstream travelers. As such, the site was probably a destination for water and shelter rather than a trailside attraction. Consistent with this observation, the limited visibility of the rock art outside of the site indicates it probably did not attract broad public interest even when fresh. Views of the panels from the canyon rims are restricted by the cliffs and vegetation that was probably present to varied degrees in the past, and the subject petroglyphs and paintings are not particularly large or colorful. It is likely that the rock art was intended to communicate to occupants that controlled the site's obviously attractive resources and to visitors that utilized those over time.



24a



24b

Figure 24a–b. 5ME540: (a) view north to the dry waterfall with Locus 1 (Panels 1-3) at right; (b) view southwest from streambed toward Locus 2 (Panels 4-5) at left-center and Locus 3 (Panels 6-7) at right.

Lithic artifacts from a disturbed context at 5ME540 (Conner et al. 1976 photograph) comprise a knife or possible projectile point with a square base and side notches suggestive of the Sudden Side Notched dart point dating 4500-2000 BC, Middle to Late Archaic (Justice 2002:154,162-164) and a projectile point resembling a Dolores Expanding Stem arrow point (Justice 2002:242-245) dating to Pueblo I-II, about AD 600-1000 (Carole Graham, personal communication 2015). The one and possibly two projectile point dates generally agree with estimated dates for prehistoric rock art at the site: Archaic Abstract-Geometric tradition (~4000 B.C. to A.D. 500/1000) and post-A.D. 400/600 Fremont related to styles of the Uintah Basin and Tavaputs and Roan plateaus as well as the San Rafael region to the southwest (Castleton 1978; Cole 2009; Creasman 1981; Schaafsma 1971; Spangler 2004). Basketmaker II-III style rock art (~1000/400 B.C.–A.D. 600) also may be present.

Abstract-Geometric style petroglyphs are concentrated in Panels 1 and 3 on the east side of the site (Panel 25). These comprise heavily repatinated and eroded circles, wavy lines, a sunburst-like form, and paw or foot print motifs. An interesting petroglyph resembling a corner



25a.



25b



25c



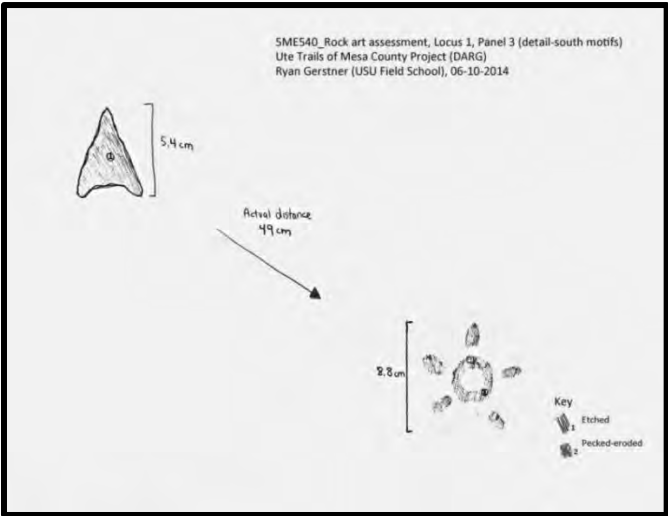
25d

Figure 25a–d. 5ME540 (Panels 1 and 3): (a) – (b) circles and paw- or footprint motifs in color and black and white; (c) wavy lines and arcs; and (d) sunburst motif.

notched dart point (with missing base) of Middle to Late Archaic age (Justice 2002:195-208; Carole Graham, personal communication 2015) may date from that period but it is less weathered than the geometric petroglyphs and appears more recent (Figure 26).



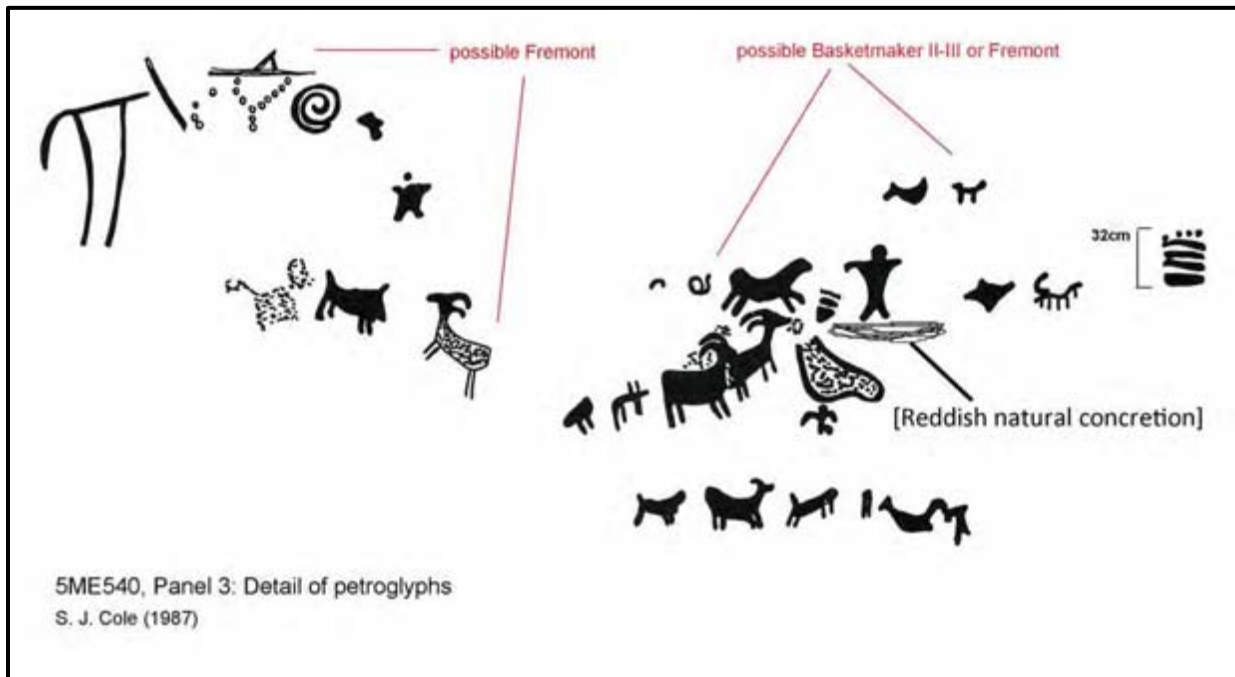
26a



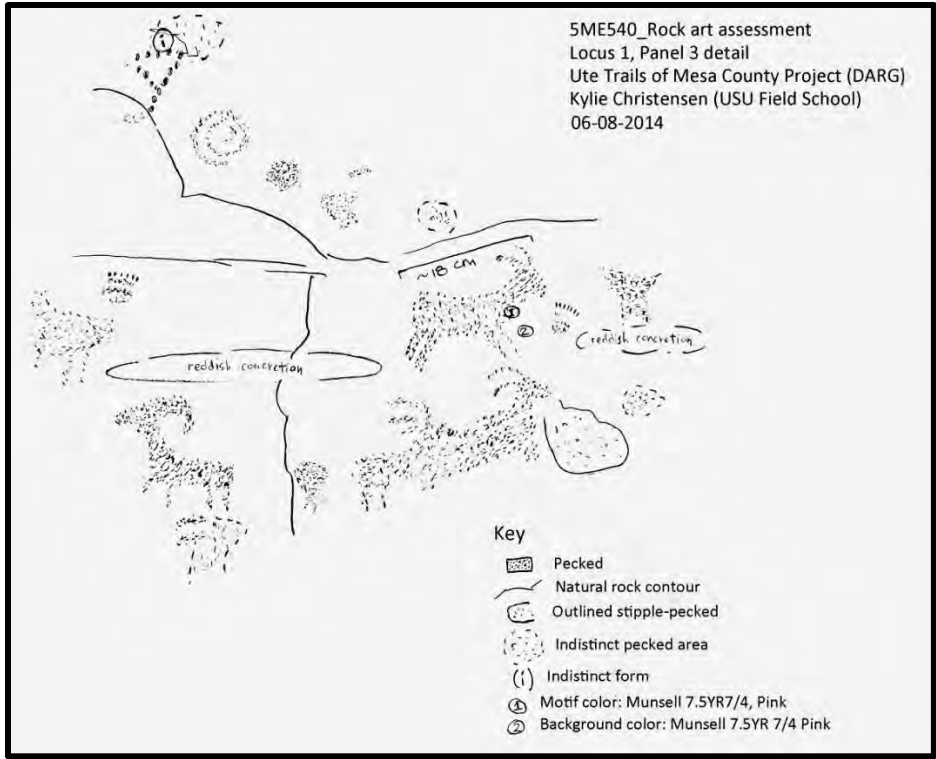
20b

Figure 26. 5ME540, Panel 3: (a) projectile point-like petroglyph and (b) drawing of projectile point and sunburst motif (Figure 19d photograph).

Petroglyphs in Panel 3 (on the east) have a range of imagery and repatination levels indicating differences in age and cultural-stylistic affiliations (Figure 27). Possible Basketmaker II-III or Fremont style petroglyphs comprise an anthropomorph with broad shoulders and rounded head, possible bird forms including one that is headless, and adjacent quadrupeds with similar repatination levels. Nearby darkly repatinated, bear paw print motifs (segmented) may be of Basketmaker or Archaic origin. These types of representations are typical of Basketmaker II-III rock art in the San Juan and Dolores River drainages and Fremont in the Uintah Basin, Roan and Tavaputs plateaus, and Little Dolores River-Glade Park area (Cole 1999, 2009; Ives 1986). Other elements in Panel 3 are probably associated with Fremont culture including a variety of quadrupeds, segmented bear paw print motifs (lighter repatination), a spiral (probably post-A.D. 900), and indistinct forms that may represent anthropomorphs (one possibly embellished with dots). The dot motif suggests Fremont style anthropomorphs in the comparative areas (Cole 2011a).



27a



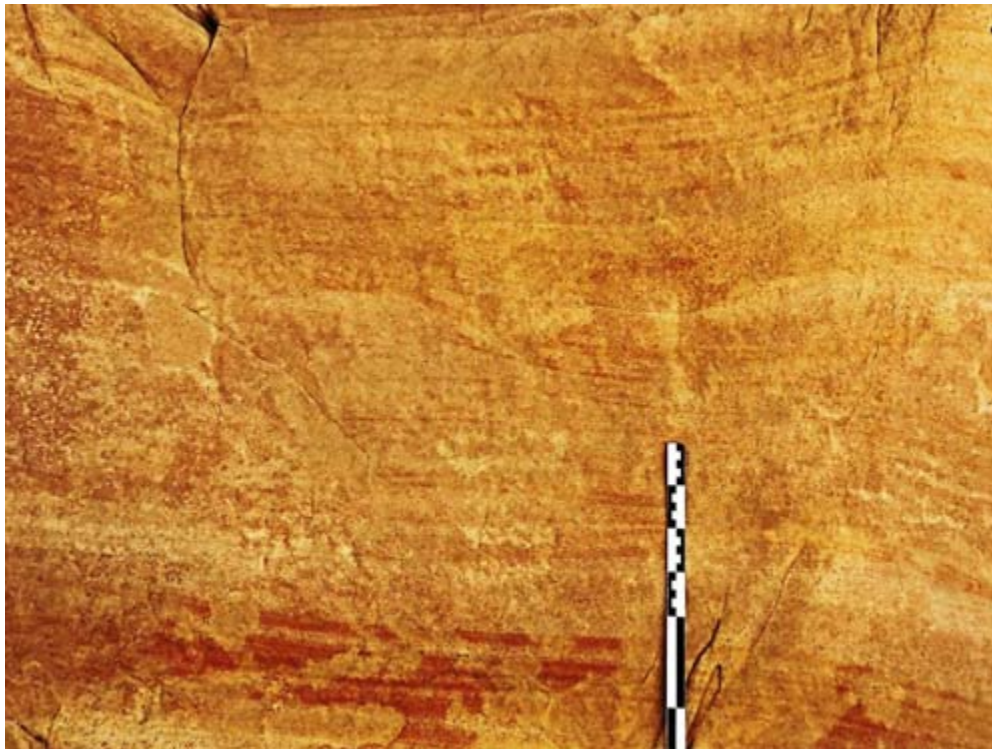
27b



27c



27d

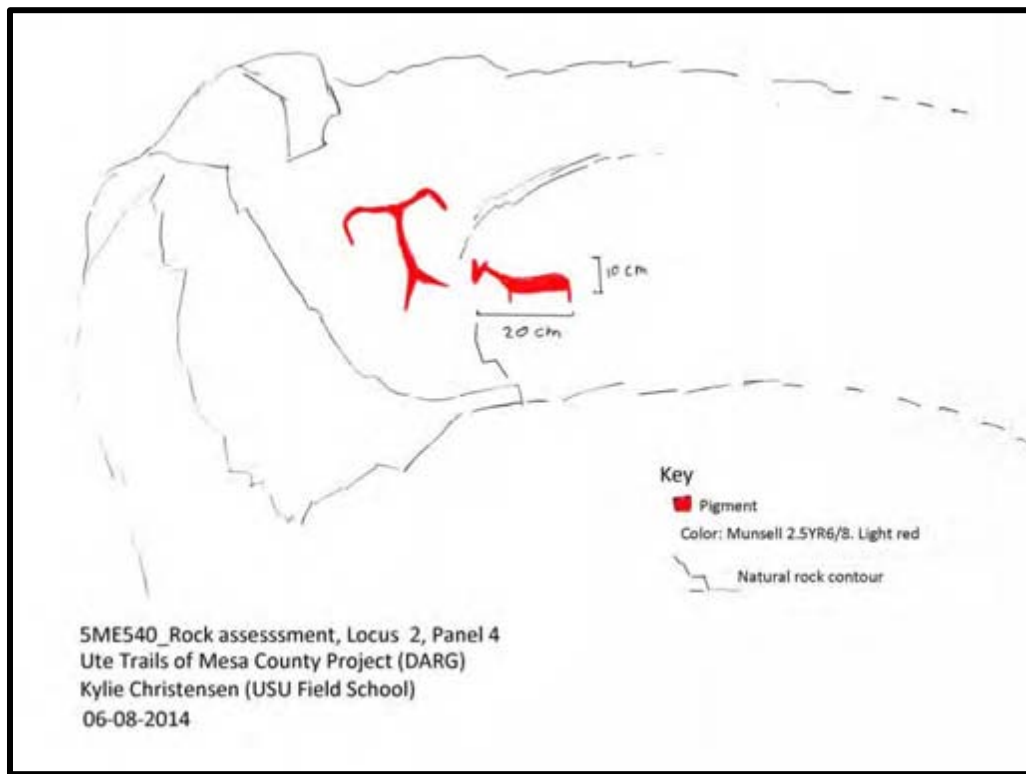


27e

Figure 27a–e. 5ME540, Panel 3: (a-e) Drawings and photographs showing details of possible Ancestral Pueblo (Basketmaker II-III–Pueblo I), Fremont, and Archaic petroglyphs. More heavily repatinated paw print motifs probably date from Archaic or Basketmaker periods.

Fremont-associated rock art has the widest distribution at SME540 and appears to dominate the west side of the site, although some heavily eroded and vandalized quadrupeds and other elements may date from the Archaic period (Figure 28). Red paintings in Panel 4 showing a stick figure anthropomorph (possibly headless) juxtaposed with a animal with upright ears are attributed to the Fremont based on the subject matter, a persistent theme of Barrier Canyon style and San Rafael style Fremont rock art in eastern Utah, and use of red paint as previously discussed for other Fremont-related sites in the McDonald Creek corridor (Figure 28a-c).

Groups of quadrupeds in Panels 5 and 6 resemble Fremont-related work on the Tavaputs Plateau and in the nearby Glade Park area (Cole 2011a; Matheny et al. 2004; Spangler 2004) (Figures 28d-f). Petroglyphs in Panel 7 share the anthropomorph-animal theme of Panel 4 and the small Panel 7 anthropomorph is typically Fremont style in appearance (broad-shouldered and wearing an eared headdress) (Figures 28g-h). The head of the figure was made within a natural cliff depression creating relief suggestive of a mask. Similar headdresses as well as masklike or embellished faces are common in Fremont-related rock art of the Uintah Basin and in the Glade Park area (Castleton 1979; Cole 1999b, 2004, 2009, 2011a; Schaafsma 1971, 1980)



28a



28b



28c



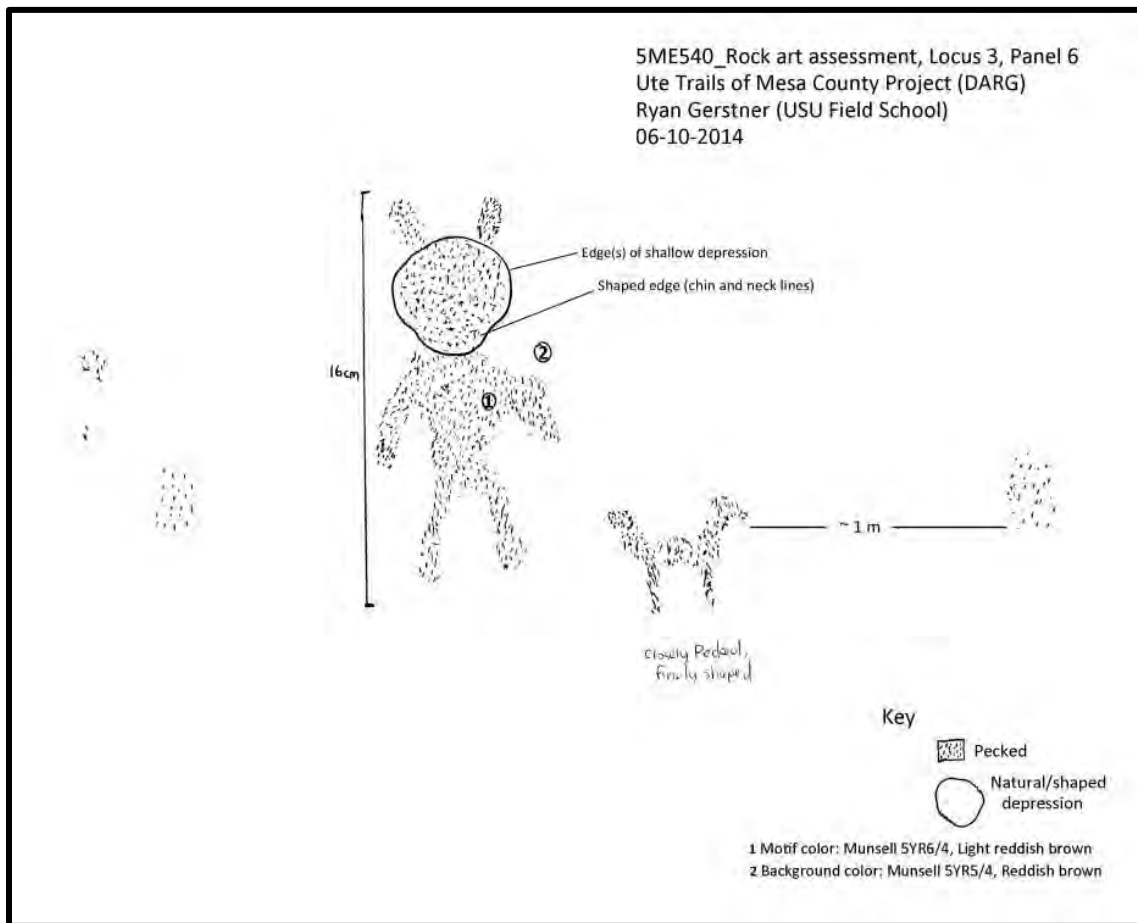
28d



28e



28f



28g



28h

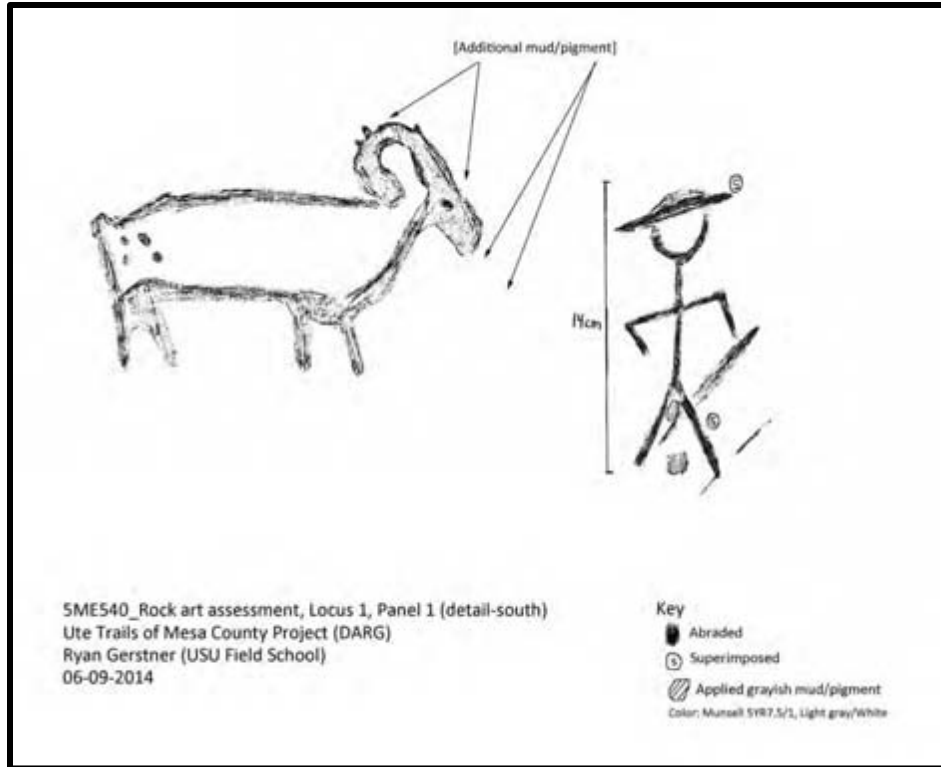
Figure 28a–h. 5ME540: (a)–(c) Fremont style paintings in Panel 4; (d) eroded petroglyphs of quadrupeds in Panel 5; (e) quadrupeds in Panel 6; and (f)–(h) anthropomorph, animal, and pecked circle form in Panel 7.

Petroglyphs of possible historic Ute origin are in Panels 1 and 2 on the east side of 5ME540 (Figure 29). The petroglyphs comprise scratched and abraded human forms (broad-shouldered and stick-figure) that are repatinated to a degree that suggests historical age. The elements are intermingled with gray mud paintings of unidentified forms (one possibly an animal with a tail). One of the human figures appears to superimpose the tail of the animal and a less repatinated, scratched line superimposes both elements (Figure 29a). In light of the presence of nearby historic inscriptions and extensive graffiti, the makers of the subject rock art may have been Euroamerican.

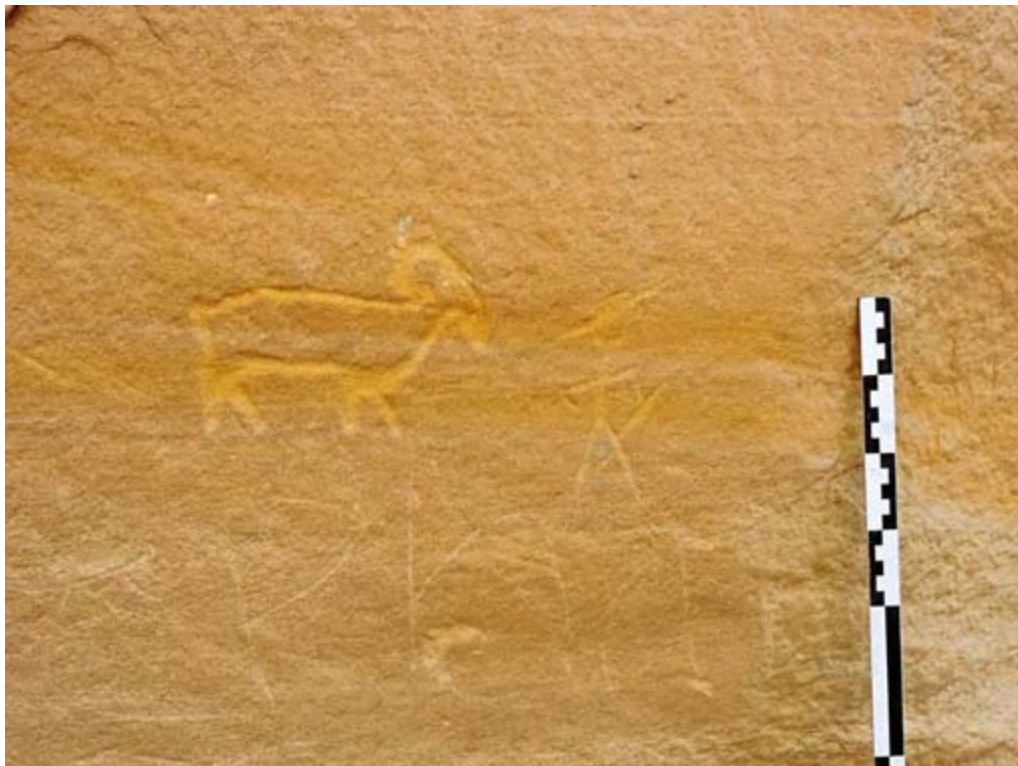


29a

Other possible Ute petroglyphs are deeply etched motifs of a person wearing a broad-brimmed hat and holding a bladelike object juxtaposed with a quadruped with curved horns, presumably a bighorn or domestic ram (Figure 23b-c). The overall subject matter, particularly a bighorn if that was depicted, seems consistent with historic Ute interests. However, the figures stylistically resemble historic aspen carvings attributed to Mexican and Basque livestock herders in western Colorado and a herder using the shade and water in McDonald Creek may be the source of the petroglyphs (personal records with regard to aspen art in the Uncompahgre National Forest).



29b



29c

5ME529

The final McDonald Creek location is a sheltered camp and/or ceremonial site in a cliff alcove offering a commanding view of the Colorado River and landscapes to the south (Figures 1 and 30). The setting was probably a landmark for down-canyon travelers as well as for those approaching from across the river and along the shores, and the alcove may have served as a defensive lookout for canyon dwellers and travelers over time. Some rock art images are visible from the canyon floor and lower benches and presumably were more obvious when fresh. Despite the prominence and open visibility, entry to the alcove and close access to the rock art and associated features and activities may have been restricted by occupants over time. Subjects and themes of the site's prehistoric rock art are ceremonial suggesting it was a destination for affiliated societies on both sides of the river over time. In this sense, it potentially transmitted worldviews and socioreligious practices across cultural landscapes and boundaries.



30a



30b

Figure 30a–b. Alcove at 5ME529: views (a) northeast toward student archaeologist and white and red paintings on the alcove rear wall and (b) from the alcove looking southwest across the Colorado River.

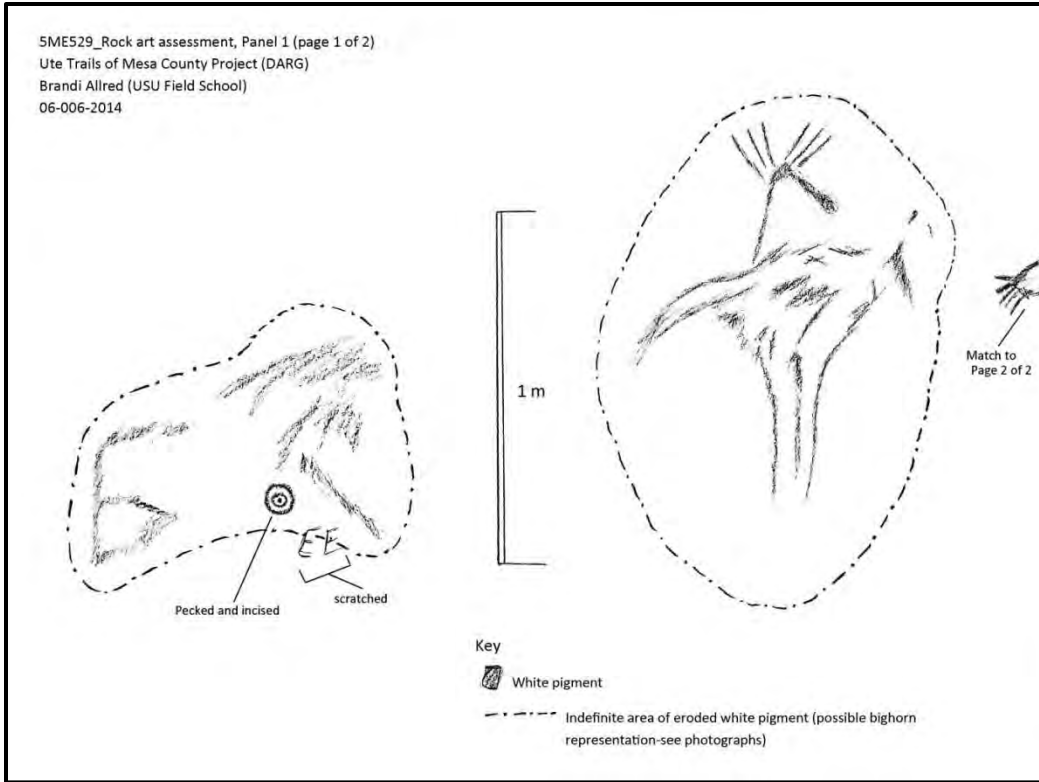
Rock art at 5ME529 (Panels 1-3) includes prehistoric Fremont style paintings and petroglyphs dating A.D. 400/600–1300/1500 and additional petroglyphs that are possibly contemporaneous. Historic inscriptions and motifs are also present. Bullets, abrasion, scratching, and graffiti have damaged rock art in various locations at the site. The present study focuses on Fremont and potentially related rock art in Panels 1 and 2. These are situated on the rear alcove wall (Panel 1) and on a series of boulders at the base of the wall (Panel 2). The representations are comparable to rock art in the Book Cliffs, Tavaputs and Roan plateaus, and Uintah Basin to the north and in the Little Dolores River-Glade Park area across the river to the south. There also are obvious similarities to rock art in the San Rafael Fremont region to the west. Beyond subject matter and themes, techniques of manufacture and types of modification

parallel examples in the comparative areas (Castleton 1978; Cole 1990, 2009, 2011a; Creasman 1982; Schaafsma 1971).

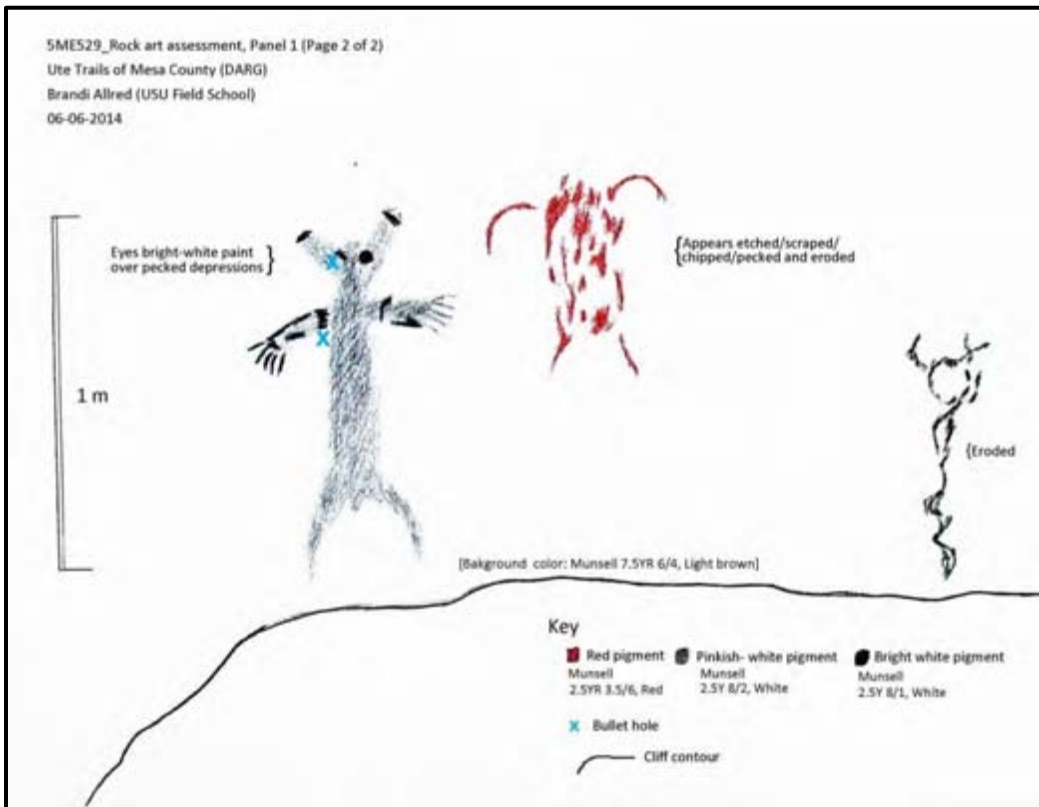
The more distinct elements in Panel 1 are (left to right) a white animal (possible bighorn) with a petroglyph-bull's eye motif in the "heart"; a white broad-shouldered anthropomorph with pinched-waist, hair-bobs or earrings, and fringelike headdress; a white anthropomorphic-bear with indistinct headdress, pecked and painted eyes, and arm bands; a red anthropomorph; a white, upright horned-snake motif; and a relatively small white figure (possibly an anthropomorph) and nearby white marks (Figure 31). The possible bighorn and broad-shouldered anthropomorph are heavily eroded (Figure 31e-h). The bearlike figure is painted in two shades of white: bright-white ear stripes, eyes, arm bands, and fingers or claws over grayish white and pecked areas (Figure 31i-j). The red figure appears headless but the head may have been removed when the form was modified by chipping, pecking, scraping, and/or etching, probably during the prehistoric era (Figure 31k). The reworking does not appear recent, and examples of Fremont style rock art north and west of the study area are modified in similar ways. Barrier Canyon style imagery at Colorado and Utah sites is also similarly changed, possibly by Fremont (Castleton 1978-1979; Cole 2004, 2009).



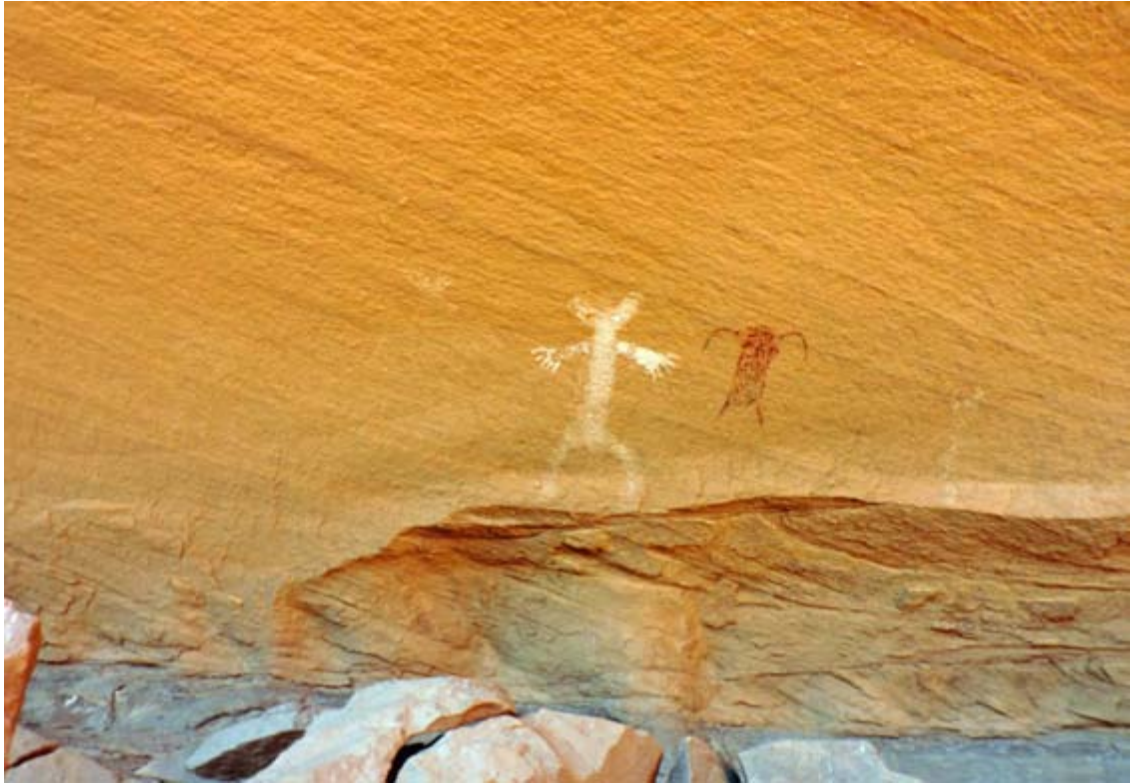
31a



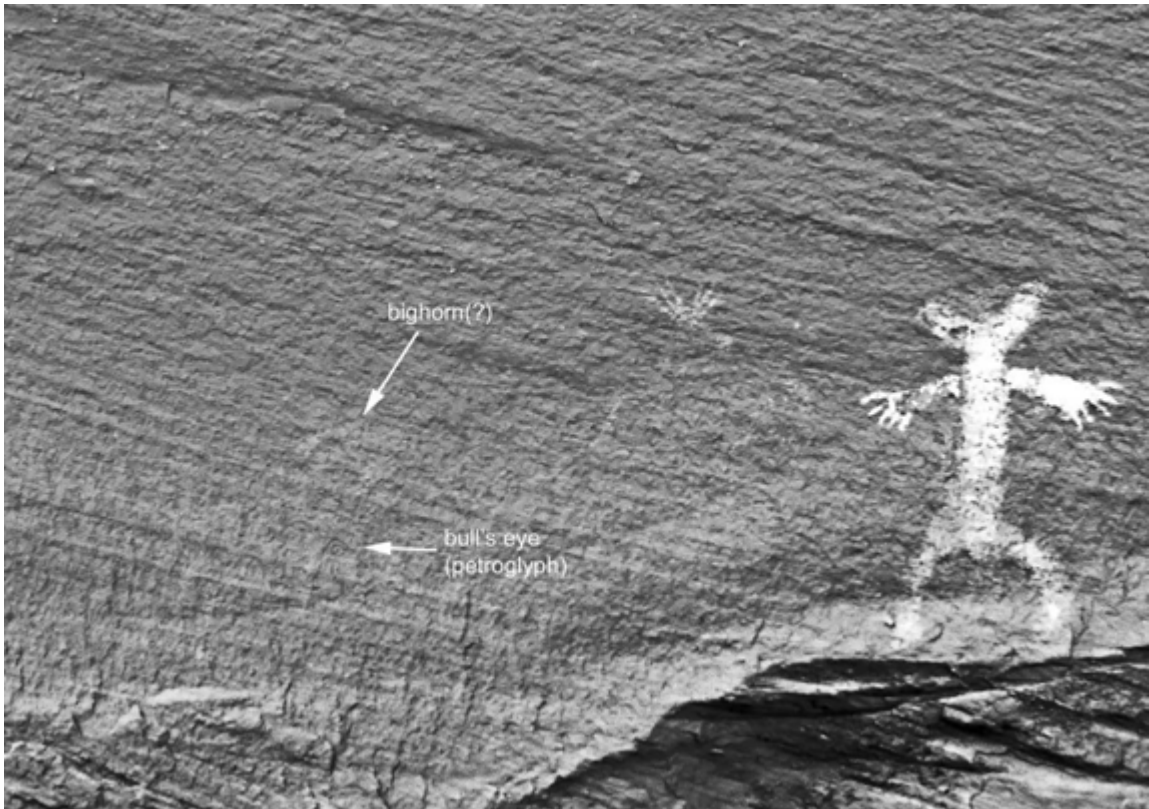
31b



31c



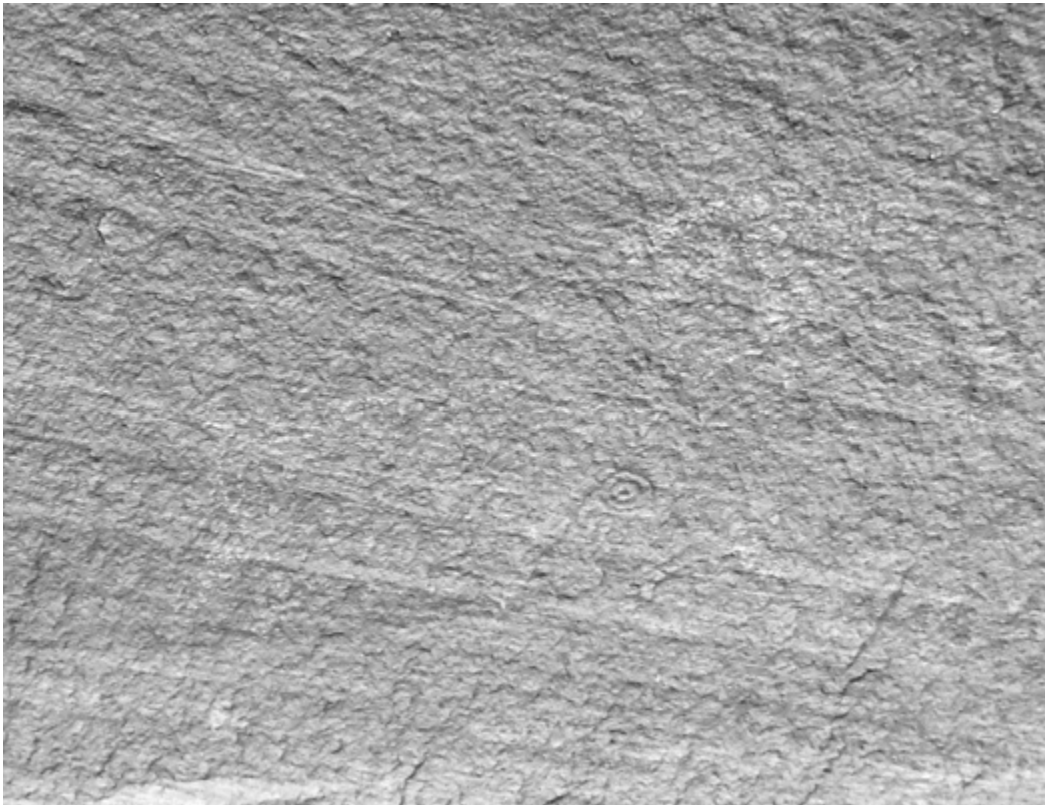
31d



31e



31f



31g



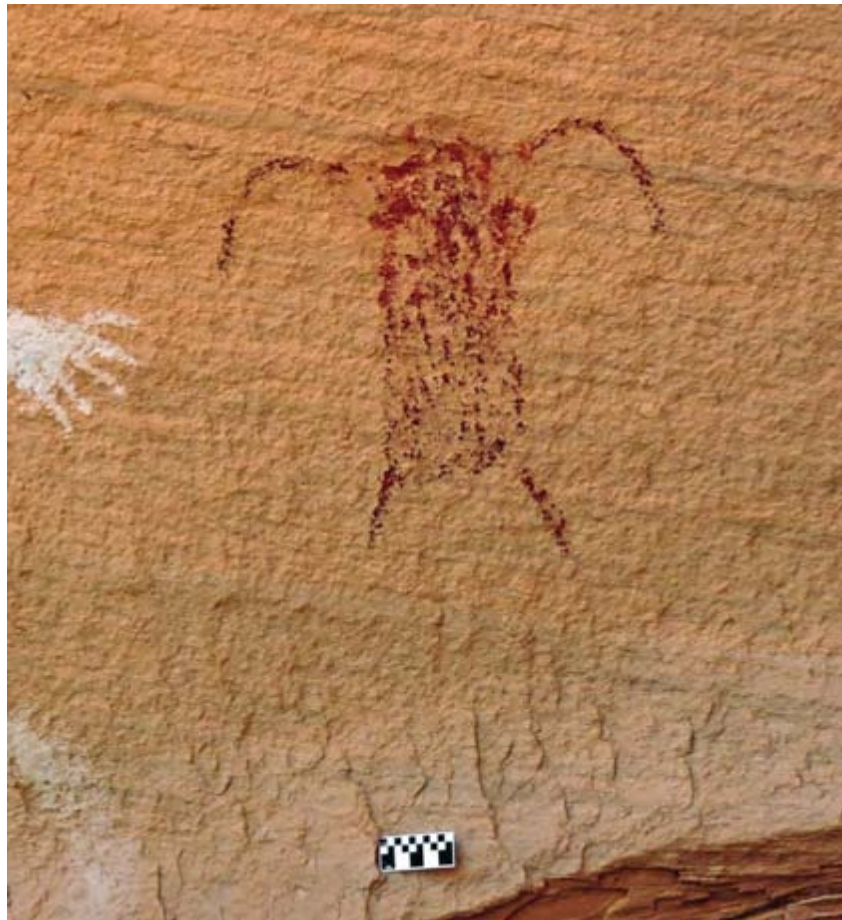
31h



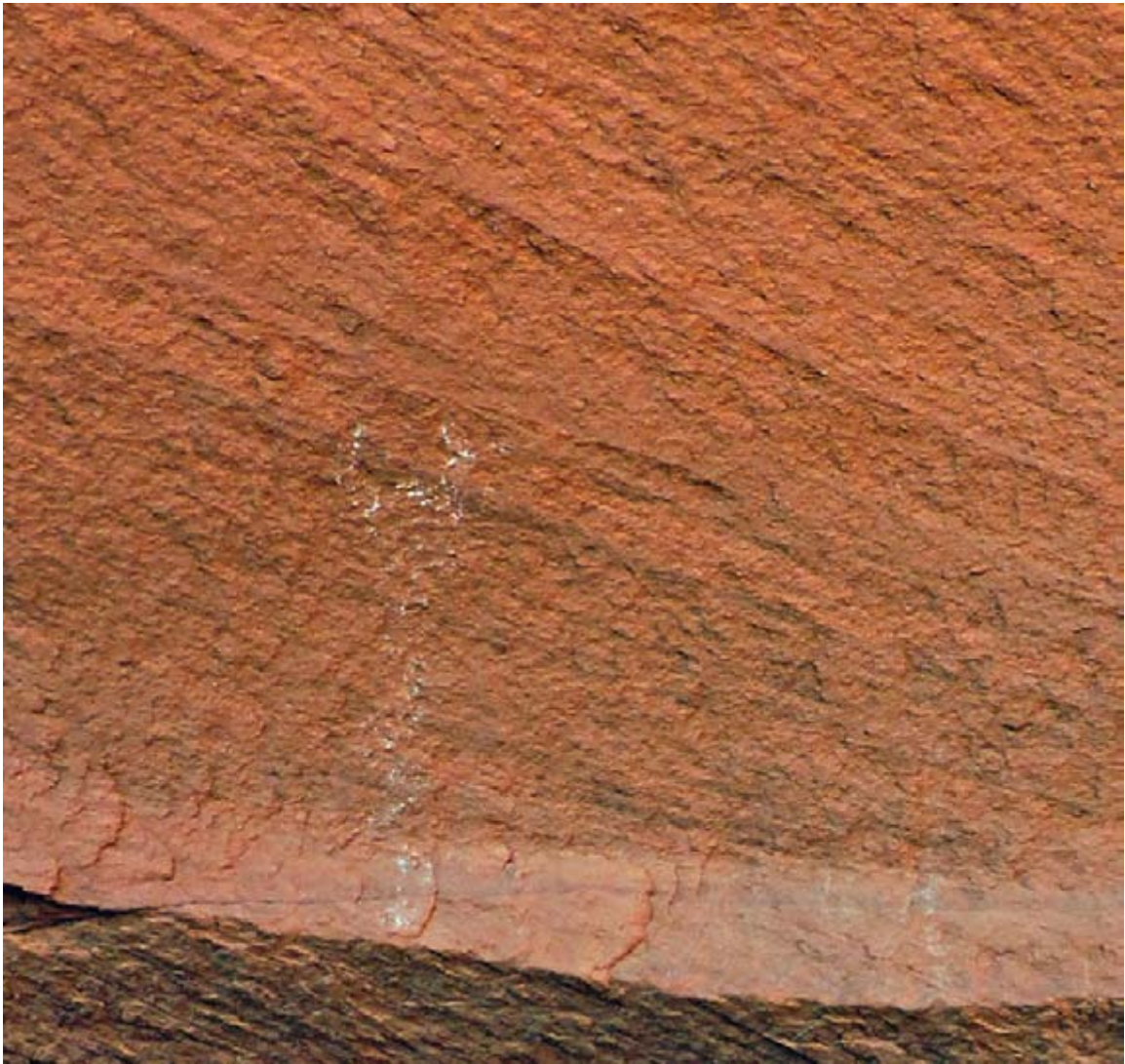
31i



31j



31k



31l

Figure 31a–l. 5ME529, Panel 1 photographs and drawings: (a) overview to northeast; (b) left section drawing; (c) right section drawing; (d) central section; (e) annotated-B/W detail of left section; (f) detail of faint white animal form (possible bighorn) and bull's eye motif and (g) B/W image of same; (h) color-enhanced anthropomorph with hair-bobs/earrings and headdress with anthropomorphic-bear figure; (i) detail of bearlike head with "headdress" and arm band; (j) detail of bearlike arm band and fingers or claws; (k) modified red figure; (l) right section detail of horned-snake motif and indistinct paint and possible anthropomorph at lower right.

Petroglyphs in Panel 2 at 5ME529 show five bear track motifs (front-broad and segmented and rear-unbroken, footlike pattern), a possible anthropomorphic stick figure, and shallow V-grooves and abrasions on fall boulders below Panel 1 (Figures 32-33). The track motifs and a few elements of similar repatination were probably made by Fremont, perhaps in conjunction with the making of Panel 1 paintings or during related activities. Bear track motifs (segmented and not) are common petroglyph subjects in west central Colorado and neighboring areas from Archaic through Formative Ancestral Pueblo and Fremont times (Buckles 1971; Castleton 1978-1979; Cole 1999, 2009).

The Panel 2 track motifs are situated on four generally flat, horizontal surfaces suggesting the movement of bear(s) across the alcove floor, generally southwest to northeast, ending in the vicinity of the white anthropomorphic-bear in Panel 1 (Figure 32). The layout combined with subjects and themes displayed in the paintings, reinforces the possibility the site was a ritual destination. Similar bear-track petroglyphs on the cliff at 5ME540, upstream, are attributed to Fremont and Basketmaker or Archaic groups. A “walking sequence” of footprints (or rear bear tracks) and other paw-like representations on boulders at site 5ME792 in the Little Dolores River-Glade Park area are thought to be Fremont in origin (Cole 1990). Interestingly, the projected bear path through the alcove at 5ME529 fits the generalized trajectory of travel from the Glade Park area, across the Colorado River, toward and into the alcove (Figure 1).

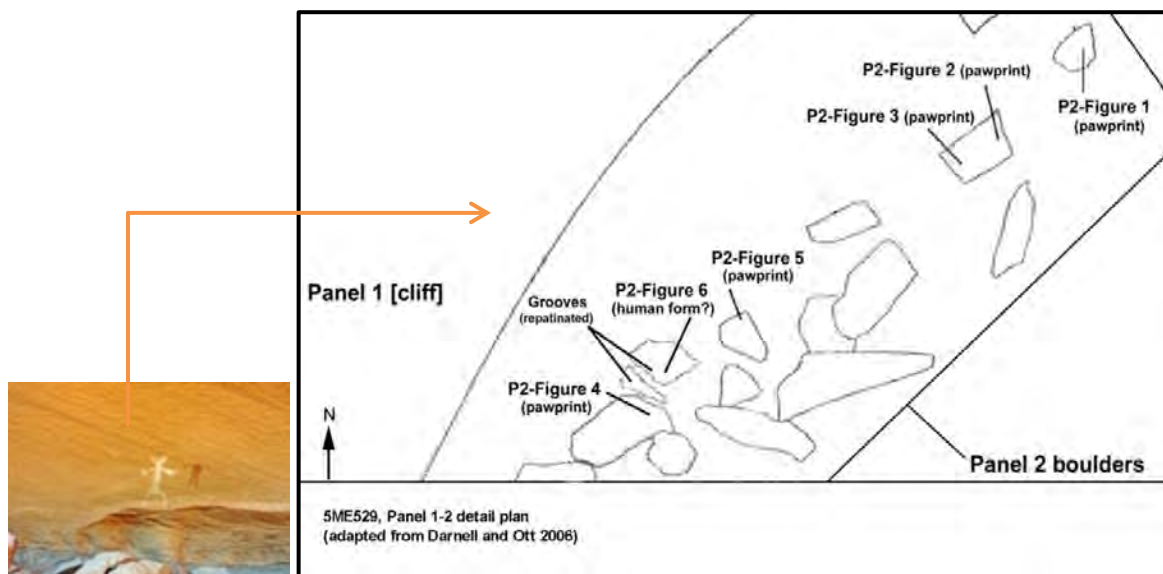


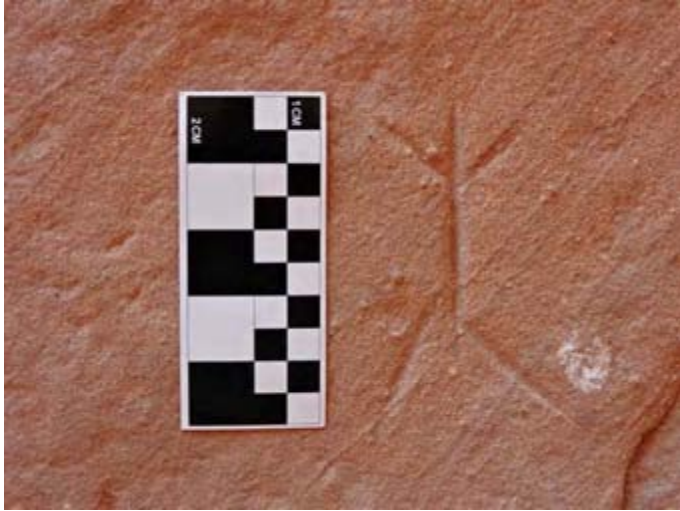
Figure 32. 5ME529 plan showing layout of Panel 2 ear track motifs and other boulder petroglyphs.



33a



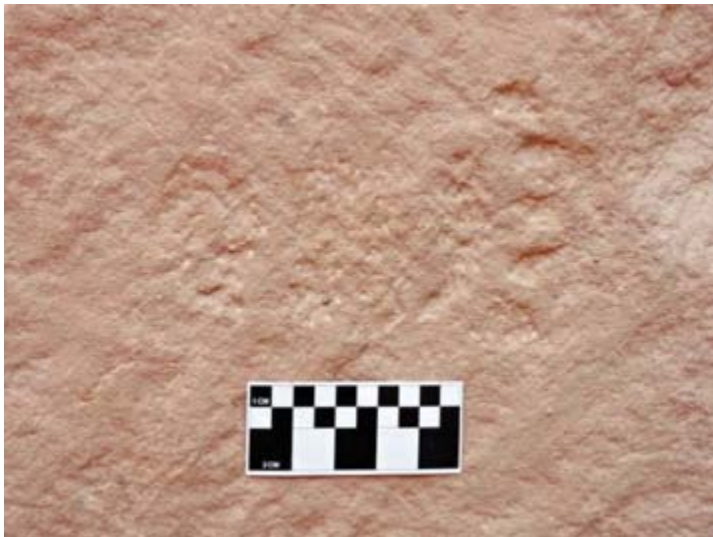
33b



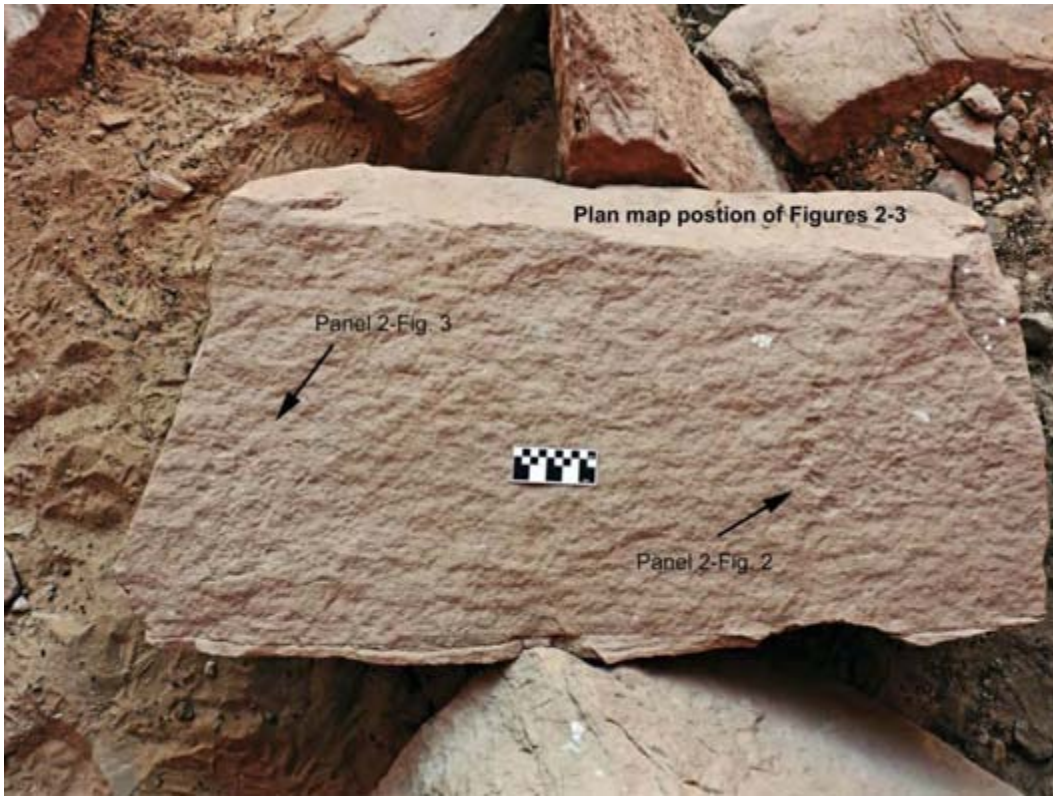
33c



33d



33e



33f



33g

Figure 33a–g. 5ME529, P2: (a) drawing of bear track motifs; (b) boulder petroglyphs showing possible stick-figure human form, grooves, and north most bear track motif; (c) detail of stick figure; (d)–(g) track petroglyphs in order of N-S distribution (see use of natural depression for heel in 27d, “heel-swirl” resembling an actual impression in 27e, and “ball-joint impressions” in 27d-g).

East Trail

Five rock art sites on the projected trail across the western slope of Grand Mesa to the confluence with the Gunnison River are described and discussed from north to southwest beginning with the upper elevation sites followed by three near the river (Figure 1). Site type descriptions beyond rock art are derived from Colorado Cultural Resource Survey records and field data.

5ME8047

The first site, a habitation and petroglyphs, is in piñon-juniper forest. Three basalt boulders with Abstract-Geometric style petroglyphs, dating approximately 4000 B.C. to A.D. 500/1000 (Cole 2009, 2011a), are on the slope of a low ridge with features including rock structures above. Radiocarbon dates from the general site area suggest it was occupied between 1250 B.C. and A. D. 1 (*Period 4*), perhaps by migrants (Conner et al. 2014). The subject boulders are not particularly prominent with regard to size or shape but the imagery probably was quite visible when fresh as historic petroglyphs on basalt often appear white (Castleton 1979; Schaafsma 1980). Most interestingly the three petroglyph boulders are situated in near north-south alignment (340° at 10° declination) (Figure 34).

Linear motifs predominate and some pecked lines intricately follow and incorporate natural contours suggestive of landscapes; Panels 1 and 3 are densely covered with lines; dot motifs occur on Panels 1 and 2 (Figures 35 and 36). The north-south boulder alignment suggests the panels were utilized for rituals associated with celestial or calendric events. Prehistoric alignments involving rock art, boulders, and architecture with proposed cosmological/calendric significance occur at a range of Ancestral Pueblo sites (Malville 2004, 2006; Williamson 1987). These types of activities are significant in the context of travel and migration corridors and socioreligious communication.

The levels of petroglyph weathering and repatination support an Archaic origin and indicate the motifs were made over a significant period of time. A number of the petroglyphs are heavily eroded and difficult to distinguish, particularly in Panel 3. A few petroglyphs with relatively light repatination are in Panels 1 and 2. If the panels predate the structures on the ridge above, their presence may have influenced that choice of settlement and construction in a ritual place. Less repatinated elements on the boulders were presumably made by later occupants, probably Formative in age. The size and setting of the petroglyph boulders indicate they were not intended to attract the public (for example, travelers) but were created and utilized for purposes of interest to locals and possible migrants over time.



Figure 34. 5ME8047, Panels 1–3 alignment.

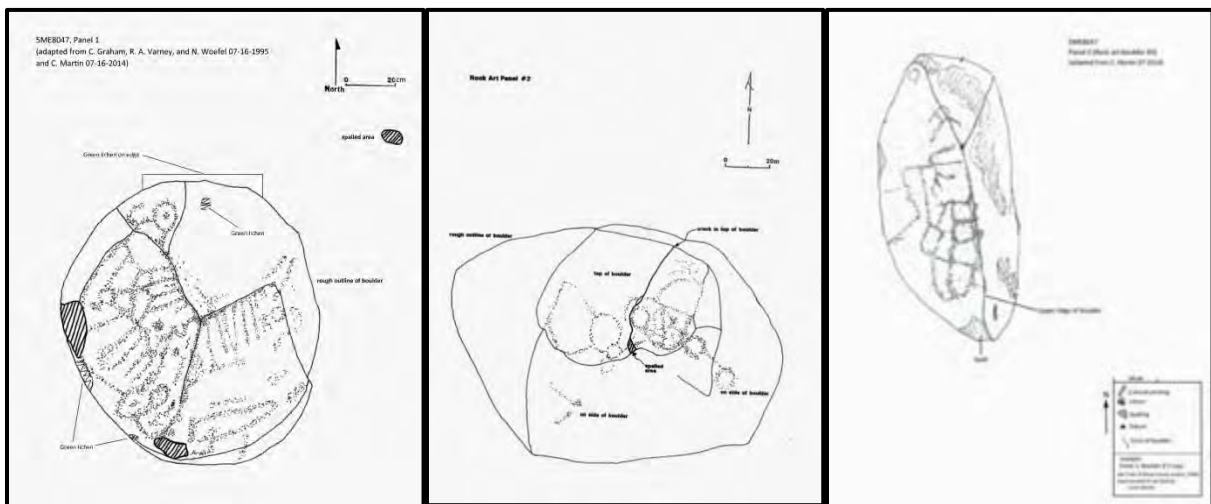


Figure 35. Drawings (left to right): Panels 1–3 at 5ME8047.



36a



36b



36c



36d



36e

Figure 36a–e. 5ME8047 petroglyph boulders: (a)-(b) Panel 1, two views; (c)-(d) Panel 2, two views; and (e) Panel 3.

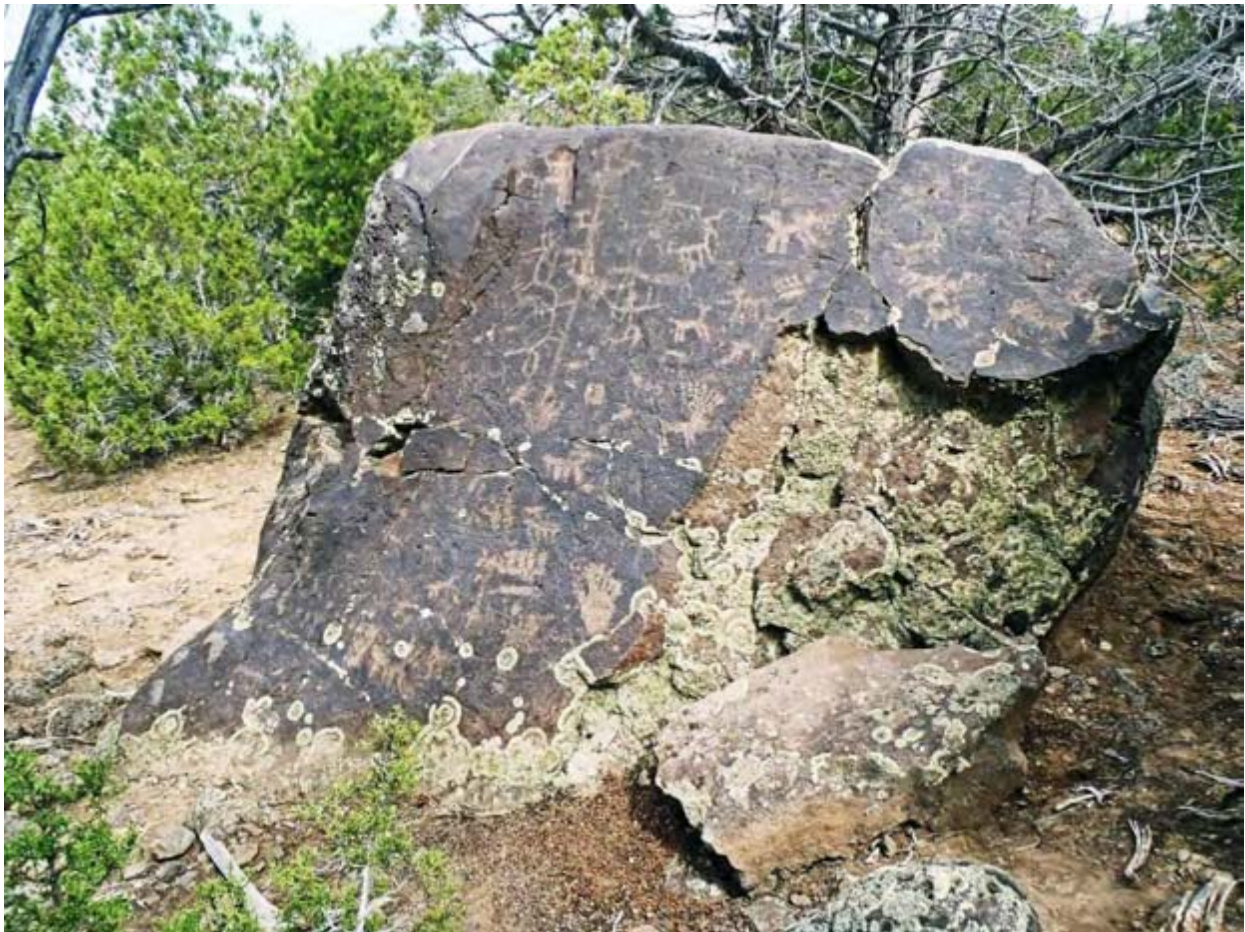
5ME3768

The second Grand Mesa trail site, a possible camp, features Uncompahgre style petroglyphs on three basalt boulders in piñon-juniper woodland. The Panel 1 boulder is notably large and Panel 2 boulder is upright and distinctive in shape. Petroglyphs in Panels 1–2 are typical Uncompahgre style; Panel 3 petroglyphs are less typical but not inconsistent with the style. The boulders are on the bank of the adjacent creek bed where they are likely to have been viewed by prehistoric groups using the waterway (and associated trail).

Uncompahgre style is primarily regional in scope and numerous sites are in the Uncompahgre Plateau and Grand Mesa areas and similar rock art is found in neighboring mountainous areas (Cole 1990; 2009). The distribution and associated material culture suggest origins among the Mountain Tradition described by Black (1991). Uncompahgre style is proposed to date from the Archaic into the Formative period in west central Colorado,

approximately 1000 B. C. or earlier to A.D. 1000 (Buckles 1971; Cole 1999; 2009, 2011a; Conner et al. 2011, 2014; Wormington and Lister 1956).

The petroglyph motifs include representations of paw prints or tracks (segmented-front paw of a bear track and rear bear paw or human foot print with linear attachment); hand print; various quadrupeds with tails and curved or upright horns, ears, and/or antlers; stick-figure humans (static and active); and geometric forms including circular, branching, and interconnected lines and dots. Repatination levels, superimpositions, and techniques in Panel 1 indicate two or more time periods were involved (Figure 37).

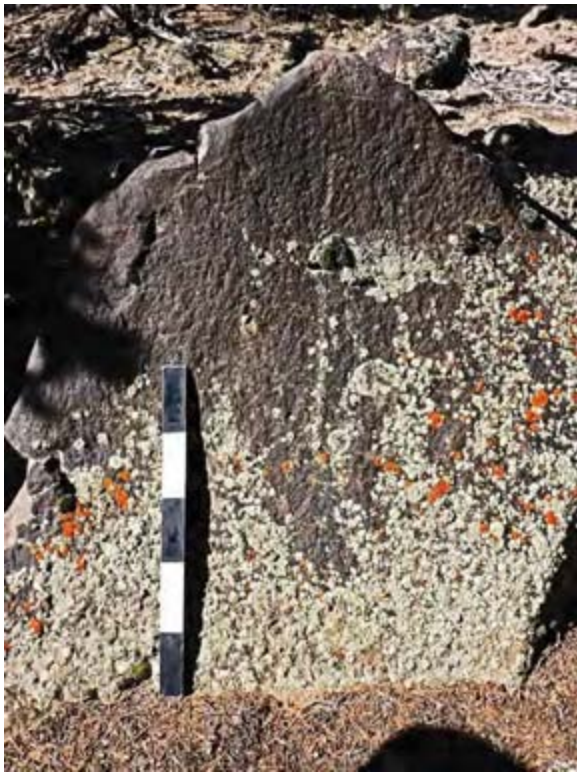


37a



a

37b



37c



37d

Figure 37a–d. 5ME3768: (a) Panel 1 (Richard Ott photograph); (b) Panel 1 detail; (c) Panel 2; and (d) Panel 3.

5ME164

The site is a sheltered camp with an extensive array of petroglyphs in a side drainage of a canyon leading to the Gunnison River. Five of the six total panels are clustered on boulders and cliffs near rock shelters evincing occupation (Figure 38). They are openly displayed but not visible from the main canyon. Presumably, they were intended for the site occupants and visitors over time. The petroglyphs are weathered and numerous elements are significantly eroded and difficult to examine; graffiti and bullet holes have caused further damage. The rock art indicates the site is particularly significant for a study of prehistoric cultural traditions and affiliations in west central Colorado. Unfortunately, the rock shelters have been extensively looted, reducing possibilities for archaeological clarification.

The site exemplifies common use of sites by makers of Abstract-Geometric and Uncompahgre style petroglyphs between 1000 B.C. or earlier and A.D. 1000 and offers insights into the nature of Archaic populations assumed to have long histories in the study area. The rock art weathering, spatial organization, and patterns of use suggest the makers were residents and affiliated over time, perhaps sodalities within an Archaic population such as the Uncompahgre Complex (Wormington and Lister 1956) and Mountain Tradition described by Black (1991). (A similar situation exists at site 5DT355 illustrated in Figures 2d and e and 4c.) Black's construct points to Great Basin connections evident in Abstract-Geometric style petroglyphs (Cole 2009). Archaic social complexity may explain shifts in population dynamics reflected in the radiocarbon record explored by Conner et al. (2011, 2014). A hand or paw print motif and quadrupeds at the site may be of historic Ute origin and are possibly connected to Ute use of nearby trail sites 5ME580 and 5ME163.

Variations in repatination and patterns of erosion support Archaic origins. In general, the Abstract-Geometric imagery seems older but there are more panels of that style and they are very exposed to weather. Although Uncompahgre style petroglyphs are generally less darkly repatinated than those of the Abstract-Geometric, both show considerable age and support contemporaneity at points in time. Panel situations and view shed indicate certain petroglyphs were associated with occupants of particular shelters. For example, abstract-geometric forms in Panels 1 and 2 were probably created by occupants of central Shelter C where the imagery was adjacent and/or exclusively in direct view over time. A relatively small number of Uncompahgre style elements also border that shelter lending support to the possibility that both groups participated in the rock art system.

Abstract-geometric type petroglyphs comprise precisely made wheel-like forms with "spokes" and other embellishments including a central "sunburst"; lines (mostly curvilinear, some mazelike; some encircle or are appended to other motifs including the distinctive wheel-like forms); dots (large and small, individual and in rows); wicket or arch-like forms; netlike forms; straight, zigzag, and wavy lines; chains of circles; and triangles. Consistent with the style tradition, a few representational motifs including paw prints, a possible handprint, foot prints,



38a



b

Figure 38a–b. 5ME164 rockshelter bordered by cliff petroglyphs.

and snakelike forms are juxtaposed with the abstract-geometric motifs. Panel 1-petroglyphs on the east side of a large tilted boulder, are of particular interest with regard to the Abstract-Geometric expression. The general N-S alignment of the boulder and use of the east face suggests the distinctive “wheel” and sunburst motifs may have had astronomical and calendric significance (Figure 39). The boulder and overall site setting provide good opportunities for groups to observe light and shadow phenomena associated with rock art and possibly other features at the site (Cole 2009; Malville 2006; Williamson 1987).



39a



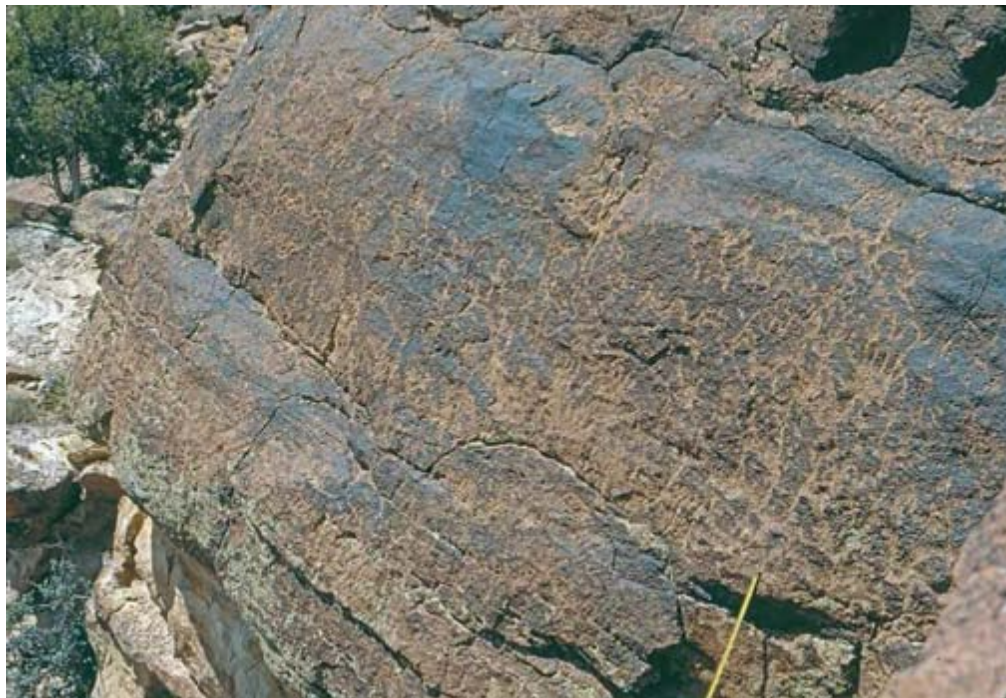
39b



39c



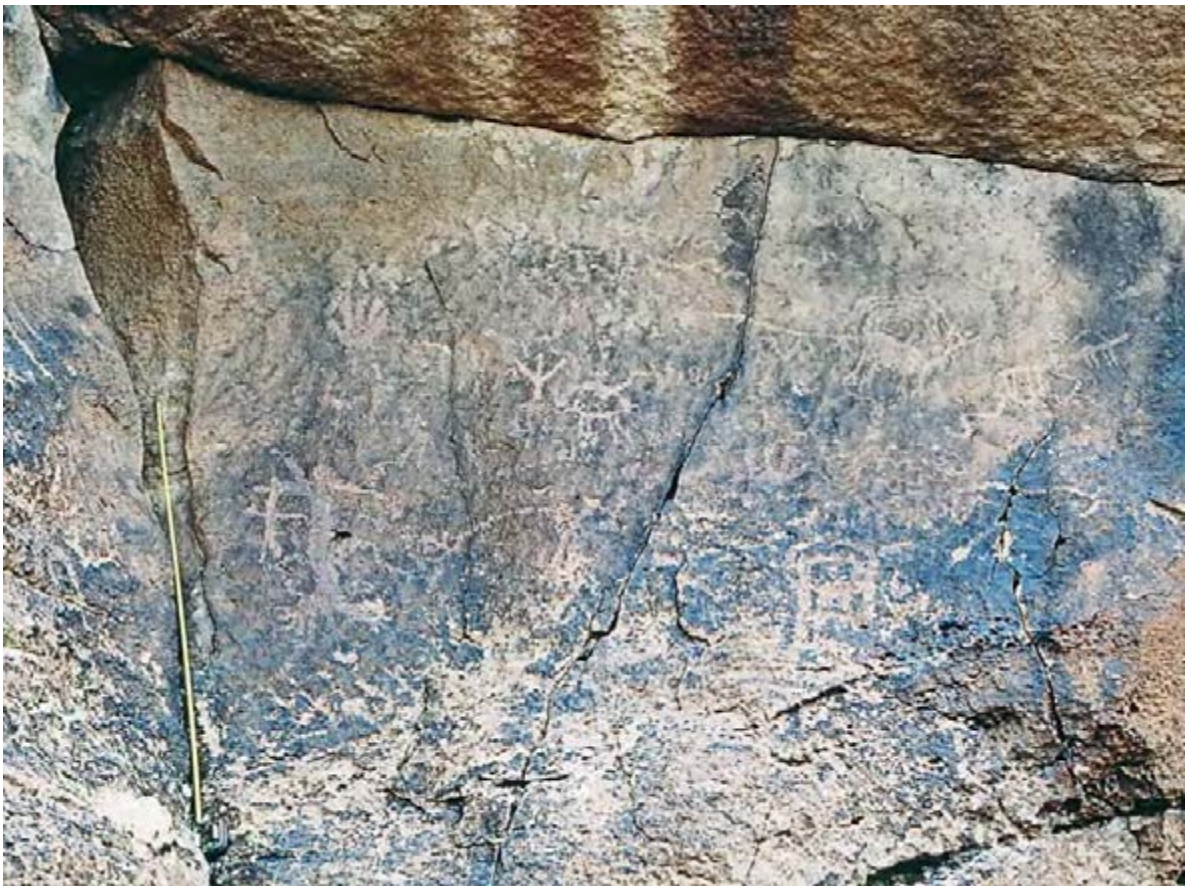
39d



39e

Figure 39a–e. 5ME164 Abstract-Geometric style petroglyphs: (a) Panel 1 overview; (b) detail of Panel 1 “wheel” and other motifs; (c) close detail of Panel 1 sunburst and other motifs; (d) Panel 2 overview; and (e) closer view of Panel 2 linear motifs, triangles, and hand/paw print motifs.

Panels 3–6 at 5ME164 exhibit Uncompahgre style human and animal forms. Wheel- and netlike forms and other linear motifs in Panels 3 and 4 are probably components of Abstract-Geometric style (Figure 40). Uncompahgre style petroglyphs include representations of paw/hand-print motifs; linear motifs; bird-track form; slender human forms with raised arms; snakes; and quadrupeds shown individually and in rows and groups. Narrative content is implied by the appearance and relationships among elements. Animals variously exhibit antlers and cloven hooves, upright horns or ears, and long tails (possible felines or canines). A quadruped in Panel 5 appears to be shown full-face, a rare position in Colorado Plateau and other rock art. With the exception of a single quadruped with large antlers in Panel 6, all Uncompahgre style imagery is near rock shelters and panels of Abstract-Geometric style. The small lone animal is remote, located at the edge of the site and well away from other panels. It presumably served a different function and may have had more private use or marked “entry” to the site and contact with affiliated societies.



40a



40b



40c



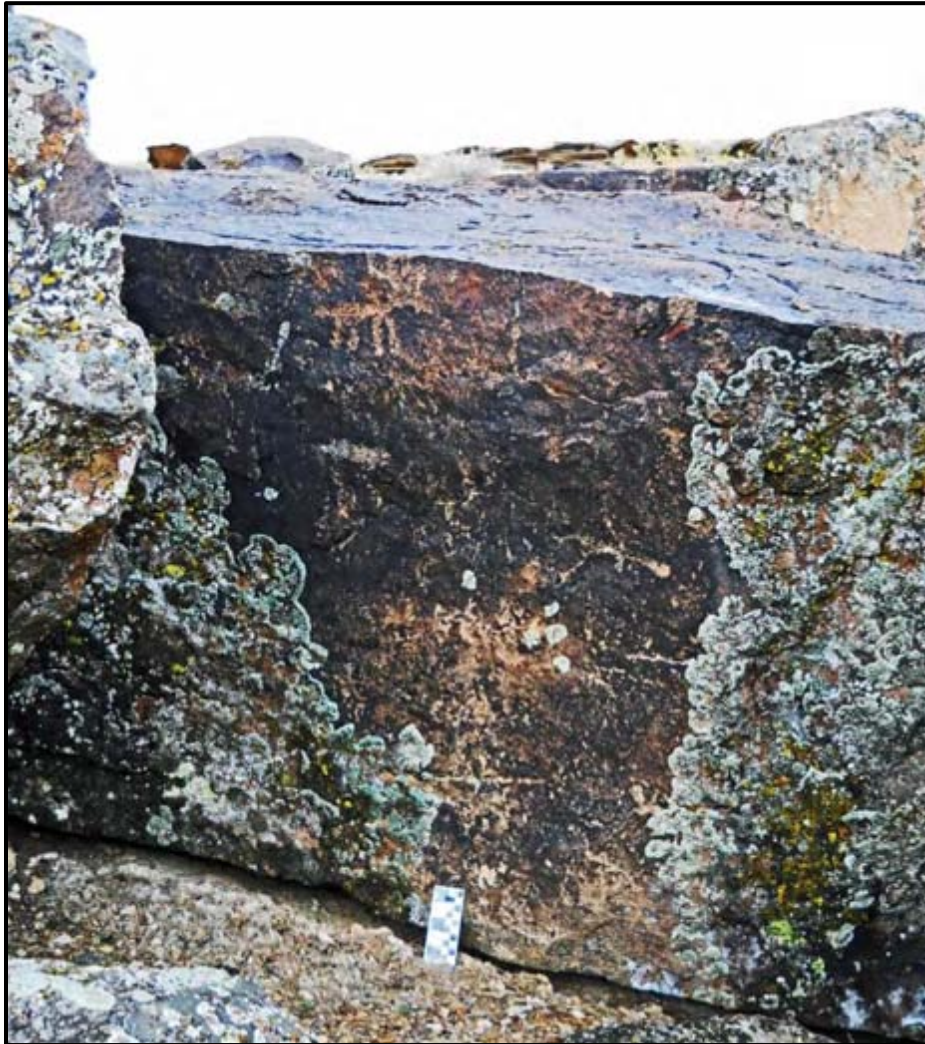
40d



40e



40f



40g

Figure 40a–g. 5ME164 Uncompahgre style petroglyphs: (a) Panel 3 human, animal, and linear motifs (1m scale); (b) Panel 4 animals and paw/hand print motifs and bullet holes; the lightly repatinated and possibly re-worked hand/paw motif may have been made by Ute; darker hand/paw motifs may be components of the Abstract-Geometric style also represented in the panel); (c) Panel 4 lower detail; (d) Panel 5 group of Uncompahgre style quadrupeds with various repatination levels and bracket-like form (brownish-more recent motifs possibly of Ute origin); (e) Panel 5 overview with scale; (f) Panel 5 enlarged view of central, grayish-older animal in rare facing position; and (g) Panel 6 isolated, lone quadruped with typically large antlers at edge of site.

5ME580

The sheltered camp at the edge of a seasonal drainage is characterized by rock shelters, petroglyphs, and paintings. The setting is similar to that of nearby 5ME164 but the rock art panels are generally small and less visible and the information was probably intended for occupants. Prehistoric (probably Uncompahgre style) and historic Ute styles are present (Buckles 1971; Cole 1990, 2009) (Figures 41 and 42). The prehistoric elements are eroded and faint; historic Ute style images are relatively well preserved. A radiocarbon sample from a vandalized feature at the site has an uncalibrated date of 2040 ± 70 RCYBP (McDonald et al. 2010) indicating the presence of Archaic–early Formative occupants (Conner et al. 2014) and correlating with the estimated age of Uncompahgre style (~1000 B. C. to A.D. 1000).

The possible Uncompahgre style imagery occurs in Panel 2 and comprises an indistinct, eroded red painting of an animal (probable bighorn) that may have been pecked prior to painting or the motif is a combination of the two techniques (Figure 41). The curved horns appear pecked and over-painted. Indistinct pecking suggestive of a human form is near the animal (a common theme of Uncompahgre style). Examples of pecked and painted imagery, including combination forms, occur at regional Uncompahgre style sites but are not common (Cole 1990, 2009).



41a



41b

Figure 41a–b. 5ME580, Panel 2 prehistoric type petroglyphs and paintings: (a) overview in dim light showing red and pecked animal (above scale) and possible pecked human form to the right; (b) detail of pecked and painted animal. (Photographs by Richard Ott)

Panels 1, 3, and Panel 4 comprise early historic Ute style pecked and scratched petroglyphs estimated to date prior to 1850 (Buckles 1971; Cole 1988, 1990, 2013). Panel 1 at 5ME580 is a well preserved example of Ute scratched and scratched-abraded petroglyphs, a technique likely derived from the Great Basin and Intermountain-Plains regions and possibly an indication of relatively early Ute use of the site (Cole 2013). The panel shows a quadruped with very large ears and a long tail, possibly a mule or horse (somewhat consistent with petroglyphs in Panel 3) and two detailed tipis. Additional, indistinct scratches may show animals and possibly one or more human forms. The panel is an example of biographic type rock art described for the Intermountain-Plains and present study region (Keyser 2011; Keyser and Poetschat 2008).

In Panel 3, seven or eight pecked animals exhibit various antlers, horns, and/or upright ears. Four quadrupeds have long tails suggesting horses. For one of these, an indistinct, scratched or lightly pecked rider may be signified. A relatively large, unidentified scratched motif is juxtaposed with the animals. The ambiguity with regard to possible horses suggests the rock art was made prior to common use of horses by regional Ute in the 1700s (Baker 2013; Baker et al. 2009, 2013; Cole 2013).



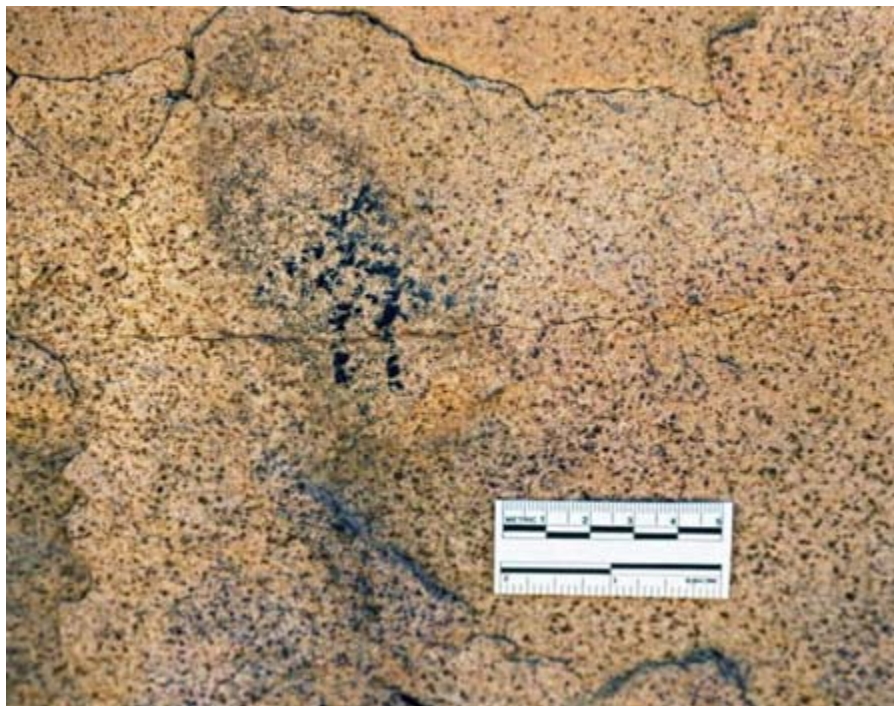
42a



42b



42c



42d

Panel 4 shows a small black figure (charcoal/soot pigment?) that may represent a shield-figure or shield-bearing-warrior of the type portrayed in Pueblo, Fremont, and Plains-Intermountain rock art styles from late prehistoric into early historic times (Keyser 1975, 2011; Cole 1999, 2009). The motif is closely associated with pre-horse and early-horse era warriors using large body shields as opposed to smaller shields later used by equestrians and also depicted in rock art. The possible body shield depiction at 5ME580 supports the impression of a relatively early Ute occupation.



e

Figure 42a–e. 5ME580: (a)-(c) Panel 3 animals and unidentified scratched forms; (d) Panel 4 possible shield-figure in black pigment; and (e) Panel 1 scratched and scratched-abraded animal, tipis, and unidentified motifs. (Photographs by Richard Ott; black and white enhancement by S. J. Cole)

5ME163

The final West Grand Mesa trail site is an open camp near the mouth of a tributary canyon leading to the Gunnison River. Prehistoric and historic styles of petroglyphs are on boulders adjacent to a historical stone structure probably built and occupied by Euroamerican sheep and/or cattle herders after 1880 (Flores et al. 2012) (Figure 1). The site area is easily seen when approaching from the river or down the canyon and the rock art is openly visible when near. It was presumably viewed by the occupants and visitors over time.

Although the site is in the vicinity of 5ME164 and 5ME580, it evinces prehistoric diversity not seen at the other sites and addresses the issue of interaction among societies with presumably distinct lifeways, worldviews, and iconographies. Prehistoric Archaic-based Uncompahgre style (~1000 B.C.–A.D. 1000) and Basketmaker II-III style (1000/400 B.C.–A.D. 600) petroglyphs appear with late historic Ute style petroglyphs (post 1825/1850) in Panels 1a and 1b (Buckles 1971; Cole 1990, 2009) (Figures 43 and 44). Portions of the rock art panels are significantly impacted by graffiti.

Identifiable Uncompahgre style motifs in Panel 1a comprise quadrupeds with antlers, horns, and upright ears, and a vague stick-figure human that appears to hold the right side (as viewed) of a branched, plantlike form of likely Basketmaker II-III origin (similar forms appear in Uncompahgre style). Basket maker II-III style imagery in Panel 1a includes representations of a broad-shouldered human form “holding” the left side of the plantlike form, quadrupeds with ears and tails (possibly canines), a pronghorn, and a concentric circle motif. The broad-shouldered anthropomorph is highly typical of San Juan-related Basketmaker II-III style rock art on the Colorado Plateau (Cole 2009) (Figure 43a-d). A relatively large animal (possible canine) appears to have a dart embedded in the chest.

Distinct pecking techniques are displayed in Panel 1a prehistoric styles. Makers of Uncompahgre style used large peck marks and those making Basketmaker II-III style used relatively small and fine peck marks (Figure 43b-c). The patterns of weathering, repatination levels, and element superimposition indicate the two styles are roughly contemporaneous and themes such as the possibly shared plantlike form support that possibility (Figure 43c-d). The regional Uncompahgre style chronology extends into the Formative period and tracks with Archaic to Formative developments described by Conner et al. (2014) for the study area. Beyond chronology, the rock art points to sociocultural diversity. Insofar as Uncompahgre style is focused in (generally restricted to) the generalize study area and Basketmaker II-III style is linked to major agricultural developments in the greater San Juan and Dolores River areas to the south, the makers of Basketmaker II-III images at 5ME163 were probably migrants.

Panel 1b comprises Uncompahgre style petroglyphs with dark and medium-dark repatination and lightly repatinated late historic Ute style petroglyphs. A finely pecked animal with medium-dark repatination and upright ears and pointed tail may date from Basketmaker II-III times (Figure 44a-c). Uncompahgre style motifs include quadrupeds with upright ears,

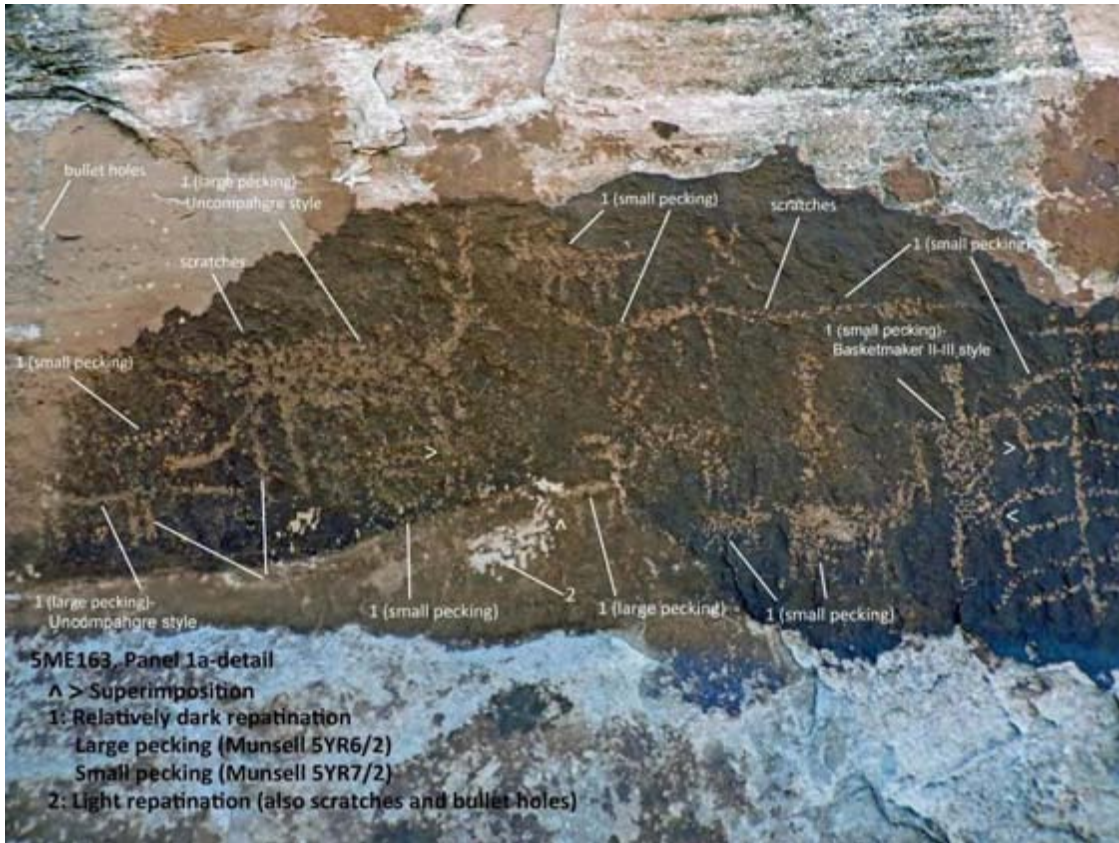
antlers, and curved horns (bighorn), snakelike forms, lines, a possible bird, segmented paw prints, and two branched plantlike forms similar to one attributed to Basketmaker II-III in Panel 1a. A large segmented bear paw print with claws has been precisely over-pecked, probably by Ute judging from the light repatination level. Two time periods are indicated by superimpositions and repatination levels for Uncompahgre style motifs (Figure 44c-d). This suggests a significant gap in site occupation or visitation, which may track with population downturns indicated by the radiocarbon record (Conner et al. 2014).

Ute style pecked, petroglyphs superimpose numerous Uncompahgre style images with similar types of representations including quadrupeds with upright horns or ears, curved horns (bighorn), antlers (deer or elk), a possible rabbit, and a segmented paw print (plus the over-pecked Uncompahgre motif). Other motifs comprise equestrians, human figures (pedestrians), a bull's eye, and a wheel-like form that closely resembles Abstract-Geometric style images at 5ME164 a short distance to the east. Mimicry of this type is reported for Ute rock art elsewhere in western Colorado and for Southern Paiute rock art in northern Arizona (Christensen and Dickey 2007; Cole 1990, 2013; Creasman 1982).

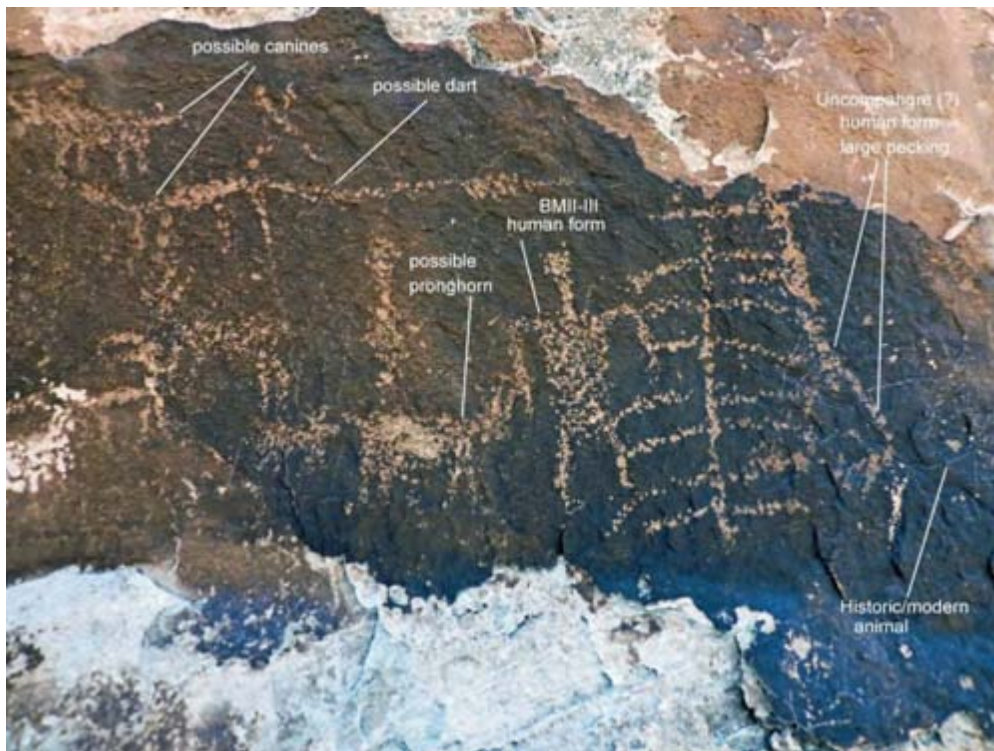
With regard to a Basketmaker II-III presence, it is significant that anthropomorphic figures similar to the one shown in Panel 1a occur across the Gunnison River, a likely extension of the projected West Grand Mesa trail. One of the figures across the river holds a crook-like form resembling wooden planting sticks and (smaller) prayer sticks of San Juan Basketmakers (Kidder and Guernsey 1919; Morris 1980) (Figure 45). Crook motifs are depicted in Basketmaker II-III style rock art in the western San Juan and middle Little Colorado River areas. They appear as individual items and are held or otherwise attached to human figures (Cole 1990, 2009).



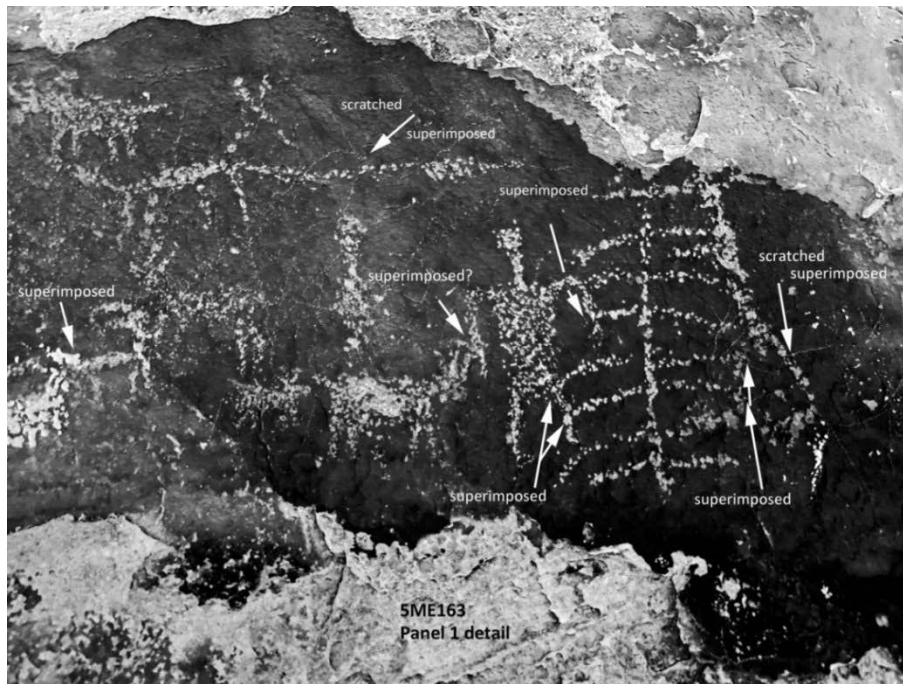
43a



43b



43c



43d

Figure 43a–d. 5ME163, Panel 1a: (a) overview; (b) left-center detail showing styles, pecking techniques, repatination levels, and superimpositions; (c) right-center detail of styles, motifs, and pecking techniques; and (d) superimpositions.



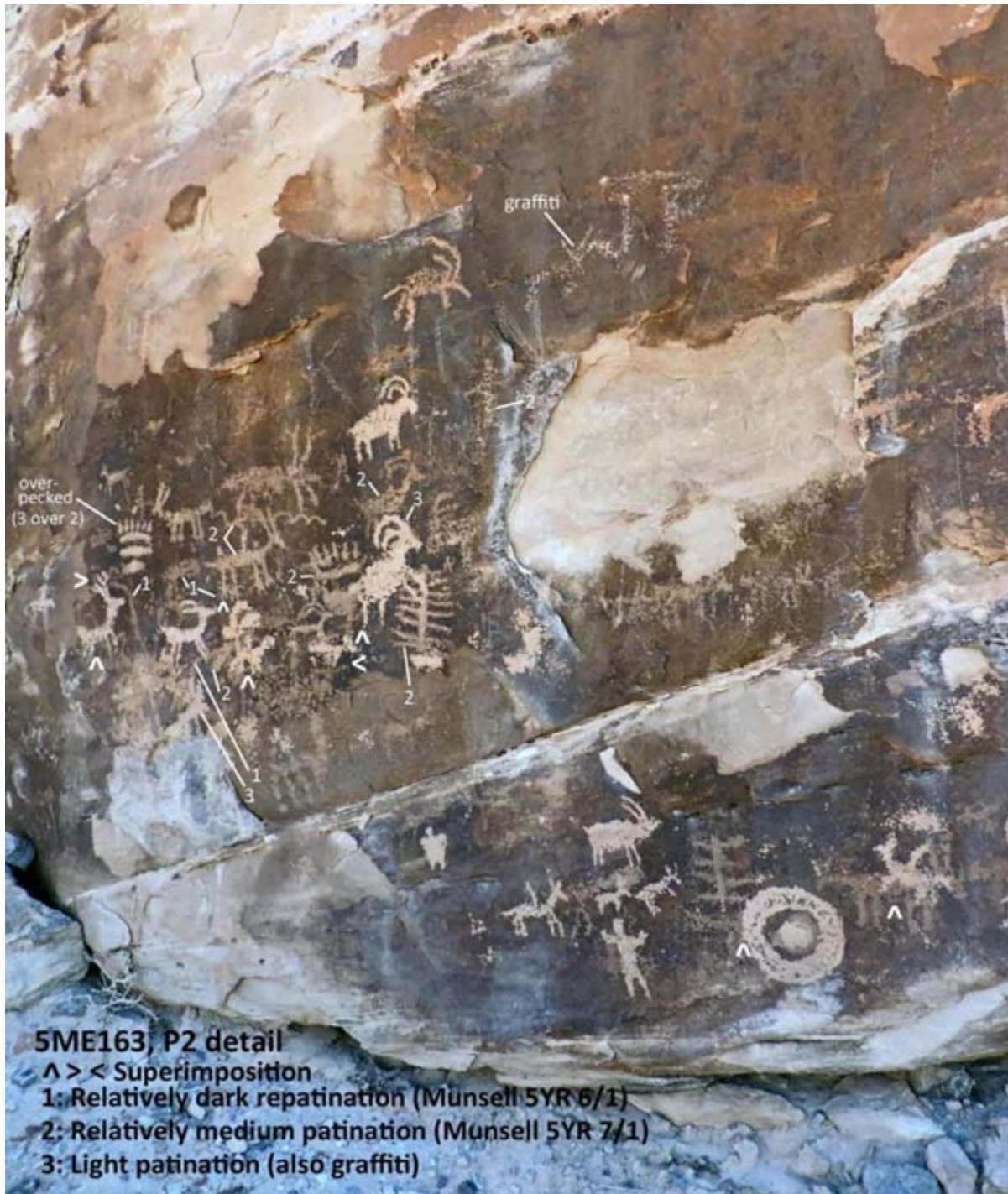
44a



44b



44c



44d

Figure 44a–d. 5ME163, P1b: (a) overview; (b) left-center with scale; (c) detail showing Uncompahgre style repatination levels and superimpositions; and (d) Uncompahgre and Ute styles repatination levels, superimpositions, and over-pecking.

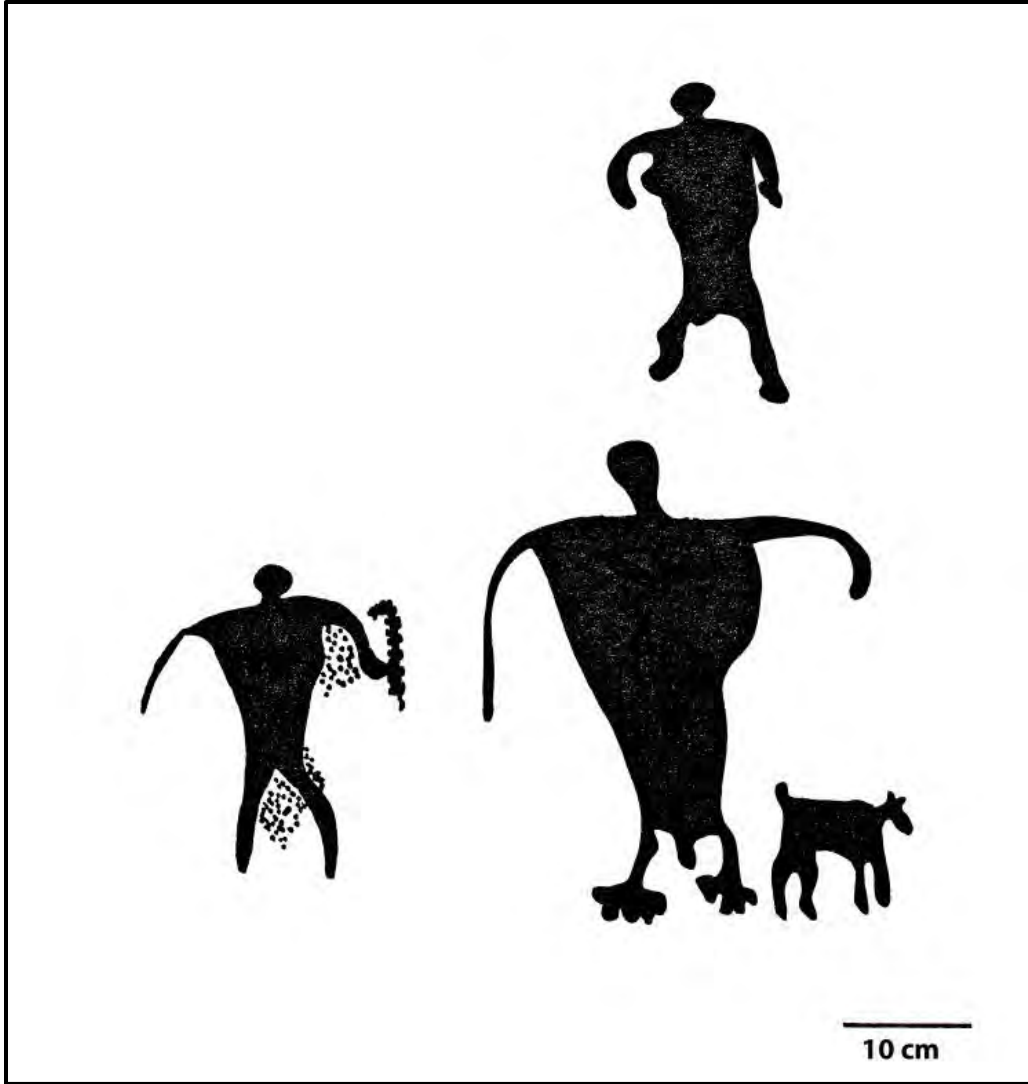


Figure 45. Basketmaker II-III style petroglyphs at site 5ME159 (across Gunnison River from 5ME163).

Regional Distribution and Cultural Dynamics

Rock art styles identified in the projected McDonald Creek and West Grand Mesa corridors are linked to Archaic, Fremont, Ancestral Pueblo, and protohistoric-historic Ute peoples of the Colorado Plateau and Intermountain region (Figure 1). The occurrence at a sample of sites in west central Colorado point to likely homelands and migration paths including the two examined in this study (Figures 46-49).

Uncompahgre style clearly dominates the region in prehistoric times and may have considerable time depth (Figure 46). Abstract-Geometric style occurs throughout the comparative area but the total number of sites is relatively small in comparison with Uncompahgre style imagery with which it occurs at some sites including 5DT355 and 5ME164 (Figures 2d-e, 4c, and 47). As previously discussed, the two expressions were probably contemporaneous at some points in time and are likely to have been made by separate sodalities within a shared cultural tradition. Abstract-Geometric type rock art may have been made by various Archaic cultures across time and space.

The Abstract-Geometric style cuts across geographic and cultural boundaries in the western U. S. and possibly represents types of an ancient symbolic system that endured among various Archaic groups and descendent populations over time. It occurs with the Archaic-based Barrier Canyon style at sites in Utah and in the McDonald Creek corridor at 5ME5259 (Cole 2009). Barrier Canyon style is clearly distinct in subject matter and occurrence from Uncompahgre style. It appears only at the perimeters of west central Colorado despite wide distribution on the Colorado Plateau, from northwest Colorado to near the Arizona Strip in the south (Figure 47). An obvious explanation is territorial domination by makers of Uncompahgre style—the “locals” (Figure 46).

Basketmaker II-III and other San Juan Ancestral Pueblo-related groups also have a small presence in the study area but are well represented elsewhere in west central Colorado. They are concentrated along the Dolores and San Miguel rivers to the south with continuation into eastern Utah (Figure 47). San Juan relationships in these areas are manifested from Basketmaker II through Pueblo II times (~A.D. 100/300–1250) (Charles and Cole 2006; Cole 2009). Their entrée into the heart of the study area may reflect local (Uncompahgre style peoples?) interest in an agricultural lifeway or in establishing trade networks with related groups to the south and west. Panels of, otherwise, Uncompahgre style rock art showing Basketmaker-like broad-shouldered human forms may coincide with these events (Cole 1990, 2011a). Basketmaker and Pueblo routes into the study area apparently involved crossing the Uncompahgre Plateau from the south to reach the Gunnison River at the southern end of the projected West Grand Mesa trail (Figure 48).

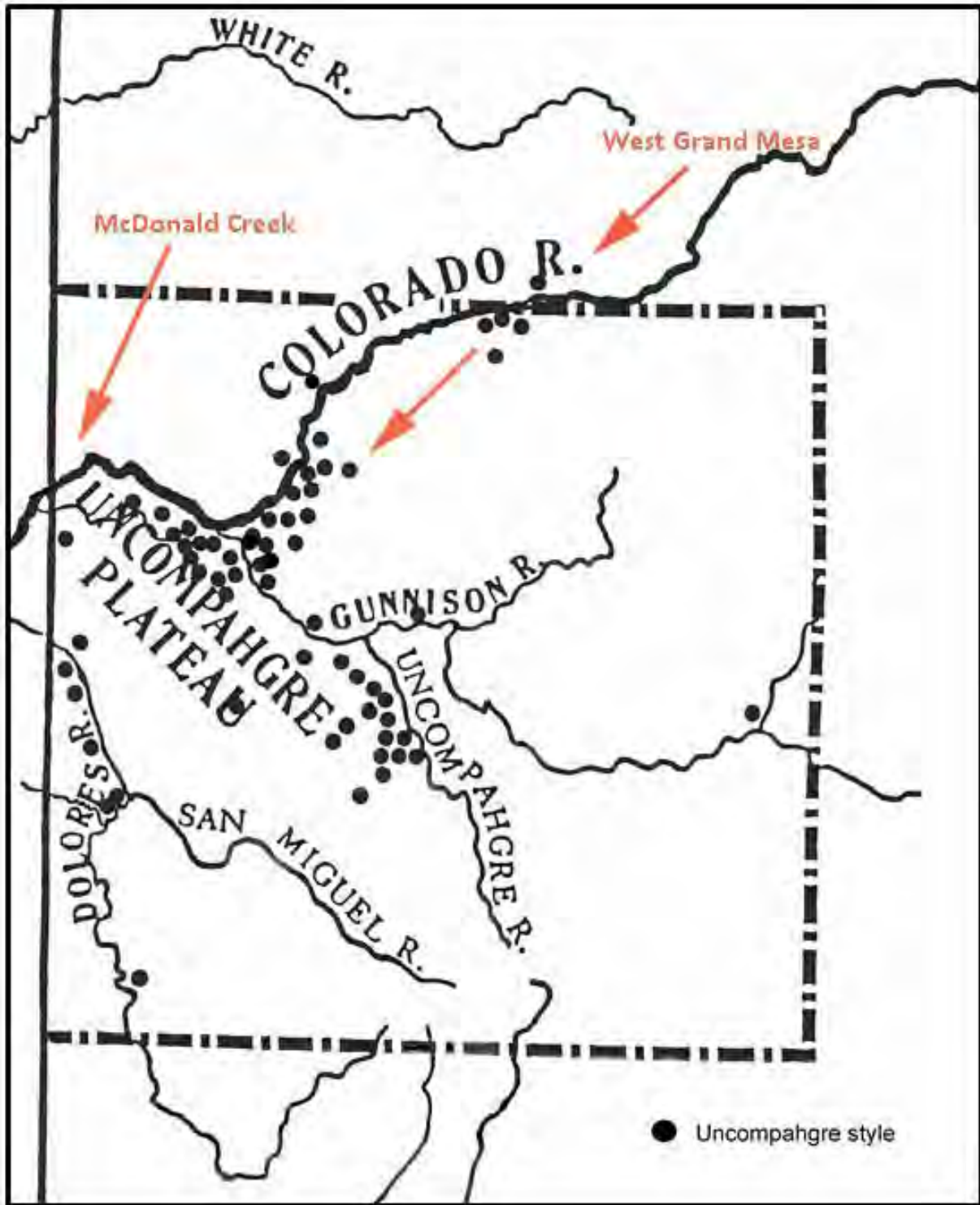


Figure 46. Approximate locations of projected McDonald Creek and West Grand Mesa trails and 64 sites with Uncompahgre style rock art in west central Colorado (Cole 1990, 2011a).

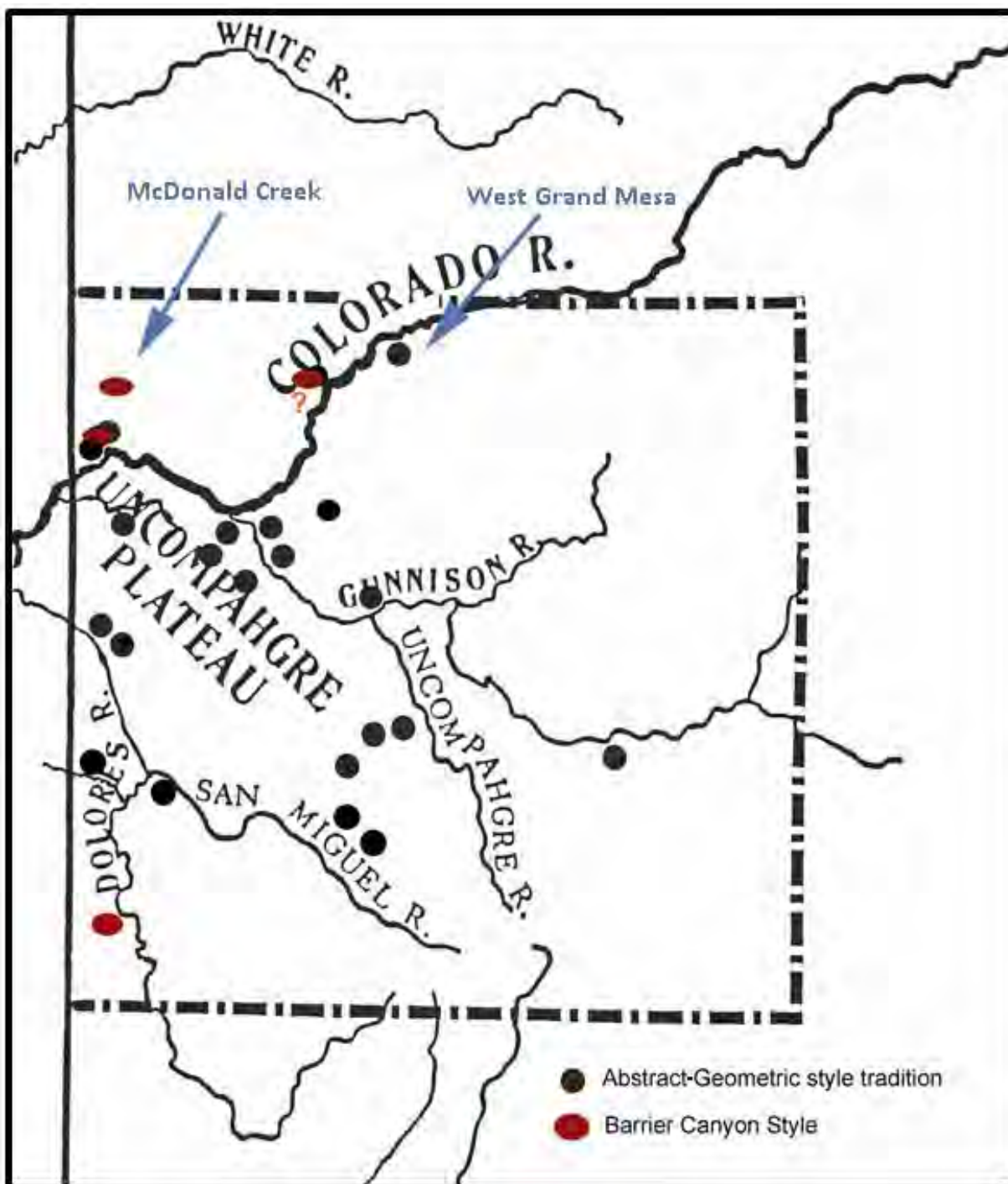


Figure 47. Approximate locations of projected McDonald Creek and West Grand Mesa trails and 22 Abstract-Geometric style sites and 4 sites (1 uncertain) with Barrier Canyon style rock art in west central Colorado (Cole 1990, 2011a).

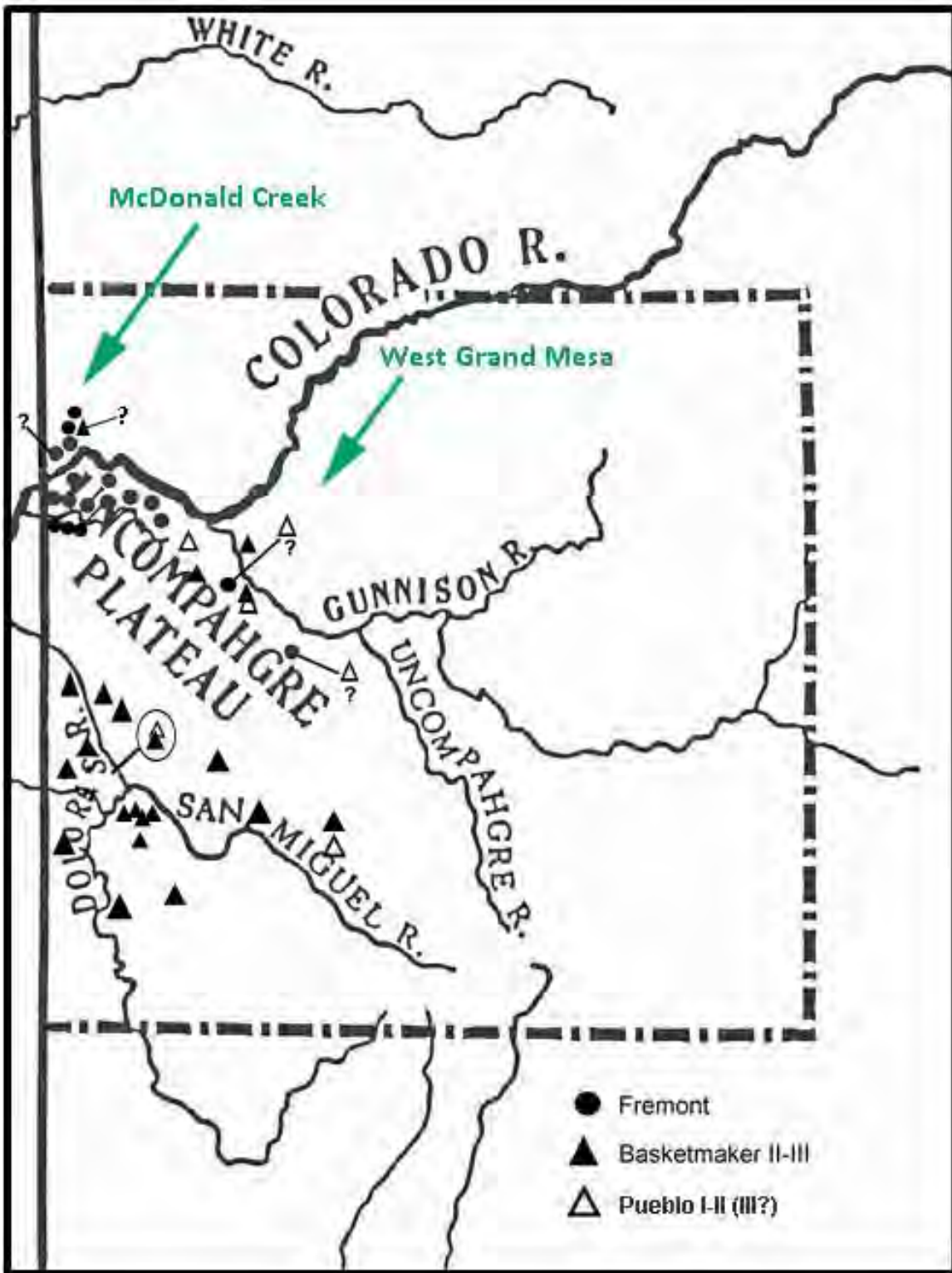


Figure 48. Approximate locations of projected McDonald Creek and West Grand Mesa trails and 18 sites (3 uncertain) with Fremont style rock art; 22 Basketmaker II-III style rock art sites (1 uncertain); and four Pueblo I-II/III style sites (2 uncertain) in west central Colorado (Cole 1990, 2011a).

A Fremont route into the study area along the McDonald Creek trail is evident and the path may have been pioneered by ancestral populations including makers of Barrier Canyon Style, present at site 5ME5259, and possibly Basketmaker II-III style (5ME540) (Figure 48). Competition from Uncompahgre style groups is not evident, further indicating separate cultural developments and traditions were operative in the northwest part of the study area and surrounding areas to the west and north from Archaic to historical times (Figures 46 and 48). Fremont “control” of the canyon after approximately A.D. 400/600 is suggested by occupation of 5ME540, an obviously advantageous camp and habitation near pools of clear, seasonal water and rock shelters.

Stylistic attributes and related ideas and practices presumably traveled both ways and prominent locations and images would have enhanced communication and possibilities for trade, resource exploitation, and settlement. For the present study, this is most obvious with regard to Fremont use of McDonald Creek sites. Paintings near the upper end of the entrenched canyon at 5ME538 were placed in direct view of downstream travelers and those in the highly visible alcove near the mouth of the canyon (5ME529) potentially signified a ceremonial place and possible ritual destination for affiliated groups over time. These are likely to have been occupants of the Book Cliffs-Roan Plateau and Uintah Basin areas to the north and Little Dolores River-Glade Park area to the south on the Uncompahgre Plateau. Migrations from the north at approximately A.D. 600 and 900 (Bradley et al. 1986; Cole 1990, 2009, 2011a) may have established the pattern as indicated in the Formative era radiocarbon record (Conner et al. 2014).

Makers of Archaic Uncompahgre style and Basketmaker II-III style petroglyphs at 5ME163, a short distance from the Gunnison River, were also in an advantageous position to communicate presence on the landscape and signify sociocultural affiliations (Bernardini 2005; Quinlan and Woody 2003). Both styles also occur across the river (Cole 1990). Uncompahgre style petroglyphs at 5ME3768, on a prominent boulder on the major stream bank, may have communicated information about the route and settlements along the Colorado and Gunnison rivers over time.

Protohistoric and historic Ute rock art spans much of the prehistoric landscape but sites are interestingly few along the upper West Grand Mesa corridor and in drainages of the Dolores and San Miguel rivers (Figure 49). Most stylistically identifiable rock art is associated, directly or indirectly, with depictions of horses making it likely that it post-dates 1600–1750 (Baker 2013; Baker et al. 2007, 2009; Buckles 1971; Cole 2013; Keyser 2011). The distribution pattern may reflect contemporaneous use or occupation of those areas by Eastern Shoshone or Comanche among others in the north and Navajo to the south (Cole 1990, 2009; Keyser and Poetschat 2008; Keyser 2011; Schaafsma 1980).

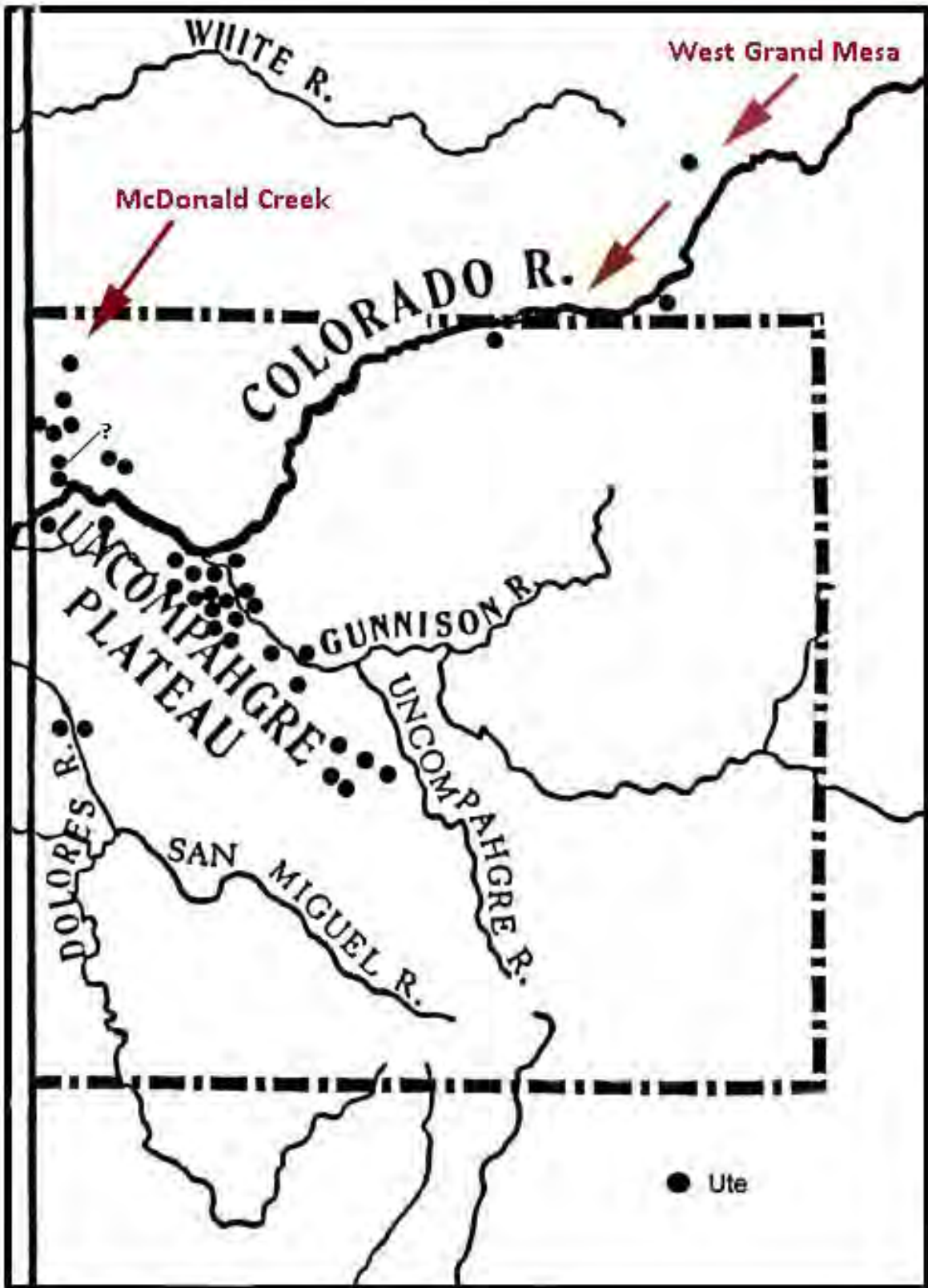


Figure 49. Approximate location of 41 sites with pre-1825/1850 and later historic Ute style rock art (1 uncertain) in west central Colorado (Cole 1990; Keyser 2011).

The makers of Uncompahgre style and the associated type of Abstract-Geometric Tradition rock art are central to identification and interpretation of prehistoric cultural populations and dynamics in west central Colorado. In conclusion and with regard to ongoing research in the study area (Conner et al. 2014), the following comments are paraphrased from an earlier investigation (Cole 2011a:4.39-4.40):

Abstract/Geometric Tradition and Uncompahgre style rock art are attributed to Uncompahgre Complex or Technocomplex societies, groups of hunter-gatherers that shared a common landscape centered on the Uncompahgre Plateau and material culture attributes over time (Buckles 1971; Wormington and Lister 1956). Black (1991) sees the group as part of the Mountain Tradition, which is rooted in Great Basin patterns and emerged in the Colorado mountains as early as 7500 BC. The potentially associated rock art styles correlate well with the situation insofar as they strongly resemble Archaic-based expressions in the Great Basin and Intermountain Region and differ sharply from major Archaic and Formative, anthropomorphic-centered, rock art in neighboring areas of the Colorado Plateau. The increasingly isolated nature of Mountain Tradition populations described by Black is reflected in the geographic isolation and restricted landscape of Uncompahgre style and associated Abstract-Geometric type rock art. The Reed and Metcalf (1999) characterization of the Mountain Tradition as a “long-lived settlement and subsistence system” fails to address the distinctive landscape of the Uncompahgre Complex and associated rock art iconographies.

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APPENDIX C: DOCUMENTATION OF UTE TRIBE PARTICIPATION/PUBLIC OUTREACH

APPENDIX D: SITE AND ISOLATED FIND FORMS AND THEIR LOCATION DATA