

**BEEHIVE ROCK & GEM CLUB**

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**June 2012**

**MEMBER OF UTAH FEDERATION OF MINERALOGICAL SOCIETIES**

**ROCKY MOUNTAIN FEDERATION OF MINERALOGICAL SOCIETIES**

**AMERICAN FEDERATION OF MINERALOGICAL SOCIETIES**

The Beehive Rock & Gem Club began in April of 1970.

The purpose of our club is: To collect, cut and polish rocks, to gather fossils, mineral specimens, to discuss and impart our knowledge of the different phases of collecting, polishing and displaying-

To promote, organize and hold meetings, outings, trips, and similar events. To enjoy and protect our natural resources.

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**BOARD OF DIRECTORS OF THE BEEHIVE ROCK & GEM CLUB FOR 2011**

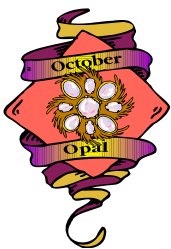
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**FEDERATION REPRESENTATIVES****DUES**

Rocky Mountain Federation Delegate -----President  
 Utah Federation Delegate -----TBA  
 Public Land Advisory Committee ----- Jim Alexander

Due: October 1  
 Single - \$11  
 Couple or  
 Family - \$16  
 Junior - \$5

### **June Beehive Rock & Gem Program – Thursday, June 28, 2012**



The main June program will be about *Opals* – opals from various places. *Opals* – how prepare them to display their colors .. and --where to locate them, etc.

This program will be given by a fairly new member with many years of experience with opals and geology.

Also we hope to have some group tips on using your saws for better results in your lapidary work.

Rocky Ray, Program Chairman

**Editor's Note:**

The deadline for submitting articles to the *Beehive Buzzer* will be moved to the First Thursday of the month of publication starting with the July 2012 issue. So the deadline for the July issue will be July 5<sup>th</sup>. This will allow more flexibility in the newsletter production schedule instead of cramming to get it out the week before the monthly meeting. You will receive it by the second weekend of the month; sometimes sooner.

I am in the process of redesigning the format of the newsletter. If you have any ideas or suggestions, please send them to [beehivebuzzer@gmail.com](mailto:beehivebuzzer@gmail.com).

Dave Harris, Editor

## Board Meeting Notes

### June 5, 2012

The board had no objections so the July board meeting will be July 3.

The Wendover/Silver Island trip was under advertised and was cancelled. Some went anyway. This trip will be rescheduled. Field trips will have better notification hereafter.

The June 15-17 trip information to Cedar City area is to be emailed to members.

The June 28 club meeting program will be given by Duane Roby. He will talk about Opals.

The club first-aid kit will be restacked. Most of the remedies are out of date. The kit is always along on trips.

The Holmes brothers will receive 1-year memberships. This is for a good program they gave on old mines at the May meeting.

Leora Alexander, Associate Editor

## Show Dates

### June

21-24—PRINEVILLE, OREGON: Annual show; Prineville Rock Club; Crook County Fairgrounds; S. Main St.; Thu. 9-5, Fri. 9-5, Sat. 9-5, Sun. 9-4; free admission; daily field trips (This is thunder egg & agate country!), Sat. auction; contact Rebecca Buss, PO Box 200, Culver, OR 97734, (541) 546-9473; e-mail: [genebabe47@yahoo.com](mailto:genebabe47@yahoo.com)

29-1—FARMINGTON, NEW MEXICO: Annual show; San Juan County Gem & Mineral Club; Farmington Civic Center; 200 W. Arrington; Fri. 10-6, Sat. 10-6, Sun. 10-5; free admission; Wheel of Fortune, silent auction, hourly door prizes, raffle; contact Mickie Calvert, 5986 Hwy. 64, Farmington, NM 87401, (505) 632-8288; e-mail: [mickie2@earthlink.net](mailto:mickie2@earthlink.net)

### July

6-8—DURANGO, COLORADO: 59th annual show; Four Corners Gem & Mineral Club; La Plata County Fairgrounds; 2500 Main Ave.; Fri. 11-6, Sat. 10-6, Sun. 10-5; free admission; crystals, minerals, gemstones, jewelry, exhibits, displays, dealers; contact Toby Mourning, PO Box 955, Durango, CO 81302-0955, (970) 385-8993; e-mail: [info@durangorocks.org](mailto:info@durangorocks.org); Web site: [www.durangorocks.org](http://www.durangorocks.org)

21-22—FLAGSTAFF, ARIZONA: Retail show; Sharon Szymanski; Radisson Woodlands Hotel; 1175 W. Rte. 66; Sat. 10-5, Sun. 10-4; adults \$3, children (under 12) free with adult; dealers, fine and costume jewelry, sterling silver and gold, minerals, rocks, slabs, cabochons, crystals, beads, unset gemstones, wire wrapping on the premises; contact Sharon Szymanski, 1792 E. Laddos Ave., San Tan Valley, AZ 85140, (480) 215-9101; e-mail: [goldcanyon2@yahoo.com](mailto:goldcanyon2@yahoo.com)

26-29—MINNETONKA, MINNESOTA: AMERICAN FEDERATION & Midwest Federation Show and sale; Minnesota Mineral Club; Lindbergh Center, Hopkins High School; 2400 Lindbergh Dr.; Thu. 8-5, Fri. 12-7, Sat. 9-5, Sun. 10-4; adults \$5, students and children free; exhibits, sales, presentations, seminars by agate experts from around the world (pre-registration and additional fee required), Midwest and American federation annual meetings; contact Sandy Fuller, PO Box 82, Newport, MN 55055; e-mail: [2012agates@gmail.com](mailto:2012agates@gmail.com); Web site: [minnesotamineralclub.org](http://minnesotamineralclub.org)

### August

9-12—BUENA VISTA, COLORADO: Annual show; Contin-Tail LLC; Rodeo Grounds; Rodeo Rd. and Gregory Dr.; Thu. 9-5, Fri. 9-5, Sat. 9-5, Sun. 9-5; free admission; more than 100 dealers, rocks, minerals, fossils, gemstones, beads, jewelry, slabs, cabs, tools, equipment, free rocks for kids; nestled under the "Continental Divide – a huge "tail" gating, contact Carolyn Tunncliff, 1130 Francis #7010, Longmont, CO 80501, (720) 938-4194; e-mail: [ctunncliff@comcast.net](mailto:ctunncliff@comcast.net); Web site: [www.coloradorocks.org](http://www.coloradorocks.org)

Check [www.rockngem.com/showdates](http://www.rockngem.com/showdates) for other shows throughout the country.

.....  
 Congratulations to the Cache Geological & Archeological Society for joining the Rocky Mountain Federation! This is one of the groups that make those field trips more fun!  
 .....



### Independence Day, July 4<sup>th</sup>!

#### Days of '47, July 19-24

Ogden City Events:

<http://ogdenpioneerdays.com/>

Salt Lake City Events:

[www.daysof47.com](http://www.daysof47.com)

**Desert Safety Tips by Bob Fitzpatrick, CFMS**

Travel in the desert can be an adventure. It can also be a disaster if a breakdown or sudden change of weather catches you unprepared. Be aware of the hazards of desert travel, in both winter and summer. Harsh weather conditions can turn a desert outing into a tragedy. Acquire knowledge of desert survival skills. Travel in pairs for safety.

Plan your trip carefully. Tell someone where you are going and when you will return. Stick with your itinerary and let them know when you return. Do not travel in the desert backcountry without taking along appropriate maps. It is easy to become disoriented in the desert where many landmarks and rock formations look similar.

Dress properly. In summer, layered clothing slows dehydration and minimizes exposure. Good hiking shoes, loose fitting natural clothing, a wide brimmed hat, sunglasses, and sunscreen are a must. Desert temperature can reach over 90o F and drop below 50o F in one day. Summer temperatures can reach 125o F in some locations. In winter, temperatures can often drop below freezing. Bring extra warm clothing.

Always carry plenty of water. There are no dependable sources of water within the desert. A gallon of water per person per day is the absolute minimum that should be carried. When planning a hike, remember that water weighs approximately 8 pounds per gallon. When the water is half gone, it is time to turn back. Don't forget extra water for your vehicle. Do not ration your water. It will only do you good if you drink it.

Source: *The Polished Slab*, May/June 2005  
Via *Pick Hammer News*, June 2012

**Excessive Collecting of Material: A Caution**

I recently had a conversation with Doug Marshall, our Field Trip Chair, regarding a new site for one of our upcoming field trips. Part of that conversation was about the amazing material to be found in this location, and part of it was how we could protect it from being stripped and made useless for future trips for our society and the generations that follow us.

I found an old article in the Stillwater Mineral & Gem Society, Inc., May 2002, Rockhound Gazette that highlighted this topic. It came from a talk give by Dan Brown at the 2000 Annual Co-op Seminar meeting in California entitled "How We Lose Public Lands and How to Slow the Process." In the article, Dan has this

to say. "What I am about to say next will not win me a popularity contest, but I feel that it must be stated anyway. I'm speaking of the indiscriminate, excess collecting of material in the field and destruction and/or disfigurement and littering of public land."

"What is the average rockhound going to do with 100 lbs. of geodes? I'll bet my bottom dollar that most, if not all of them will sit in their yards until the individual is pushing up daisies. Then they are discarded by families who have little or no appreciation for them. There are too many excellent collection sites that have been completely depleted by this process."

"I'm a great one to talk. I have 100 lbs. of Texas Springs limb casts sitting in my garage. Perhaps one or two will be cut up and fashioned into jewelry and maybe one or two will be cleaned up and cataloged into my mineral collection. I take little comfort in knowing that I'm not alone in this practice. It's time we change our ways in this regard."

"I have observed countless times holes and even abandoned pits left behind by rockhounds. They are not only safety hazards to people as well as animals, but they are unsightly as well. There have been a number of occasions when I was the last person to leave a rockhound group campsite only to observe the litter left behind. In most cases I have hauled away the litter and made appropriate disposal of it. WE need to clean up our act."

"Finally, I would like to share an idea with you. Most, if not all of you, have experienced the joy and wonders of discovery when hunting for specimens or lapidary material. It's the searching and finding that gives so much satisfaction to many of us. The comradeship and social aspects add to our enjoyment of the hobby. Some of the material found finds its way into show and exhibits or is converted into an object of art and jewelry. Most of it does not. Would it not be better to share our discoveries and materials with schools, colleges and universities? The alliances made and information shared would enrich the lives of all concerned."

I think our society can be proud of the manner in which we clean up our sites and carry out our litter. However, we have young members whom I hope will be able to take their young children out to the areas surrounding us in the future and still have the fun and thrill of collecting in the field that we do. Collect with caution.

Source: *Pick Hammer News*, June 2012

## Code of Ethics

**I will** respect both private and public property and will do no collecting on privately owned land without permission from the owner.

**I will** keep informed on all laws, regulations or rules governing collecting on public lands and will observe them.

**I will**, to the best of my ability, ascertain the boundary lines of property on which I plan to collect.

**I will** use no firearms or blasting material in collecting areas.

**I will** cause no willful damage to property of any kind such as fences, signs, buildings, etc.

**I will** leave all gates as found.

**I will** build fires only in designated or safe places and will be certain they are completely extinguished before leaving the area.

**I will** discard no burning material - matches, cigarettes, etc.

**I will** fill all excavation holes which may be dangerous to livestock.

**I will** not contaminate wells, creeks, or other water supplies.

**I will** cause no willful damage to collecting material and will take home only what I can reasonably use.

**I will** practice conservation and undertake to utilize fully and well the materials I have collected and will recycle my surplus for the pleasure and benefit of others.

**I will** support the rockhound project H.E.L.P. (Help Eliminate Litter Please) and will leave all collecting areas devoid of litter, regardless of how found.

**I will** cooperate with field-trip leaders and those in designated authority in all collecting areas.

**I will** report to my club or federation officers, Bureau of Land Management or other authorities, any deposit of petrified wood or other materials on public lands which should be protected for the enjoyment of future generations for public educational and scientific purposes.

**I will** appreciate and protect our heritage of natural resources.

**I will** observe the "Golden Rule", will use Good Outdoor Manners and will at all times conduct myself in a manner which will add to the stature and Public Image of Rockhounds everywhere.

## Good Hunting

*By: Belle Meyers*

Spring is busting out all over,  
Wish I could bust out too,  
Forget the work that's piling up,  
Go find a rock or two.

They're just waiting over the hill,  
For me to search them out,  
And anyone within forty miles,  
Would surely hear me shout.

The birds would sing a love song,  
And start to build their nests,  
Now and then take a lunch break,  
And feast on insect pests.

At night we'd hear the coyotes sing,  
Their ever-lonesome song,  
And maybe if the moon were high,  
We'd join and sing along.

It's time to put the dreams away,  
Dig out the camping gear,  
We wish you all good hunting,  
A safe and rock-filled year.

Source: *The Puget Sounder*, March 2004

*Via News & Views*, April 2012

*Via Strata Gem*, June 2012

## Gallagher's Obituary

Gallagher opened the morning newspaper and was dumbfounded to read in the obituary column that he had died. He quickly phoned his best friend Finney.

"Did you see the paper?" asked Gallagher. "They say I died!"

"Yes, I saw it!" replied Finney. "Where are you callin' from?"





## THE GOOD OLD DAYS

BY BILL CAIN, ACROY CHAIR

**O**K, so call me old fashion. I was taught as a young lad, more than 68 years ago, whether at a family gathering, at church, or a social gathering, when some offered a prayer, you took your hat off and bowed your head. Way back then we also said the Pledge of Allegiance in our schools (as today at the RMFMS Delegates Meeting), we would stand, place our hands over our hearts (no hats allowed in school), and render RESPECT. If at an event, we removed our hat and placed it over our heart to honor our National Flag, you know the one—the red, white, and blue one with Stars and Stripes. Being a Vietnam veteran and a hardcore American, I still believe in both. However, I have noticed over the years, some people seem to have forgotten those practices.



I really must wonder if Americans have become so engrossed in self that we forget or choose to ignore simple courtesy. It really is a sad day when we disregard the thousands before us who gave their lives so that we can enjoy the freedoms they so selflessly bought with their life blood. We need to go back to the old days when everyone respected this country and the freedoms it represents. Do you know all the words to the Stars Spangle Banner?

God bless the Internet, [www.usflag.org](http://www.usflag.org) lists the guidance for rendering respect to our Nation's symbols. I'll repeat them here for you.

### The Salute

"To salute, all persons come to attention. Those in uniform give the appropriate formal salute. Citizens not in uniform salute by placing their right hand over the heart and men with head cover should remove it and hold it to left shoulder, hand over the heart. Members of organizations in formation salute upon command of the person in charge."

### The Pledge of Allegiance and National Anthem

"The pledge of allegiance should be rendered by standing at attention, facing the flag, and saluting. When the national anthem is played or sung, citizens should stand at attention and salute at the first note and hold the salute through the last note. The salute is directed to the flag, if displayed, otherwise to the music."

### Parading and Saluting the Flag

"When carried in a procession, the flag should be to the right of the marchers. When other flags are carried, the flag of the United States may be centered in front of the others or carried to their right. When the flag passes in a procession, or when it is hoisted or lowered, all should face the flag and salute."

If it isn't asking too much, the next time someone offers a prayer (no matter how simple or elaborate), when reciting the Pledge of Allegiance, or when "colors" are rendered, remember this old fashion guy and show your national pride by removing your hat (RMFMS President exempted). Am I asking so very much? I also remember the 'head slaps' from Momma if I didn't also remove my hat when meeting a woman. As our nation celebrates it's independence on July 4th, please display our flag proudly with dignity and honor. Thanks for listening.

Source: *Rocky Mountain Federation News*, June 2012

## THINGS YOU MIGHT NOT HAVE KNOWN ABOUT YOUR CELL PHONE

**T**his should be printed and kept in your car, purse, or wallet. Good information to have with you. There are a few things that can be done in times of grave emergencies. Your mobile phone can actually be a life saver or an emergency tool for survival. Check out the things that you can do with it:



### FIRST (Emergency)

The Emergency Number worldwide for Mobile is **112**. If you find yourself out of the coverage area of your mobile network and there is an Emergency, dial **112** and the mobile will search any existing network to establish the emergency number for you, and interestingly, this number **112** can be dialed even if the keypad is locked. Try it out.

### SECOND (Hidden Battery Power)

Imagine your cell battery is very low. To activate, press the keys **\*3370#**. Your cell phone will restart with this reserve and the instrument will show a 50% increase in battery. This reserve will get charged when you charge your cell phone next time.

### THIRD (How to disable a STOLEN cell)

To check your Mobile phone's serial number, key in the following Digits on your phone: **\*#06#**. A 15-digit code will appear on the screen. This number is unique to your handset. Write it down and keep it somewhere safe. If your phone is stolen, you can phone your service provider and give them this code. They will then be able to block your handset so even if the thief changes the SIM card, your phone will be totally useless. You probably won't get your phone back, but at least you know that whoever stole it can't use/sell it either. If everybody does this, there would be no point in people stealing mobile phones. And Finally. . .

### FOURTH (Free Directory Service for Cells)

Cell phone companies are charging us \$1.00 to \$1.75 or more for 411 information calls when they don't have to. When you need to use the 411 information option, simply dial: (800) **FREE411** or (800) **373-3411** without incurring any charge at all. Program this into your cell phone now. This is sponsored by McDonald's. *Gemcrafters & Explorers Club "EL Gambrino" May 2012*

Via *Rocky Mountain Federation News*, May 2012

## HIKING THROUGH THE ICE AGE: SMILODON VS. UINTATHERIUM

BY JACK SHIMON, COLO SPRGS MIN SOC PEBBLE PUPS, W/WEB SUPPORT BY JULIE SHIMON  
[HTTP://PEBBLEPUPS.BLOGSPOT.COM](http://PEBBLEPUPS.BLOGSPOT.COM)

If you saw these animals in real life out on a hike which one would you be more frightened of?



Figure 1. *Uintatherium* skull



Figure 2. *Smilodon* skull

The skull in figure 1 is from an animal about the size of a rhinoceros. The skull in figure 2 is from an animal about the size of a tiger. They both have long canines. So when I saw these skulls at the Morrison Natural History Museum, Colorado on a field trip with my family I told the lady that asked me about them that they were probably both carnivorous saber tooth tigers.

How wrong I was. She told me all about them. On the *Uintatherium* (figure 1) the canines were the obvious thing I looked at. I think they like to trick people because the skull of *Smilodon fatalis* is hanging just above it on the wall. But when you take a closer look they are actually very different.

If you think about the size, an animal with a skull as big as *Uintatherium* would make a gigantic cat. Much bigger than any cat I can think of, and even huge in comparison to the *Smilodon*. The canines are long, but not nearly as long or sharp as that of *Smilodon* and unlike *Smilodon*, *Uintatherium* has no front teeth like most predators. *Uintatherium* also has long plates of flat teeth used for grinding. I finally had to accept the fact that this animal was an herbivore!!!



Figure 3. Another view of a *Uintatherium* skull



Figure 4. Front view of a *Smilodon Fatalis* skull

It's funny the museum had these on display together because not only are they entirely different animals but they also lived millions of years apart. *Uintatherium* (Beast of the Uinta) lived in the Eocene Epoch and went extinct 37 million years ago, probably due to climate change. They have been found only in Wyoming and Utah near the Uinta Mountains, which they are named for ("Wikipedia", 2011). I think they didn't have to roam far to feed because they ate all sorts of land and aquatic plants. They are similar in size and shape to a rhinoceros but not related at all. Modern rhinos weigh from 1,900-7,700 lbs which is a LOT more than *Smilodon*, and *Uintatherium* was probably similar in weight to the rhino ("Wikipedia", 2012).

So why do they have those long canines? Maybe they were used to defend themselves but it was also suggested they used them to scoop plants from the marshes to feed on ("Wikipedia", 2011). We might never know.



Figure 5. Artist's rendition of the *Uintatherium*

There are three main species of *Smilodon* (also known as saber-tooth cats) and *S. fatalis* was middle in size between *S. gracilis* (smallest) and *S. populator* (largest). *Smilodon* went extinct in the late Pleistocene about 11,700 years ago, also probably due to climate changes. They were highly specialized top predators feeding on large game like bison, tapirs, deer, horses, sloths and possibly juvenile mastodons and mammoths. They also may have attacked prehistoric humans. *S. fatalis* was about the size of a Siberian tiger, an weighed up to 500lb; but built more like a modern day bear—robust for power—not speed. *Smilodon* canines have been measured up to 28 cm long and were used to slice through the throat after the powerful legs pulled the prey down. *S. fatalis* had a large range, from North America into West South America ("Wikipedia", 2012). I wonder if *Smilodon* had met *Uintatherium* who would have won? I don't think it would be very smart for *Smilodon* to try to eat *Uintatherium*.

I have definitely decided that if I were to meet these creatures on a hike that I'd rather run into *Uintatherium*. He definitely wouldn't try to eat me although that large skull still looks very scary.

**Note:** Author's bio follows references. Jack Shimon is a frequent contributor of papers, poems, articles, and monographs on geoscience subjects.

### References:

Interview by JS Shimon [Audio Tape Recording]. Museum tour. , Retrieved from <http://www.mnhm.org/>  
 Wikipedia. (2011, December 26). Retrieved from <http://en.wikipedia.org/wiki/Uintatherium>  
 Wikipedia. (2012, February 22). Retrieved from <http://en.wikipedia.org/wiki/Rhinoceros>  
 Wikipedia. (2012, February 15.). Retrieved from <http://en.wikipedia.org/wiki/Smilodon>

### Author's bio:

**Jack Shimon** is seven years old and a first grade student in Colorado Springs, CO. Under the guidance of his grandfather he got interested in geology at a young age and has been on numerous rock and fossil collecting trips in Colorado and Texas. He's been a member of Pebble Pups since 2009 and has earned seven merit badges through that program. His other interests include cub scouts, drumming, mountain biking and rock climbing.



Figure 6. Artist's rendition of *S. fatalis*



## SEARCHING PUBLIC LAND RECORDS

DR. MIKE NELSON



[csrockguy@yahoo.com](mailto:csrockguy@yahoo.com)  
[www.csmsgeologypost.b](http://www.csmsgeologypost.blogspot.com)  
[logspot.com](http://logspot.com)

For several years I have tried to fumble through a BLM-sponsored (Bureau of Land Management) software program named GeoCommunicator. This particular program helped me as I tried to pinpoint parcels of federal land, especially those with mining claims (past and present). BLM described the program as the *publication site for the distribution of geospatial data and products to the public. GeoCommunicator facilitates the sharing of geographic data among federal, state, local, and private individuals and organizations interested in providing the public with national data sets.*

In 2011 the BLM decided to change the services and data provided from the GeoCommunicator website and therefore removed a number of items: all of the BLM land and mineral information including oil and gas leases and agreements, coal leases, oil shale leases, renewable energy, rights-of-way, unpatented mining claims, land patents, withdrawal, land disposals, exchanges, etc. as well as the non-BLM federal surface management agency data (USFS lands, non-federal lands, state lands, other agency lands), data that is not managed by the BLM, and several map services such as ArcIMS- image and features, ArcGIS, and WMS.

Of these items, I was most concerned about mining claims on BLM, USFS (United States Forest Service), and non-federal lands. The question that many rockhounds ask is--what about accessibility on mining claims? Are the claims current?

My next step was to fool around trying to understand the mechanics of LR2000, the BLM's software system that *provides reports on BLM land and mineral use authorizations for oil, gas, and geothermal leasing, rights-of-ways, coal and other mineral development, land and mineral title, mining claims, withdrawals, classifications, and more on federal lands or on federal mineral estate.*

LR2000 is a very sophisticated piece of software, perhaps too much for me, and I would suggest that potential users try and arrange the completion of a class, or receive individualized instruction from a knowledgeable user. But, if you are the more adventurous type, then feel free to plunge right in at: [www.blm.gov/lr2000/index.htm](http://www.blm.gov/lr2000/index.htm).

So, what is the "average" rockhound like me supposed to do in order to locate abandoned mines, determine ownership and possible current claims? It seemed much easier in the "Old Days" (even my older days) as specimens were more abundant and mine owners more accommodating. However, with our litigious society mine owners are rightly very cautious about rockhounds on their property; hence, the need for advanced homework before heading out.

If you are not inclined to tackle LR2000 but want to check on mining claims and the location of old dumps that may provide interesting specimens, don't despair--not that you ever would. I don't have the complete answer but I do have some suggestions.

Google Earth® is a fascinating piece of free software currently available for personal use on computers running the following operating systems: [Windows 2000](#) and above, [Mac OS X](#) 10.3.9 and above, [Linux kernel](#) 2.6 or later, and [FreeBSD](#). Google Earth is available

as a [browser plugin](#) and recently was added as an "app" for the [iPhone OS](#) and [Android](#). Google Earth Pro®, at a price of around \$400, is available for purchase by commercial users. Google Earth displays satellite images of the earth's surface; however, the software user also may incorporate a myriad of other opportunities that are much too complicated for explanation in this article. For example, viewers may look "straight down" (bird's eye view) at a city, or at an oblique view. At some localities 3D images are available for viewing and Google Earth Street View lets many users view their place of residence from a "street view". One simply needs to play around with the software and not be afraid to "push buttons"!

For a review and explanation of Google Earth see: [http://en.wikipedia.org/wiki/Google\\_Earth](http://en.wikipedia.org/wiki/Google_Earth). Download Google Earth from [www.google.com/earth/index.html](http://www.google.com/earth/index.html) and install the program on your computer. This step must be completed before installing the next program noted below.

After the BLM dumped GeoCommunicator I simply gave up and was looking for new experiences when I happened to stumble on [MineCache](#)®, a bit of serendipity that sometimes happens during browsing sessions on the computer.

MineCache is a piece of free software available at



Fig. 1. Image of the Cripple Creek-Victor area. Checking the [MineCache.klm](#) on the left sidebar should produce an image such as Fig. 2 (depends on your scale).



[www.minecache.com](http://www.minecache.com) Their website describes the software as a Google Earth add-on that lets you visually map locations where gold has been found in the United States... Use MineCache as an online gold map tool to help you narrow down your gold prospecting locations or to help you find existing gold mine locations.

The download instructions are easy to understand and the software fun to use. I experimented with Cripple Creek, Colorado, as the following example illustrates. Log into Google Earth, "fly" to Cripple Creek, uncheck the "Ads" section on the left sidebar and receive an image something like Fig. 1 (the scale is adjustable with the + and - sliding scale on the right margin). The light colored area in this image is the current Cripple Creek & Victor Gold Mining Company mine located between Cripple Creek and Victor.

By clicking on a particular mine symbol, such as the Blanche Mine, MineCache will display information as the following (Fig. 3):



A different view, oblique, is available of the land surface by clicking the + button on the right margin in order to get close to the land surface (Fig. 5).

The concurrent use of Google Earth and MineCache will provide hours (hundreds?) of entertainment for the rockhound. It certainly is not perfect (for example, it only produces gold mines). However, users can locate roads, buildings, trails, mines and prospects, and mining claims. Consulting other maps might give you land ownership since the software provides latitude and longitude coordinates; however, if that fails, consult experts at the local rock shop, courthouse, BLM office or Forest Service office.



Fig. 2. The gold mines located southeast of Cripple Creek

Site Name: Blanche Mine  
State: Colorado  
County: Teller  
Latitude: 38.73101  
Longitude: -105.1653  
Operation Type: Underground  
Development Status: Past producer  
Primary Commodities: Gold

Now, click the "BLM Claims Record" on the left sidebar and receive information on claims as shown in Fig. 4.





A second software program, although one that has an expense, is Gold Maps Online ([www.goldmapsonline.com/index.html](http://www.goldmapsonline.com/index.html)), again works in concert with Google Earth. The company seems to have maps available for 12 western states "that contain 378,890 active gold claims and 181,134 abandoned gold claims (activity in the latter area from 1986 to present). Each state map program apparently has a retail cost of \$19.95 (I did not purchase).

The Colorado map "shows there are currently 26,750 active gold mining claims and 15,793 abandoned claims located throughout the state. Of those active claims, 24,446 are lode claims and 1,304 are placer claims. Of those abandoned claims, 12,250 are lode and 3,543 are placer."

As in MineCache there are several levels of information—see figures 6 and 7.

Good luck in playing around. Drop me an email to let me know about your results. I am also interested in hearing from rockhounds who use LR2000. Or, perhaps there are other software programs out in cyberspace that may do a better job!



Fig. 5. Oblique view of the Fossil #1, Fossil #2, and Diamond claims near Cripple Creek.



Fig. 6. Map of Colorado showing "yellow clusters [that] represent high concentrations of active gold mining claims. This view ... gives ... a very accurate idea (real time) of where most of Colorado's gold is being found."

Fig. 7. The area near Black Hawk and Central City (north and west of Denver) showing active (gold) and abandoned (blue) gold claims. With a purchased program the user may "zoom in" and locate additional information.



All images in figures 1-5 are courtesy of Google Earth with overlays from MineCache. Figures 6-7 are from Gold Maps Online.

*I'm not going to give you a map. I can give you only a great passion to discover. Yes, a map is not needed; great passion, great desire to discover is needed. Then I leave you alone. Then you go on your own.*

Bhagwan Shree Rajneesh

Source: Rocky Mountain Federation News, May 2012



## A PRELIMINARY STUDY ON A LARGE SCRAPER FROM CENTRAL WYOMING

BY LUKE SATTLER, COLORADO SPRINGS MINERALOGICAL SOCIETY JUNIOR MEMBER

**T**his paper is about an unusual artifact from Wyoming that may have been used by prehistoric people. The artifact has been studied and the preliminary research results are completed.

This ancient scraper is a bifacial, thinned, cortical flaked tool which means that its flakes were stricken from the exterior of a chert nodule (hence the remaining cortex, or rough surface, visible on one face, Figure 1). To make it bifacial, the edges were then flaked on both sides to form a cutting or scraping edge used for cutting things like meat, hide and other things (Walker, Danny, Personal communication 2012).

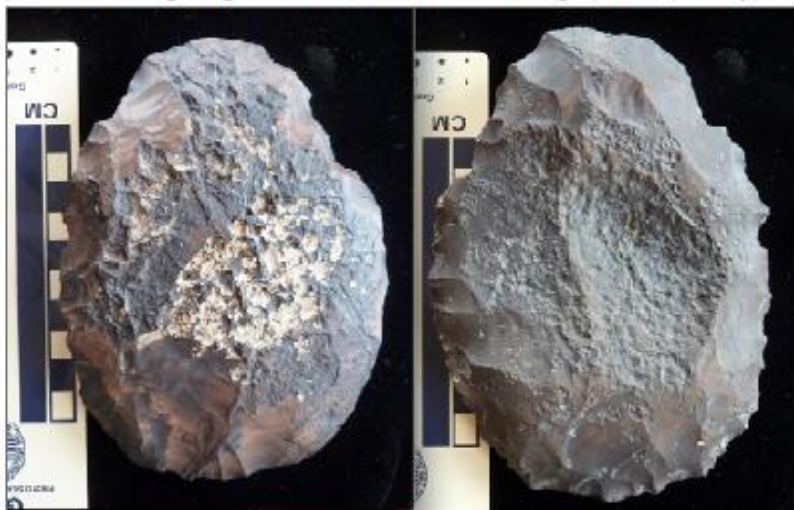
The scraper is made out of chert: a sedimentary microcrystalline variety of quartz that forms when microcrystals of silicon dioxide grow within sediments. The microcrystals grow into irregularly shaped nodules or concretions as dissolved silica is transported to the formation site by the movement of ground water or seas. When there is more than one nodule or concretion forming they may join together and form large masses or layers of bedded chert. Some of the silicon dioxide in chert is thought to have a biological origin. In some oceans and shallow seas large numbers of organisms that have a silica rich skeleton may form these chert formations because the silica rich skeletons or "spicules" such as sponges break down after the organisms die and when their skeletons fall to the bottom of the sea, dissolve, recrystallize and sometimes become chert nodules or chert layers ("Chert," 2012).

The chert artifact appears to be pre-Shoshone or pre-Lakota, but more studies at the site need to be done. The historical Shoshone were nomadic people who traveled over portions of the western United States. They occupied parts of Colorado, Wyoming, Nevada, Montana and Arizona. The Shoshone people were hunters and gatherers; their diet consisted of berries, roots, pine nuts, rabbit, antelope, and buffalo and their housing consisted of buffalo hide teepees. This scraper would have been a valuable and versatile tool. Shoshone clothing changed between the different seasons; from men wearing just a breech cloth around their waist and women wearing an apron in the summer to wearing rabbit fur jackets and pants—even buffalo hide capes in the winter.

The Shoshone tribe (Figure 2) may have used this scraper for a variety of uses, but most likely to cut meat and hide for making clothes and other useful things ("Shoshone life," 2012). It was Sacagawea—a Shoshone who gained notoriety as the famous Native American who helped lead Lewis and Clark on their expedition through Shoshone lands.



**Figure 2.** Shoshone family. Photo courtesy of the author.



**Figure 1.** Front and back view of bifacial scraper showing flaking by ancient people in Wyoming. Rough surface of a chert nodule is revealed on the surface. S. Veatch photo © 2012.

The Lakota peoples may have used the scraper. There are many things in common that the Lakota's have with the Shoshone such as: 1) the Lakota were also nomadic peoples who also hunted mainly buffalo and other small animals like deer and antelope; and 2) the Shoshone and the Lakota both lived in teepees most of the time ("Lakota Indian facts," 2012).

To conclude, many historical artifacts in museums have a "no information tag" for where they came from or who made them. But as scientists our job is to try and think outside the box and use our information at hand and our best knowledge to establish as many facts about our finds, either in the field or a box in the basement of a museum, and figure out what happened or may have happened—and that is what I did in this paper.

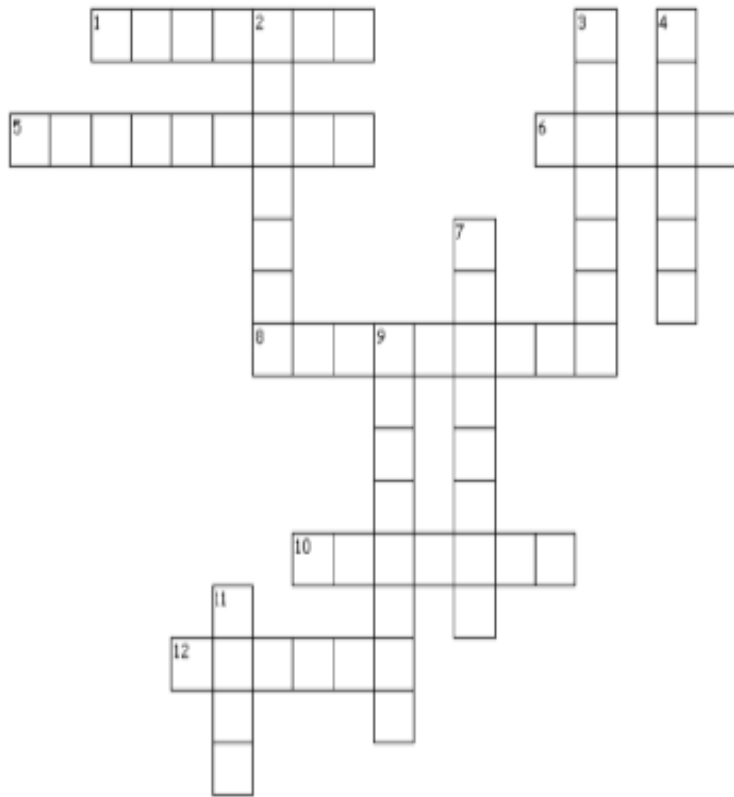
### References Cited:

- *Chert*. (2012, March 21). Retrieved from <http://geology.com/rocks/chert.shtml>
- *Lakota Indian facts*. (2012, March 22). Retrieved from [http://www.bioparin.org/Lakota\\_kids.htm](http://www.bioparin.org/Lakota_kids.htm)
- *Shoshone life*. (2012, March 21). Retrieved from [http://www.shoshoneindian.com/shoshone\\_life.htm](http://www.shoshoneindian.com/shoshone_life.htm)
- Walker, Danny, (2012, March 12). (Note: Walker is assistant Wyoming State Archaeologist) Interview by Luke Sattler [Personal Interview]. Wyoming artifact. Scraper Question Email, USA.



# Igneous Rocks

by Susie Howard



Names found in puzzle:

IGNEOUS, GRANITE, INTRUSIVE,  
OLIVINE, RHYOLITE, BASALT,  
EXTRUSIVE, MAGMA, OBSIDIAN,  
VOLCANO, PUMICE, LAVA.

Puzzle Created by  
DiscoveryEducation.com  
Via Rock Chips, Provo, UT, May 2012

## Across

1. Rocks that come from the mantle
5. Igneous rocks that form below the surface of the earth and cools slowly
6. The name given to molten rock from volcanos
8. Igneous rocks that form from magma that reaches the surface of the earth
10. A vent for extrusive igneous rocks
12. An igneous rock with a low silica content that flows easily

## Down

2. One of the eight basic rock forming minerals
3. A common intrusive igneous rock
4. A very light igneous rock, honeycombed volcanic glass
7. Volcanic glass with no crystalline structure, breaks with very sharp edges
9. A light colored igneous rock with high silica content, explosive eruptions
11. The common name for magma flowing from a volcano.

## YOUR TOP TEN LIST

### The Top Ten Nightmares for Rockhounds

10. Collecting partner bursting with song.
9. Opening your backpack on arrival at locality and finding kids school books.
8. Sirens!
7. A lovely pond where the pit used to be.
6. Specimen bag is too heavy on way out.
5. Specimen bag is too light on way out.
4. A rattling noise in the rock pile.
3. Your spouse has 'cleaned up' your collection
2. Hammer seeking lightning.
1. A tour bus parked at favorite locality.

### SEE INSIDE STONES...

See inside stones before faceting by immersing them in oil of cinnamon or oil of cassia. These are sold in most drug stores. Their refractive index is near that of most gemstones, so surface irregularities of the stones will vanish and you can see flaws and inclusions.

### SECRETS TO GOOD GLUING:

1. Equal parts glue and hardener. Use the exact same amount for both. If anything, use a tiny bit more hardener.
2. Mix well. Once you think you have mixed well, mix a little more. You can cut off the pointed end of a toothpick and use it as both a stir stick and an applicator. Try putting a piece of wide masking tape on your work bench and mix the epoxy on that. You can check the curing of the epoxy by touching the toothpick to the leftover puddle of glue on the tape. When the masking tape becomes covered with dried epoxy, pull it off the bench and put a new piece down.

Source of the above: *Gems of the Rogue* - 2/12  
Via Rock Chips, Deming, NM, May 2012

## Wisdom of the Ages

"I much prefer being over the hill to being under it."

Bruce Lansky

"At my age I don't care if my mind starts to wander – just as long as it comes back again."

Mike Knowles

"Middle age is when a narrow waist and a broad mind begin to change places."

Glenn Dorenbush

"When you can finally afford the rings you want, you'd rather no one noticed your hands."

Lois Muehl

"A man has reached middle age when he is warned to slow down by his doctor instead of the police."

Henny Youngman