



Smoke Signals

Black Hawk Gem & Mineral Club, Inc.

November 2007

Next Meeting November 15th Hauberg Civic Center

The next meeting will be held at the Hauberg Civic Center on **November 15th**. The Hauberg Civic Center is located at 1300 24th Street, Rock Island. The meeting will be held at 6pm in the basement. We will be holding a **Silent Auction**, going over how our **Fall Show** went, and holding **nominations** for next year's board and committee members. I would also like to discuss a line up for what the members would like to do at upcoming meetings. We did this last year and it seemed to make for better meeting times.



Upcoming Events

<p>Nov 17 & 18</p>	<p>Madison WI: Madison Rock, Gem and Mineral Annual Show. Alliant Energy Center, (Coliseum). Hours are approximately 9:30 a.m. - 5 p.m. on Saturday, and 10 a.m. - 5 p.m. on Sunday. The show will feature member displays of gems, mineral specimens, geological history and more, demonstrations of rock carving, flint knapping and other crafts, vendors and much more. For more information (vendors especially) Contact Show Chairman Nevin Franke at (608) 251-2601</p>
-----------------------------------	--

<p>Dec 8 & 9</p>	<p>FARIBAULT, MN: Sales Show, Anoka County Gem & Mineral Club, Faribo West Mall, 200 Western, Contact Martha Miss, 8445 Grange Blvd, Cottage Grove, MN 55016, (651) 459-0343</p>
<p>Jan 26</p>	<p>LINCOLN, NE: Annual Indoor Swap, Lincoln Gem & Mineral Club, Inc, Bethany Park Shelter House, Cotner & Vine Sts, Sat 1:00-5:00, Contact Pat Akins, Jr, 5017 NW 6th St, Lincoln, NE 68521, (402) 477-1322</p>
<p>Jan - Feb</p>	<p>MT CLEMENS, MI: 3rd Annual Rock & Mineral Workshop, Mt Clemens Gem & Lapidary Society, Classes to assist students grades 3-6 in Science Olympiad Competition, Contact: Richard Brzozowski, 40217 Spitz Dr, Sterling Hts, MI 48313, (586) 264-5576</p>

Dues!

It's getting close to the end of the year once again; time to start thinking about dues. Dues are due January 1st. Any Dues paid from this point forward will count towards next year's membership. Those who joined in September are already paid through next year.

<p>Individual - \$15.00</p>
<p>Family - \$20.00</p>
<p>Senior Couple - \$12.00</p>
<p>Senior Single - \$10.00</p>

If mailing, please send dues to: **Connie Huber**
 2903 Woodland Ct
 Davenport, IA 52803

November's Board Meeting:

We discussed this years Fall show and how it compared to last years show. We did well. We are also looking at how we can make it better next year.

A motion was put forward to exempt persons serving on the board and/or committee to be given free membership while they served. Keep in mind that a great deal of the committee is comprised by the board members. We believed this to be a reasonable request and were all in favor of it. Objections if any may be discussed at the November meeting.

This years **Christmas party** is being planned. It is to be held on **Saturday December 15th at the Singing Bird Lodge** in Blackhawk State Park, Rock Island, IL. It will be from 6-8. We are hoping that the Saturday date will be more accommodating for attendance.

Basement workshop. We want to get to work on making the workshop we have at Hauberg usable. Many have shown interest in this. We are thinking workshop night should be held separate from meeting night. Therefore we will need to discuss when that should be. Also we will be looking for volunteers to head the shop on those nights. Someone in charge of making sure the equipment is being properly used and willing and able to offer instruction to those who are new. We would like more than one volunteer if possible so that they can rotate nights. If none are able to offer instruction, that can be arranged at the home of Craig and Kellie Moore to get them started. We will also need assistance in getting the place up and running. This involves cleaning, organizing space, maintenance of equipment, maintaining equipment going forward, etc. We will need lots of help with this. All volunteers welcome with whatever assistance you are able to provide.

President Kellie Moore

Malachite

Malachite is one of those beautiful distinctive semi precious stone that once you've seen you'll never forget it. It is known to have been mined as early as 4000BC in Egypt. It has been used in jewelry and it may be the oldest known green paint pigment. It was also used at that time as an eye shadow. There is some disagreement as to the derivation of the name. It is agreed that it comes from Greek but it may be from the word malakos meaning soft or a similar word for the green herb "hollyhock" referring to the color. Malachite is used as an indicator for locating massive copper ore deposits. Wherever there's Malachite, there's sure to be lodes of copper. It is a secondary mineral in oxidized zones of copper deposits. Its chemistry is copper carbonate hydroxide. It is frequently found associated with azurite and produces striking combinations of blue and green. Malachite occurs when carbonated water interacts with copper minerals or when a solution of copper interacts with limestone. Malachite is commonly carved and used as an ornamental stone. Some of the most amazing uses of malachite were in Russia in the 18th and 19th century - whole rooms, halls, columns, floors, furniture, and vases were created from it. A most astounding find was made in 1835 in the Mednorudyansky mine in the Urals. A single 48 ton malachite rock was found. It took nine years to free this piece from the body of rock without breaking it. The discovery of large high quality deposits of malachite in the Urals was the beginning of a special type of mosaic technique in Russia. The malachite master's aim was to place the small malachite slices together in such a way as to create the illusion of a single monolithic piece. For jewelry, it is usually fashioned into cabochons or beads and is seldom faceted. It is easily scratched [hardness 3.5 to 4] and its polish can be dull if not protected. It is not advisable for use in rings, bracelets, or other jewelry that gets rough usage unless it is resin coated. Earrings, pendants, brooches, tie tacks and such work well. It is sometimes coated with wax or other artificial resins so care should be taken when cleaning a jewelry piece of unknown origin. Good quality malachite can be cabbed and polished as any of the softer stones. As

it is high in copper ZAM can be used for polish. A word of caution; the copper content of malachite is so high that it should never be worked dry, the dust is extremely toxic. Use plenty of water and consider wearing latex gloves. The majority of the world's malachite rough comes from The Democratic Republic of Congo [formerly Zaire], Namibia, Russia, and the American Southwest.

By Karen Dave via *The Opal*, via *Fulton County Rock Hounders* - Sept 2006



Bacterial Alchemy

As reported in on the *Geology News* web site:

Scientists in Australia have discovered that certain types of bacteria play very important role in the formation of secondary gold grains (and helping to initiate the precipitation of gold from solution).

Dr. Frank Reith analyzed bacteria found among the gold grains and in solutions from the Hit or Miss Mine in Queensland, Australia and discovered 30 unique species that were significantly different from bacteria found in the surrounding soil. When Dr. Reith placed one species of bacteria, *Ralstonia Metallidurans*, in a Petri dish, he was able to observe the gold precipitating from solution.

As the article notes, this may have some benefits to the mineral exploration industries since current models relating to gold deposits do not account for the precipitation of gold from a solution due to biological activity.

Paul Schmidt - Reprinted from *The Trilobite*, Sept 2006 via *The Rock Rustler's News* Volume 61, N# 10, Dec 2006

Museums of interest:

IOWA

Iowa Museum, Cherokee, IA. Mineral displays.

University of Iowa Museum of Natural History

Iowa City, IA. Housed in Macbride Hall on the northeast Pentacrest, the museum has four major divisions: anthropology, botany, geology, and zoology. Displays include a Devonian Age coral reef, a Pennsylvanian coal swamp, a giant sloth in a cool forest of the Ice Age, and human history in Iowa from the Ice Age to the early historic period

ILLINOIS

American Fluorite Museum

Main St, PO Box 755, Rosiclare, IL 62982, (618) 285-3513, Mar-Dec, Thu, Fri, Sun 1-4, Sat 10-4, Adult \$3, Child 6-12 \$1.

Burpee Museum

737 North Main St., Rockford, IL 61103-6971, (815) 965-3433. Monday-Saturday 10 AM - 5 PM, Sunday noon - 5 PM. Adults \$4.00. Outstanding displays on natural history, walk through geological time, dinosaur bones, fossils, minerals (especially fluorides), fluorescence.

Cahokia Mounds State Historic Site

Collinsville, IL 62234, off I-55/I-70 (8 miles from downtown St. Louis). FREE (\$2 donation suggested). Open daily 9 AM -5 PM except holidays; call ahead (618) 346-5160. National Register Site and World Heritage Site. Administered by the Illinois Historic Preservation Agency. Interpretive Center, Woodhenge; mounds include largest man-made earthen mound in North America.

Dickson Mounds Museum

Lewiston, IL 62234, (618) 344-9221. Between Havana and Lewiston. FREE. Open daily 8:30 AM - 5 PM except major holidays

The Field Museum

1400 S. Lake Shore Dr., Chicago, IL, (312) 922-9410. Off US 41. Daily 9 AM - 5 PM except major holidays. Adults \$7, seniors/children \$4; FREE on Wednesday. Fossils, etc.

Fryxell Geology Museum

Swenson Hall of Science, Augustana College, Rock Island, Illinois (west off 38th St., eastern campus entrance). FREE. Open daily 1 PM - 5 PM or earlier

Illinois State Museum

Spring & Edwards Sts., Springfield, IL 62703-5000. FREE. Monday-Saturday 8:30 AM - 5, Sunday noon - 5 PM. Closed major holidays. Collections include Mazon Creek Fossils.

Illinois State University [Museum]

Geography-Geology Dept., Campus Box 4400, Illinois State University, Normal, IL 61790, (309) 438-7640 & 438-7649.

Lafayette Funk Prairie Home & Mineral Museum

RR 1 Box 755 Shirley, IL 61772, (309) 827-6792, Mar-Dec, Tue-Sat 9-4

Lakeview Museum

1125 West Lake Ave., Peoria, IL 61614-5985, (309) 686-7000. Tuesday, Thursday & Friday 11 AM - 5 PM, Wednesday 11 AM - 8 PM, Saturday 10 AM - 5 PM, Sunday noon - 5 PM. Separate admission fees for Gallery and/or Planetarium

Lizzadro Museum of Lapidary Art

220 Cottage Hill, Elmhurst, IL 60126, (630) 833-1616. Tuesday - Saturday 10 AM - 5 PM, Sunday 1 PM - 5 PM. Closed Mondays, holidays. Adults \$3, seniors \$2, students and teens \$1, children under 13 free; FREE on Friday. Carvings, jade, gems, minerals

Museum of Science and Industry

57th St. & Lake Shore Dr., Chicago, IL. Weekdays 9:30 AM - 4 PM, weekends 9:30 AM - 5:30 PM. Adults \$7, students \$6, children \$3.50; FREE on Thursday. Omnimax tickets can only be purchased with museum admission. Special rates available for groups of 20 or more with 4 weeks advanced reservation. Contact Museum's Call Center (773) 684-1414, ext. 2290.

Quincy Museum

Newcomb-Stillwell Mansion (1890-1891, National Register of Historic Places), 1601 Maine St., Quincy, IL 62301-4264, (217) 224-7669. Tuesday-Sunday 1 PM - 5 PM. Adults \$2, seniors and children \$1. Discovery Room for children. Exhibits include minerals and artifacts

Southern Illinois University Museum

2469 Faner Hall, Southern Illinois University at Carbondale, Carbondale, IL 62901-4508, (618) 453-5388. Tuesday-Saturday 9 AM - 3 PM, Sunday 1:30-4:30 PM. Closed Mondays, holidays, and University breaks.

Western Illinois University Museum of Geology

Tillman Hall, 1 University Circle, Macomb, IL 61455-1390, (309) 238-1414.

Wheaton College

501 College Ave., Wheaton, IL 60187, (630) 752-5000
Wheaton, IL 60187, (630) 752-5000.



Newsletter

If you have a article you would like to see published let us know! You can e-mail the President at:

kalsinean1@aol.com