

# THE BACKBENDER'S GAZETTE

NEWSLETTER OF THE HOUSTON GEM & MINERAL SOCIETY



*Boulder Opal, Australia*

## OCTOBER IS FOR OPALS

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About Us: <https://hgms.org/>

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Upcoming Meetings and Events: <https://hgms.org/events/>

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Calendar: <https://hgms.org/calendar>

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Officers and Contact Information: <https://hgms.org/contact-us/>

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### BACKBENDER'S GAZETTE SUBMISSION DEADLINES

*Articles are due on the 15th day of the month before the date on the BBG issue.*

*Copy is due for the next issue by the 15th of this month. Email content to [editor@hgms.org](mailto:editor@hgms.org)*



## PRESIDENT'S MESSAGE

*by Nancy English*

Think HGMS 69th Annual Show. SIXTY-NINTH. Who started all this? I have only been in the club for nine years and everything I touch is the heir of volunteers before me. Scott Singleton wrote the History of HGMS and Annual Show History. I recommend this easy read to find out how we started. I said all that to say this, YOU are part of the future history of HGMS. Look for some time you can carve out to give to the Annual Show starting with Set-up on Thursday, November 10 through three days of events November 11, 12, and 13 Volunteer here.

Look for a skill and some time you can commit to being an Officer of HGMS. This Club means something special to each of us. Be one of the special people that help create the future. Two of the elected officers on the Board are willing to serve again next year. Me (Nancy English) as President and Beverly Mace as 2nd Vice President handling membership.

We will need a 1st Vice President to schedule programs for the monthly General Meetings. The Secretary position is available. Our current Treasurer will continue to do the bookkeeping for a new Treasurer but will not be able to serve on the Board. The Bylaws describe these positions. So, three capable, committed members are needed for the 2023 Board of Directors. Is one of them YOU?

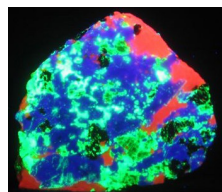
2023 promises to be a year of renewal for the Clubhouse. Watch the weekly eblast from Houston Gem and Mineral Society and the monthly BBG for updates.

I am not exaggerating when I admit that I am rewarded in every way for the time I spend volunteering for the Club. I am still the Volunteer Coordinator and want to make sure your experiences are fun and rewarding also.

## VICE-PRESIDENT'S MESSAGE

Glow and gleam, tonight is a scream! Come to HGMS clubhouse on October 24 for a General Meeting that will get you ready for Halloween! We will talk about things that glow such as:

What makes glow-in-the-dark paint?  
Why do some rocks "glow" under special lights?  
Does the glow of a full moon really bring bad omens?  
Uranium, cadmium, and radium, oh my! And more!



Goody bags will be available for all the youth in attendance.  
Keep an eye on the weekly eBlast or Facebook for updates!

## SECTION REPORTS



As always, please see the [Upcoming Programs](#) section under Events on the HGMS website to learn more about planned future meetings.

### BEADING SECTION (3RD SATURDAY AT 12:30 PM)

At our last meeting on September 17th, seven members, including some newcomers, enjoyed learning to make beaded spiders for display & sale at the Annual Gem & Mineral Show. This group of spiders are part of a special order. They glow in UV light! This project continues in October and several members will meet between meetings. The next meeting will be October 15th. If you want to help, e-mail [Beading@HGMS.org](mailto:Beading@HGMS.org) to be put on the contact list.

The Beading Section wishes to thank several generous donors who have provided materials that will be used in future projects. Thank you, Thank you, Thank you!

Would you like to receive notifications about upcoming Beading Group activities?  
E-mail [beading@hgms.org](mailto:beading@hgms.org) to be added.

### DAY LIGHT SECTION (1ST WEDNESDAY AT 1:00 PM)



For our October 5th meeting, Maggie Manley will lead us in making a leather wrap bracelet. Register with Nancy Searle at [daylight@hgms.org](mailto:daylight@hgms.org) at least a week in advance so that Nancy can advise Maggie who is preparing the kits. All programs are \$5.00 and the fee is paid at the meeting.

- On November 2nd, Neal Immega will show us broom straw casting.
- On December 7th, the Section will host our Annual holiday party, pot luck lunch, gift exchange, and planning meeting for the 2023 sessions - come with your ideas of what you would like to do next year!

For our previous meeting on September 7th, the section hosted Neal Immega who spoke about learning to identify rocks and brought many examples.

## **GEMSTONES AND FACETING (2ND THURSDAY AT 6:30 PM IN PERSON AND VIA ZOOM)**

We are looking into ways to keep the section interactive between our once-a-month meetings. That way we can better answer questions and keep an archive of the interesting things we've come across as a group. I'm currently tossing the idea of using a Discord channel as our means of communication which is easier to navigate than other social media platforms and comes with group voice, text, and video streaming built in.

## **LAPIDARY AND SILVERSMITHING SECTION (3RD MONDAY AT 7:00 PM)**



*Small slabs for ornaments, below*



- October 17, 2022 starting at 7:00 pm - Cutting and Polishing Larger Display Slabs. Tony will demonstrate using our large slab saws and we'll have rough for participants to cut and learn to feel comfortable using the equipment. Next, Tony will demonstrate using the handheld orbital polisher to get a nice polish on a slab, and everyone will have a chance to try it out on our test slab. The key is using fresh grinding pads in good condition! Everyone will get a slab to take home and leave with the know-how to come back during any Open Shop time to polish their material.
- November 21, 2022 starting at 7:00 pm - Pizza Party and Holiday Ornament making. We'll have a nice selection of small to medium polished thin slabs for participants to turn into ornaments. Bring your Show purchases for Show 'n Tell.

The September 19 Meeting was all about Big rings. Participants made a bold ring using larger cabochons.

## **MINERAL SECTION (3RD WEDNESDAY AT 7:30 PM (VIA ZOOM))**

- On October 19th, Steve Steinke will talk about collecting minerals in various localities mines of Southern California.
- At the September 21st meeting Dean Lagerwall, a member of the Mineral Section, gave a great talk on dendrites. Dendrites are often found in mineral specimens and lapidary material.

## **PALEO SECTION (3RD TUESDAY AT 7:30 PM)**

Chicxulub did not do it!

Everyone says that the meteorite killed of the dinosaurs and made it possible for the mammals to take over - i.e. US. Well, Neal Immega has very good evidence from here in

Texas that the meteorite did not do it. Something else did but 100,000 years later. So, I have a powerpoint talk that provides you with all the evidence to no-bill the meteorite.

This talk will be done live at the clubhouse and also via zoom.

The subject for our September 20th meeting was identification of ammonites using specimens from the Irene Offeman collection. Members brought ammonites to identify them.

## **YOUTH SECTION (1ST AND 3RD SATURDAYS FROM 10:00 AM TO 12:00 PM)**

We will continue our regular activities working in the shop and will also be preparing for the Annual Show.

### **SHOP NEWS** *by Neal Immega*

#### **FOREDOM SAW**

Busted bad! I had been getting complaints about the power feed on the middle 18" saw in the back. So I did a simple test - measured how much the saw table moved in 10 minutes. Nothing! Ok, the next step is to see if the clamp that grips the drive screw did not grip. Worked fine. Last step - look at the gearing that causes the drive screw to spin. That requires opening up the grease filled chamber at the back of the saw. Looks BAD. T

he main gear is about 6 inches in diameter with lots of teeth. Well, these do not look like they should. They now have a groove on the outside edge. Bad. Worse, the worm gear that spins the main gear also is dished. It is just like what happens when the car mechanic talks to you and says - All Shot. Total Replacement.

Well, I have done this repair before. I will let you know what it is going to cost us, and we have 14 saws in the shop (24" to 6") so we can afford to have some machines down for repairs. This is the benefit of having a big shop. Many thanks to Larry Garner who waded elbows deep in grease to get the parts apart and Cooper who offered to get the worm gear off the shaft. A 20-ton press is a good thing to have. Next, I have to see if the part numbers on the gears still mean something.

#### **TIG WELDER TRAINING**

We have received a loaner TIG welder while ours is being repaired. I am offering private 1-hour classes at 10 AM Thursday and 1 PM Saturday. You must email me at least a day in advance at [nealimmega@gmail.com](mailto:nealimmega@gmail.com) to sign up. Bring an 18x25 mm cab (or smaller) that is polished on both sides. Irregular shapes are fine. We will make it into a pendant. I will supply stainless steel wire. Silver is too difficult to weld.

All of the rust touchup has been done on the trim saws. The saws and grinders are as good as I can make them.

Paleo is Next - Organizing the Irene Offman collection is my next project.



## EDUCATION

We are seeking teachers to expand our class selections. Specifically: PMC, Dichroic Glass, Enameling, Mosaics, and bead weaving instructors are needed. Contact [Classes@HGMS.org](mailto:Classes@HGMS.org) for more information on teaching or taking classes. We are planning to offer more short & easy summer-time classes for those interested in making some fun projects.

Jeanean Slamen is preparing to offer additional enameling classes including: Enameling Surfaces, Foils & Wire in Enamels, Drawing & Painting on Enamel Surfaces, Textured Metal for Enameling, Raku & Crackle Enamel, Making Settings for Your Enamels. She is a great teacher!

## OCTOBER BENCH TIPS

*Smart Solutions for Your Jewelry Making Problems*  
[Amazon.com/author/bradfordsmith](https://www.amazon.com/author/bradfordsmith)

### WINDING JUMP RINGS



If you need a few jump rings the same size, it's easy to grab a round rod and wind as many as you need. But when you need a lot of them, some form of winder saves a lot of time. A variable speed screw gun makes quick work of winding the coils. Screw guns are quite inexpensive at discount stores and are remarkably handy for odd jobs in the shop and around the house.

To wind a coil, just bend a right angle on the end of the wire about a half inch long and insert this into the screw gun chuck. Then wind slowly, keeping a tight coil. I like to rest the end of the mandrel on the edge of the table or bench pin. Finally, one note of caution. If you are winding an entire length of wire, be careful as you get near the end of the wire. If the end passes under your thumb, it can cause a nasty scratch or cut.

### TOUCHING UP A BEZEL

Pumice wheels are good for touching up a bezel after you've set the stone. The hardness is about 6 on the Moh's scale, less hard than quartz, so it shouldn't scratch any of your agates or Jaspers. However, I'd avoid or be real careful of using pumice near the softer stones like Turquoise, Amber, Howelite, etc.

If you're unsure about the hardness of your wheels, test them on a piece of glass. Glass is about 5 ½ on the Mohs scale, softer than quartz. So if the wheel doesn't harm glass, it's safe for use on the Quartzes and harder stones.

My preference is the one inch diameter ones such as those shown at <https://riogrande.com/Product/AdvantEdge-Pumice-Wheels-Medium/332722?pos=2>

If you enjoy these tips on jewelry making, see many more in the sample chapters from these two books:

> Bench Tips 1 - <http://amzn.to/1Z6hQ06>

> Bench Tips 2 - <http://amzn.to/2KCyggh4>



## OPALS ARE FOR OCTOBER

by Sigrid Stewart

The National Association of Jewelers created the birthstone list in 1952 and over the years has occasionally altered that list due to fashion or availability of certain gemstones. Currently the birthstones for October are opal and pink tourmaline. The pink tourmaline was added because opals are definitely not the most durable of gemstones and some people apparently thought that they were too "feminine". Pink is also feminine, so possibly this is just marketing that targets men who buy jewelry for women!

Opal is a hydrous silicon dioxide with the chemical composition of  $\text{SiO}_2 \cdot n\text{H}_2\text{O}$ . The "n" in the formula indicates a variable amount of water. It does not have a crystalline structure but is amorphous. This is why opal is often referred to as a "mineraloid" rather than a "mineral."



Copyright Steve Blyskal 2018

Welo Opal, Ethiopia

The play of color that makes precious opal so popular is due to its composition of tiny, stacked silica spheroids which diffract the light passing through the opal into many colors. It's a rainbow in a rock!

Types of opal include:

- Precious opal with play of color and variable body colors from white through black. Black opal from Lightning Ridge in Australia is highly valued.
- Fire opal, with red, orange or yellow body color, with or without play of color
- Boulder opal with seams of opal within host rock
- Jelly or water opals look kind of jelly-like and may have play of color. Crystal

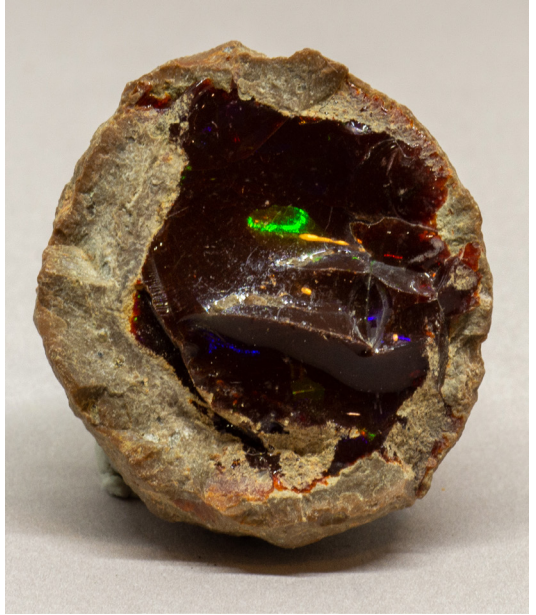


opals are very similar with less evident play of color – it is rather a misnomer as it is NOT crystalline. Both have a transparent or semi-transparent body color.

- Matrix opal is often found in sandstone, limestone or ironstone - opal cements the matrix. Andamooka, Australia, are famous for matrix opal, and Guatemalan matrix opal and Louisiana sand opal is also well-known.
- Common opal is simply opal without play of color. It does occur in some beautiful colors, like blue and pink, which are sought after by lapidaries.
- Dendritic opal is common opal with dendritic inclusions – fern-like patterns of manganese or iron.
- Cat's Eye opal has parallel inclusions of rutile which produce a chatoyant line across the face of a cabochon,
- There are also various lab-created opal materials.



*Welo opal, Ethiopia*



*Welo opal with brownbody color, Ethiopia*

Cut stones may be faceted or cut as cabochons, which may also be doublets or triplets with a backing stone and quartz cap. Opals in general can be delicate and may crack or craze if subjected to rough treatment or harsh chemicals. Treat yours like a luxury product and you two will get along well.

The first opals seen in Europe were from India and were called “upala”, the Sanskrit word for gemstone. The Romans, who loved opals and thought that they combined the beauty of all precious stones, called them “opalus” or in the plural, opali. The Caesars gave their wives opal for good luck. Also, the ancient Romans wore opal as a symbol of love, hope and purity and believed it could cure illness. Arabic legends say opal falls from the heavens in flashes of lightning. The ancient Greeks believed opals gave their owners the gift of prophecy and guarded them from disease.

Here are some fun facts about opal:

- NASA's Mars orbiter's Compact Reconnaissance Imaging Spectrometer found

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evidence of hydrated silica, commonly known as opal. Hydrated mineral deposits indicate water was present on ancient Mars.

- Queen Victoria had a very large collection of opals, her favorite gemstone.
- Opal is also known as the national gemstone of Australia, which produces 95%-97% of the world's supply of opal.

Opals have been found in India, Hungary, Canada, Poland, the Czech Republic, Slovakia, Indonesia, Peru, Guatemala, Nicaragua, Brazil, Mexico, Honduras, Ethiopia, and especially in Australia.

Closer to home:

- Nevada boasts the famous Virgin Valley opal, and the Royal Peacock, Virgin Opal and Rainbow Ridge mines.
- Oregon has many small mines, including a large fee dig site, Juniper Ridge Opal mine. Other noteworthy localities are Opal Creekland and Klamath Falls in Klamath County and Opal Butte mine in Morrow County
- Arizona has the Opal Hill Mine near Palo Verde for fire agate and Sky Opal mines in Santa Cruz county for soft blue opals. Burro Creek is another locality know to produce opal.
- Idaho is known for fire opal, banded opal, Hyalite opal, common opal and opalized wood. The Spencer Opal mine is famous for thin layers of opal used to make opal triplets.
- Utah has Banded Bacon opals that literally look like strips of bacon. Unique and very colorful opals were found at the Opal Gemstone mine in Milford, which unfortunately has closed.
- Washington was the site for a discovery of precious opal in Whelan, Whitman County, back in 1890, but the mine played out by 1904. Opalized wood and common opal are found on the Yakima River in Sunnyside, Greenwater River in King County and Wind River in Skamania County.
- Arkansas has some occurrences of dendritic opal, precious fire opal and hyaline opal found in petrified wood.
- Louisiana can claim Louisiana Sand Opal, which is an opal-cemented sandstone found in the Catahoula Formation in Leesville, Louisiana.



I would add Texas to this list; common opal is pretty common, after all! Pale blue common opal and a small amount of precious opal were found at the Woodward Ranch near Alpine, Texas. Steve and I once found pink opal in a rockfall near Alpine and just recently, on the Kokernot o6 Ranch near Alpine while on an agate hunt.

Common opal can also be found in volcanic deposits such as basalt, andesite, and rhyolite, as a replacement in petrified wood and in sedimentary formations.

*Common opal, Woodward Ranch, West Texas*

## References:

<https://www.mindat.org/locentry-218270.html>

<https://geology.com/gemstones/opal/>

<https://www.opalsdownunder.com.au/learn/crystal-opals/>

<https://en.wikipedia.org/wiki/Opal>



*Fire Opal, Mexico*

All photos by Steve Blyskal

For gorgeous pictures of cut opals that I know you want to see, visit the reference sites!!

## TOURMALINE TOO

*by Sigrid Stewart*

Opal may be traditional, but Pink Tourmaline is the modern October birthstone (at least according to the jewelry marketing industry). Tourmaline is actually a group of silicate minerals in which boron is combined with several different elements such as aluminum, iron, magnesium, sodium, lithium, or potassium.

The name is from the Sri Lankan Sinhalese language word "toramalli", meaning "gemstone of mixed colors." Indeed, tourmalines come in every possible color, often black but ranging from clear to red, orange, yellow, green, blue, violet, pink, and red, and bi-colored and even tri-colored crystals are often seen. Tourmaline crystallizes in the trigonal system and has a vitreous or glassy luster. It is 7 to 7.5 on the Mohs scale making it relatively durable as a gemstone.

Tourmaline has an eye-bewildering formula;

$(\text{Ca}, \text{K}, \text{Na}, \text{ } ])(\text{Al}, \text{Fe}, \text{Li}, \text{Mg}, \text{Mn})_3(\text{Al}, \text{Cr}, \text{Fe}, \text{V})_6(\text{BO}_3)_3(\text{Si}, \text{Al}, \text{B})_6\text{O}_{18}(\text{OH}, \text{F})_4$ , where the Boron unit repeats to form the typical cyclosilicate structure of tourmaline. That little box in the formula refers to a vacancy (or framework vacancy) in the crystal structure, which can be empty or filled with a "guest" atom.

Tourmalines were first brought to Europe from Ceylon (now Sri Lanka) by the Dutch East India Company. The stones were used by chemists to polarize light in various experi-



*Elbaite, Himalaya Mine,  
San Diego County, CA*

ments. Chemists also studied their rather interesting pyroelectric properties; the “Ceylonese Magnets” could attract and then repel hot ash.



*Sphere with rubellite in lepidolite*

There are 37 different species in the mineral group, but common species are Schorl (brown to black), Dravite (yellowish to brown-black), Elbaite (many colors) which takes its name from the type locality, the Italian island of Elba, Rubellite (red to pinkish red), Indicolite (blue to blueish-green), Uvite (green) and Liddicoatite (many colors). Most gemstones are Elbaite.

Today, tourmaline is mined in Afghanistan, Brazil, India, Indonesia, Kenya, Madagascar, Mozambique, Malawi, Nigeria, Namibia, Pakistan, Russia, Sri Lanka, and Tanzania. The first American discovery was in Maine in 1822 and produced raspberry and mint-green colored stones.

in 1890 a man named Charles Russel Orcutt found pink tourmaline at what later became the Stewart Mine in San Diego County, California. The California deposits are still famous for bright pink and bicolor tourmalines. These two states were the world's largest producers of gem tourmalines in the early 1900's. The Empress Dowager Tzu-hsi, the last Empress of China, loved pink tourmaline and bought large quantities for gemstones and carvings from the Himalaya Mine in San Diego County, California.

Pink tourmaline is seen as a stone of love, compassion, and emotional healing by the metaphysical community, adding to its popularity. Some sites say that Paraiba tourmaline is also an October birthstone. The best Paraiba tourmaline is of an intense electric blue color. It is mined primarily in Brazil. Perhaps its rarity lends itself to marketing – rarer and more valuable than diamonds!

Just ask a jeweler!

#### References:

<https://www.gemstone.org/tourmaline>

<https://en.wikipedia.org/wiki/Tourmaline>

<https://www.gemsny.com/blog/the-graceful-october-birthstones-pink-tourmaline-and-opal/>

<https://thecrystalcouncil.com/crystals/pink-tourmaline>

<https://www.gemstone.org/tourmaline>

All photos by Steve Blyskal.

## GET READY FOR SOME SHOW ACTIVITIES!

### POSTCARD LABELING:

On Saturday, October 8, the Show Committee is having their annual postcard labeling party at the clubhouse starting at 10:00 a.m. It typically lasts for about an hour to an hour

and a half. Please come out and support the Society and your Show Committee as they start ramping up their efforts in preparation for what we expect to be a really great show in November. Pizzas will be delivered around 11:15 to sustain the volunteers.

### **SHOW POTLUCK DINNER AND AUCTION:**

In the evening of Saturday, October 8, also at the Clubhouse, the Show Committee is providing the meat for the Annual Potluck Dinner and Auction to support the 69th Annual Show. The Potluck Dinner will start at 6:00 p.m., so bring your favorite side dish or dessert to share about 5:45. Let Nancy English know what you are bringing (generally: salad, vegetable, dessert) and if you can help with the set-up or clean-up. Email her at [president@hgms.org](mailto:president@hgms.org). The auction will start at about 7:00 p.m. The Donations Committee is supplying material to auction. Steve Blyskal will be the auctioneer for minerals and Neal Imega the auctioneer for fossils and lapidary.

### **VOLUNTEERS FOR THE ANNUAL SHOW:**

The Annual Show is organized by the Show Committee, but it is actually put on by our members through your volunteer efforts. We have a large number of positions that need volunteer help in order to run a successful event.

There are 125 shifts to fill over the 3-day Show: such as the Info booth, Ticket Booth, Ticket Takers, Security, Youth Education (Youth Area, Dino Dig, Kids Day on Friday, Scout Geology Merit Badge on Saturday), set-up on Thursday, November 10, and take-down on Sunday, November 13.

Please sign up online at <https://hgms.org/annual-show/volunteering/>. And remember that because we value our volunteers, we will be hosting a Volunteer Appreciation Party the weekend after the Show, and you're invited!

### **SHOW TICKETS - PURCHASE ONLINE FOR PRE-SALE!**

This year show tickets will be available for purchase online on the HGMS website for both HGMS members and the general public.

The link to buy tickets is on the Annual Show page (<https://hgms.org/annual-show/>).

We will be advertising this heavily on Facebook and Instagram and in our eblasts.

However, for HGMS members, you can use the discount code 2OFF to get \$2 off of the ticket price (for a price of \$7 since tickets are now \$9 for the general public). You can use this code to get an unlimited number of tickets. Each will have its own QR code and serial number to keep track of those redeemed at the show.

We recommend that you take advantage of this discount because the Show Committee is no longer mailing out tickets to members. (That's right! Beginning this year, the Show Committee is no longer mailing tickets out to members for pre-sale purposes. This will save mailing expenses as well as a lot of the work involved with managing the mailed tickets.)



## MORE ON IMITATION TURQUOISE

by Neal Immega



Pure Turquoise is copper phosphate but it is never pure and thus comes in many patterns and colors. It is frequently "punky" and so stabilization with plastics or chemicals like sodium silicate is common. The color is also improved with dyes.

This slab I photographed is a wonderful example of howlite, a calcium, sodium, borate with variable amounts of water. It is even harder than turquoise. Note the classic spiderweb pattern of black. When dyed, this is very hard to tell from the real thing without destructive tests.

You have been warned.

## CAN DIAMONDS BE FOREVER?

*Don Shurtz, Pleasant Oaks Gem and Mineral Club of Dallas  
Chips and Chatter Newsletter, September 2022 Vol. 56, Issue 9  
Pleasant Oaks Gem and Mineral Club of Dallas*

Are diamonds the only stone for an engagement ring? The jewelry dealers would like for everyone to say yes, but it is not necessarily so. Starting about 2018, the gemstone Morganite started to become popular as an alternative to diamond in engagement rings. Morganite is of the Beryl family that includes emeralds and aquamarines. They all have the same crystalline structure, streak, density, and Mohs hardness. It is tiny amounts of trace elements that get caught up in the crystal matrix that cause differing colors.



*Faceted Morganite, see references*

Before morganite started its turn at popularity, emeralds, aquamarines, rubies, topaz, sapphires, and other gemstones also had a run at popularity. Many different gemstones are suitable for engagement rings unless, of course, you are of the De Beers family.

In the 19th century, the De Beers corporation came to own many diamond mines in South Africa and rapidly grew to be the largest producer of diamonds. In fact, they had a glut of diamonds on hand and were looking for a way to sell even more. They hired the N.W. Ayer advertising agency to promote the sale of diamonds, particularly diamond

engagement rings. They were hired to convince Americans in general, and couples in particular, that diamonds were synonymous with love. They created the phrase “A Diamond is Forever” to promote the belief that the pure, durable diamond was like the love between two people and they simply had to show it (the love, the diamond, or both). They also tried to convince couples that the size and quality of the diamond reflected how much love the marriage had. Not surprisingly, the advertising campaign worked. It worked even better than they had hoped. De Beers profited handsomely as the sale of engagement rings, and diamond engagement rings became far and away the most popular. De Beers went on to control the Diamond market and still does so today.

It is said that if De Beers were to dump the Diamonds they are holding back, they could drive any other producer into bankruptcy, but instead, they simply bought up most of the competitors. That is slowly changing today, but De Beers is still the major factor in setting the price for diamonds. The fact that other competitors can make a handsome profit by selling their stones at De Beers' prices keeps De Beers in control.

Engagement rings get their historic start in Egypt in 850 when Pope Nicholas I declared that an engagement ring signified a man's intent to marry. At that time most engagement rings were simple bands of gold. Many had a small key attached signifying the woman's status as “owned”. Anthropologists believe that the first ring with set gemstones to be involved in an engagement was the proposal between Archduke Maximilian of Austria and Mary of Burgandy. Following tradition before it was a tradition, the ring was a band of diamonds, the diamonds forming an “M”, the initial of her first name. Aristocracy soon followed the couple by giving diamond and other gemstone engagement rings and a tradition was established. The ring became a part of the tradition but was not necessarily a diamond. Emeralds, rubies, and other fabulous gemstones were used until De Beers managed to change things.

Back to more recent times: why would an engagement ring with a morganite gemstone be considered an option to replace a diamond? To start with, morganite is the pink variety of beryl, and pink is a feminine color and a color of love. If the size and quality of the stones reflect the amount of love, you can get a whole lot more stones of morganite than for the price of diamond stones; three to 10 times the size of the stones. And, as mentioned, it is pink.

It would be extremely expensive to buy a three-carat Diamond, but a three-carat morganite can easily be had for the price of even a single-carat Diamond. And did I mention that Morganites are pink? In my volunteer duties at the Perot Museum of Nature and Science, I have shown a large morganite specimen to many people, and it is surprising the number who immediately show me their



*Morganite specimen photographed by Don Shurtz,  
Perot Museum of Nature and Science*

morganite engagement ring. Diamonds are still the most popular, but other stones are gaining traction.

Reference:

- The History of Engagement Rings, <https://www.life123.com/celebrations>
- The Surprising History of Engagement Rings, <https://www.brides.com/>

Pictures:

- Cut Morganite, picture by Koreller, licensed under the Creative Commons Attribution-Share Alike 4.0 International license, from Wikimedia Commons, <https://commons.wikimedia.org/wiki>
- Picture of Morganite specimen by Don Shurtz of a large Morganite on display at the Perot Museum of Nature and Science

## **ROBERT EARL FISCHER 4/9/1954 - 8/21/2022**

Bob Fischer, longtime HGMS member, died on August 21, 2022, after a brief illness. He was a loving husband, inventive engineer, avid rockhound and mineral collector. He was most at home outdoors, camping, hiking, and kayaking and he loved Wyoming. You can read the full obituary here <https://www.mykeeper.com/profile/RobertFischer/>.



Bob was rightfully proud of his work as a design engineer. After graduating from DeVry University, he briefly worked at Texas Instruments where he helped develop microwave oven digital controls and electronic darts. He was part of the group at AeroService (later Western Geophysical) that developed the first commercial GPS in the late '80's. Nancy and he met in Aero's Houston office. He holds patents for his work developing telemetry systems for arctic marine surveying and exploration. Most recently, he was a partner in a small engineering firm.

He also spent many years in the field running aerial magnetometer surveys. While working in Aero Service's Houston office, he met his wife, Nancy. He had a wide range of interests including working – and riding! – on old Harleys. He loved science and technology,

thrillers and old westerns, travel and flying. He could 2-step, swing and loved to waltz. Last year he went skiing after a 35-year hiatus.

He loved rockhounding and was a member of the Houston Gem and Mineral Society and the

Sublette County (Wyoming) Rockhounds, the club near their home of the last couple years, Boulder, Wyoming. He leaves behind his wife of 31 years, Nancy, his stepson and daughter-in-law, Matthew and Alison Sklar.

## **BLACK OPAL**

*by Barbara McCondra*

As Primitive Man so cherished a hot, red fire in the blackness of night, so do gem lovers of the world value above all other opals, the red-on-black opal. Every gemstone category has its primadonna and the red multicolor black opal can command \$20,000 plus per carat. Many factors contribute to the identification of such a superb gem black opal. The location of its mine of origin is the first consideration, Australia being the most desirable as the gem quality opal there is of sedimentary formation rather than volcanic. It is Australian black that I refer to now. The blackness of the base color, the brilliance of the fire, the predominance of red, the richness of the red, the quality of the other colors with the red (heliotrope, yellow, cornflower blue, electric green, gold bronze) the rareness and desirability of the pattern of the fire, the directionality of the fire (is the color play "ON" at all angles of viewing), the fluidity and mobility of color and pattern, the shape and size of the stone, and the overall composite appeal of all these factors. All of these are a part and parcel of the gem look, that special magic, hence gem value, of the opal.

Opal aficionados have their individual preferences, but market consensus gives top dollar value to red on black. The Red Robin, Red Admiral, Black Prince, Pride of Australia, Firestorm, the Flamingo, the Cardinal, the Southern Princess, and the Flame Queen are among the list of precious, world renowned, red-on-black gem opals. A list could be made too of many secretly bought and sold exquisite stones if it all were not so exactly that, secret! The lists go on and on. Both the famous named and secret black beauties commanded royal prices.

The colors within an opal have been observed by electron microscope to be the result of the breaking up of light into the spectral colors. Red is the color caused by diffraction of light at the interface of the voids which are created by the three-dimensional grates of 3,000 to 4,000 angstrom wide silica spheres. The diameter of the spheres control the size of the voids.

For simplicity, envision stacks of egg cartons with the egg cups representing the silica spheres and the spaces between the cups, the voids. To explain the blackness of the opal from which the red fire flashes is not as easy. I can tell you that all potch (opal with no fire/common opal) is made up of irregularly shaped and irregularly stacked silica spheres. However, potch can be many colors ranging from clear, white, yellow, green, orange, red, grey, charcoal, black, to glassy black. There is controversy over what it is about black potch that makes it so black. These assorted theories range from formation in black swamp water, carbon molecules, manganese presence, to properties inherent in the structure that causes the absorption of white light resulting in non-light or black. I leave this argument to the scientists.

To the romantics, the poets, the opalholics, I liken the magic of the red-on-black to the red heart of Australia, its fiery desert sunsets, its redback spiders (themselves tiny replicas of a black cabochon with a bloodred spot) that appear to be the guardians of every opal mining-shaft, and the dancing flashes of red in a black Antarctic sky known as the Aurora Australis.

To the investment minded collector, I equate the red-on-black opal with the pink diamond, the Burmese pigeon blood ruby, the Colombian blue green emerald, and the Tahitian Peacock or Aubergine black pearl. To the historian I tell the tale of hope for another season of mining being paid for with the proceeds of a red-on-black beauty found by a red-eyed gouger in the face of his drive fifty feet underground in Lightning Ridge, Australia. I tell you of the old timers in the early 1900s that used to throw away the beautiful blue/green stones because it was only the red-on-blacks that were marketable. Many a modern-day miner has made money on processing the throw away stow dirt from that time frame. Nearly with tears in my eye, I tell you of the famous "Black Prince", which was dropped onto the floor and broken in two, but due to its good size and quality still retained great value.

Be it the past or the present, each miner dreams of red-on-blacks as he stares into the comfort and company of his evening fire. He is mesmerized by the red glowing coals into reminisces of long-gone red beauties he has mined or had the privilege of viewing. Mostly he conjures up visions of the prized red-on-blacks his day's traces promised him will be forthcoming, perhaps in the next few tons of dirt he shifts.

#### References:

From The McCondra Report ...

Opal Express 3/97 via: Source: WGMS July 2019

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Unfortunately, Creative Commons/Wikipedia does not carry pictures of the famous opals discussed in this and in the previous article "Opal is for October". To see some wonderful famous opals, visit the following site:

<https://www.altmanncherny.com.au/famous>

<https://en.wikipedia.org/wiki/Opal>

According to Wikipedia, Lightning Ridge in New South Wales, is the main source of black opal, which is opal containing a predominantly dark background (dark gray to blue-black displaying the play of color), collected from the Griman Creek Formation. Some black opal is also found in the McIntable Field.

Would you like to see more fabulous opals? Go to Pinterest and do a deep dive down the rabbithole looking at opal. Pinterest will deliver!



# BOARD OF DIRECTORS MEETING MINUTES

September 6, 2022

By Sharon Halton

X	President— Nancy English	x	Beading— Maggie Manley
X	1st Vice President—Sarah Metsa	X	Day Light—Fred Brueckner
X	2nd Vice President—Beverly Mace	X	Gemstones & Faceting—Randy Carlson
X	Treasurer—Michele Marsel	X	Lapidary & Silversmithing—Richard Good
X	Secretary—Sharon Halton	X	Mineral—Ray Kizer
	Past President —Sigrid Stewart	X	Paleontology—Mike Dawkins

## PRESIDENT'S COMMENTS:

President Nancy English called the Zoom meeting to order at 7:38 p.m.

A quorum was present.

There were no non-voting members in attendance.

## PRESIDENT'S COMMENTS:

Passing of Bob Fischer Bob Fischer, a longtime member of HGMS passed away on August 21, 2022. There will be a memorial gathering On Sunday, September 11, 2022, between 2:00 and 5:00 p.m. to honor his life at the family's home here in Houston. There is more information under the Scholarship Committee report.

## Approval of Minutes:

Michele Marsel moved via email to approve the minutes of the August 2, 2022 Board of Directors 'Meeting. Fred Brueckner seconded the motion. It was voted on via email and passed on August 10, 2022.

Treasurer's Report: Treasurer Michele Marsel sent the Treasurer's Report to members on September 5, 2022.

- Effective August 30, 2022, the interest on our Live Oak account is now 2.00%
  - Shop Maintenance Expenses - we increased this line item in July by \$1500.
- In September, we will be over budget again after reimbursing \$679 for the remaining diamond grit used to recoat wheels. It was decided to just continue showing overrun for the remainder of 2022.

## COMMITTEE REPORTS

BBG Notice: Beverly Mace notified members on September 1, 2022, that the online version of the September 2022 BBG is available on the HGMS Website.

• Michele gave feedback on behalf of the BBG and Web committees on requests to print the full club calendar in the BBG again. The location of the current calendar on the website was demonstrated to be on the dropdown menu of the Events button on the home page. There is a new link and form on the page where members may submit items

for the Calendar. To avoid the BBG and Website calendars being out of sync (a previous technical issue), the Web Committee decided against reprinting the calendar in the BBG. The online BBG will continue to have links to the Web calendar.

- The BBG Editor has added a page of upcoming shows.

Roster 2022: A discussion of the 2022 roster was held and Beverly stated it will be completed shortly.

Donations, Sales, Auction Committee (DSAC): Michele Marsel

- Sales of the Helm donation will continue.
- A question was raised about how the DSAC determines if a particular object will be offered to a Section for their use or for sale to benefit the Section Treasury. Michele and Fred gave a brief overview of the Donations Policy approved by the Board and there was a request for further discussion on this in the October Board Meeting.
- A Chairperson for donations is needed by the end of the year when Michele will step down.

Education Committee: Maggie Manley Dean Wix, our new Club house manager for non-shop issues, contacted Renee Guerrero of C & S Janitorial to ask if the service could be performed between 8:00 a.m. and Noon, so that classes can be held on Friday afternoons. Renee said our cleaning crew agreed to the new schedule. Now Maggie can schedule Friday afternoon classes.

Safety Policy Committee Michele Marsel:

- New lighted exit signs and path lighting installation is complete.
- Upgrade to LED and photocell repair of parking lot lights is complete.

Scope of Contractor Bid

Final review of the Scope for Contractor bids - Michele sent the updated document today. A discussion followed. Many sections were discussed.

Air Abrasives Shop renovation needs were reviewed in detail. Both Mike Dawkins and Ray Kizer clarified the needs for this area. The scope was clarified to state:

1. Add heating/air duct and air return into this room
2. Close the floor level hole in the wall between Lapidary and Air Abrasives shops
3. No additional air filtration is required. There is a large filter unit already in the room, and users need to remember to turn it on (add some signs).

Sharon Halton made a motion to accept the “Clubhouse Upgrade Scope for Contractor Bids” as presented by Michele Marsel to go forward as soon as possible. Maggie Manley seconded the motion and it was passed with no nays or abstentions.

Membership Committee: Beverly Mace reported new and renewed memberships in August.

Member counts	New
Singles	7
Couples	1
Families	0
Youth	3

Scholarship Committee: Mike Sommers via email: "Nancy Fischer contacted me asking if it would be OK if she requested donations to our scholarship in lieu of flowers for a memorial service for Bob. She would like it if we'd of course offer it in his name next year. She does not know whether any amount would cover a complete scholarship and she offered to make up the rest. I said I had no objections and do not know any reason why we wouldn't or couldn't do this, but I said I would run this by the BOD just to make sure." The Board was appreciative to Nancy for thinking to do this for the Club.

Show Committee: Next meeting is September 13, 2022, zoom 5:30 p.m. Notices have been posted in the E-blast. Beverly reported that postcards have been sent out to the schools.

Maggie would like to see if more demonstrations could be done during the show.

## SECTION REPORTS

Beading Section in person: third Saturday, 12:30 p.m., September 17, October 15, 2022, November 19, 2022.

Day Light Section in person: first Wednesday, 1:00 p.m., September 7, October 5, 2022, November 2, 2022.

Gemstones and Faceting Section Zoom Hybrid: second Thursday, 6:30 p.m., September 8, October 13, 2022, November 10, 2022.

Lapidary and Silversmithing Section in person: third Monday, 7:00 p.m., September 19, October 17, 2022, November 21, 2022.

Mineral Section Zoom program planned: third Wednesday, 7:30 p.m., September 21, October 19, 2022, November 23, 2022.

Paleo Section in person: third Tuesday, 7:30 p.m., September 20, October 18, 2022, November 22, 2022.

Youth Section in person: first and third Saturdays, 10:00 a.m. to Noon., September 17, October 1, and 15, 2022, November 5 and 19, 2022.

## OLD BUSINESS

A/C Maintenance: Dean Wix had a lengthy conversation with Lee Thompson A/C (office team) and they stated there was no blower issue with any of our A/C units. However, when their bill was received it stated that Unit #3 (old Carrier unit) had a short in the blower. All units seem to be working fine, and Dean will contact them again to clarify the billing statement comment.

Exterior Painting: This is now 100% complete. Bill has been paid.

Nominating Committee: There have been no volunteers identified. It may be time for someone to be assigned since no one has stepped up.

Divider Partition for Main Room: Maggie stated she has taken some measurements and will continue the discussion next month about a fabric partition.

Neal Immega's Transition from Shop Manager.

September 1, 2022 will be recorded as the official date for the Lapidary and Center Classroom Shop Manager positions to be turned over to Logan Wilcox and Richard Good.

In the future, all shop supply purchases will need to be approved by Logan Wilcox or Richard Good before the purchases are made.

Display Cases status – no new information

## NEW BUSINESS

2022 AMFS and SCFMS Convention: Would anyone on the Board like to represent us at the 2022 AMFS and SCFMS Convention October 13, 14, 15, & 16, 2022

John A. Alario Center, 2000 Westwego Blvd., Westwego, LA 70094

The president expressed that in the past we have subsidized the trip for members willing to represent us.

Faceting Section Equipment Purchased for use at Show Demonstrations:

Randy reported that the Faceting Section had spent about \$1,100 on Gem ID equipment which will be used at the Gem ID area for the Annual Show. He asked if there was a policy for the General Club Fund to reimburse a Section for this type of expenditure, especially when equipment is being purchased for use at the annual Show. The topic will be discussed more fully next month.

The next Board of Directors Zoom meeting will be on the first Tuesday, 7:30 p.m. October 4, 2022

The next General Meeting will be on fourth Tuesday, 7:30 p.m. September 27, 2022.

Steve Blyskal will do the presentation but the topic is to be determined.

Adjourn: Richard Good moved to adjourn. Ray Kizer seconded the motion and it passed.

The meeting adjourned at 9:23 p.m.

## **HOUSTON GEM & MINERAL SOCIETY GENERAL MEETING MINUTES**

September 27, 2022

*By Sharon Halton*

President Nancy English called the meeting to order at 7:36 p.m.

She welcomed members and guests: nineteen in person and five joined by zoom.

New members: Luis and Dalia Mendoza joined recently after taking the cabbing class. This was their first General Meeting.

Guests: Ken Rogers

## **PRESIDENT'S COMMENTS**

The speakers used for the hybrid meetings are very sensitive. If you feel the need to have a personal conversation during the meeting or the program, please move to the garage.

The next two months are all about the 69th Annual Show. The Show Committee is like a machine with all the moving parts being oiled and polished for perfect performance. Now, all we need are volunteers to fill 125 shifts to make it work. Save the dates November 11, 12, and 13. I will talk more about the Show later.

Approval of Minutes: Steve Blyskal moved to approve the minutes of the August 23, 2022; General Meeting as published in the September 2022 BBG. James Wark seconded the motion and it passed.

## COMMITTEE/SECTION REPORTS

Please look for reports of future Section meetings and programs in the BBG calendar, on the Website <https://hgms.org/events>, or by reading the weekly e-blast from Houston Gem and Mineral Society. If you are a member and not on our email list, please contact the Publicity Chair at [News@hgms.org](mailto:News@hgms.org), using the Subject Line: "New Member to be added." President English invited other Section Chairs and Standing Committee Chairs to make any additional announcements.

Membership Committee: Beverly Mace stated that the roster will be ready next week. Donations, Sales, Auction Committee (DSAC): Michele Marsal. Two (2) Dr. Rocks 18" slab saws are for sale by auction ending October 13. Michele will be leaving her position as DASC Chairman at the end of December. Anyone interested in assuming that responsibility should contact President English at [president@hgms.org](mailto:president@hgms.org).

Education Committee: Maggie Manley announced that she is coordinating with other teachers and sections to provide a series of Santa's Workshops this fall and in December. Look for more information in the BBG, on the Website in the weekly eBlasts from Houston Gem and Mineral Society.

Nominating Committee: Since we do not have a nominating committee this year President English will be contacting individuals to solicit nominations for the elected positions that will be available in 2023.

There are five elected officers on the Board. President, 1st Vice President, 2nd Vice President, Treasurer, and Secretary.

- Nancy English is willing to continue as President.
- Beverly Mace will serve her last of 29 years as the 2nd Vice President in 2023.
- Sarah Metsa is stepping away from the 1st Vice President position to learn the ins and outs of the membership responsibilities from Beverly. The 1st Vice President schedules the programs for the General Meetings.
- Sharon Halton has fulfilled her commitment of one year as Secretary.
- Michele Marsal has committed to continue doing the bookkeeping for an HGMS new Treasurer but will not be able to attend Board meetings.

So, we are looking for three new officers. Secretary, Treasurer, and 1st Vice President. Please contact Nancy English at [president@hgms.org](mailto:president@hgms.org) if you are interested in any of these positions or willing to be on the Nominating Committee to find people for these important jobs.

Safety/Policy Committee: Nancy English/Michele Marsal: In a discussion of the progress of the committee Sharon Halton reported that the Board of Directors has accepted a preliminary "scope of improvements" to the HGMS shops. President English said the project manager of the committee will be interviewing General Contractors soon. More information will be available in November and December. Look for work to start in January.



## Show Committee: Scott Singleton Upcoming Events

**Postcard Labeling** – the Show Committee is having their annual postcard labeling on Saturday, October 8 at the clubhouse starting at 10:00 a.m. It typically lasts for about an hour to an hour and a half. Please come out and support the Society and your Show Committee as they start ramping up their efforts in preparation for what we expect to be a great show in November.

**Show Dinner and Auction** – the Show Committee is hosting its annual dinner and auction to support the Annual Show on Saturday, October 8, with dinner at 6:00 p.m. and the auction to start at about 7:00 p.m. The Donations Committee is supplying material to the auction. Steve Blyskal will be the auctioneer for minerals and lapidary. Neal Immega will auction off the fossils.

**Volunteers for the Annual Show**– the Annual Show is organized by the Show Committee, but it is actually put on by our members through your volunteer efforts. We have 125 shifts that need volunteer help to run, such as the Info booth, Ticket Booth, Ticket Takers, Security, Youth Education (Youth Area, Dino Dig, Kids Day on Friday, Scout Geology Merit Badge on Saturday, and set-up and take-down. The Hospitality room will return with new coffee carafe machines. We will need two new volunteers for the Hospitality Room this year.

Please sign up online at <https://hgms.org/annual-show/volunteering/>.

**Volunteer Appreciation Party:** And don't forget that because we value our volunteers, we will be hosting a Volunteer Appreciation Party the weekend after the Show, and you're invited! Also, anyone who volunteers at the Club throughout the year is invited: Shop Foremen, Committee Chairmen, Section Chairmen, Board Members, volunteers at the Clear Lake Show, those who volunteered to work the DSAC auctions, and volunteers that set up and tore down the Holiday Party in 2021.

**Returning Show Features:** The Rock Food Table is returning this year after being unavailable for many years. The Fluorescent Booth has been upgraded and simplified for a returning debut. Steve Blyskal, Ray Kizer, and Dean Wix have worked to make the Mineral Section's Fluorescent Booth easier to set up using photos of the displays. They will need two volunteers on November 10, Show set-up day to complete the project.

**Show Tickets** – Tickets can be bought online and still provide members with a \$2.00 discount for themselves or guests. The regular price is \$9.00 before the discount. Use the discount code "2 off" when ordering your tickets online. The discounted tickets will not be available at the Ticket Booth at the Show.

**Web Site Committee:** Scott Singleton/Sigrid Stewart – There is no updated report at this time.

## OLD BUSINESS

President English asked members to look for the progress of Old Business items in the

Board of Directors Meeting Minutes in the latest BackBenders Gazette (BBG) on the HGMS Website <https://hgms.org> under Publications.

Building Issues: Last month a question was raised about painting the lower edge of the building. The concrete foundation collar was not painted on other buildings in Dunn Southwest either. The Board determined that it does not need to be painted. Neal Immega requested that a new storage place be considered for the partial can of orange paint left over from painting the letters on the building. It was suggested that the paint code be recorded and a destroy date to be determined for the paint.

## **NEW BUSINESS**

Holiday Party: Save the date of December 10 to attend our annual holiday party at the Unitarian Fellowship Hall, 1504 Wirt Road, Houston, TX 77055. Set up is at 5:30 p.m. and dinner is at 6:00 p.m. We have Steve Blyskal to thank for this wonderful venue.

President English asked for any further New Business.

Donations received – Jewelry boxes have been donated by Mary Ann Mitscherling. Richard Good will pick up additional items to help her downsize her collections of rocks and cabs.

Joan Riley's daughter called to say that the family will be selling Joan's house and would like help dispersing the rock collection. So, this is another opportunity for things to become available.

The next Zoom Board of Directors meeting will be on Tuesday, October 4, 2022, at 7:30 p.m.

The next Hybrid General Meeting will be on Tuesday, October 25, 2022, at 7:00 p.m. Sarah Metsa's program "All things that Glow" will include Halloween "goodie" bags for the children. The presentation is about rocks and minerals that glow. The evening will start at 7:00 p.m. with the program. The General Meeting business will be conducted afterward so that children can get home to bed.

Show-n-Tell: Nancy asked for presenters to limit items to three.

Neal Immega showed a piece of volcanic tuff that has fire opal in the crevices. It is part of Phyllis George's father's collection.

Maggie Manley showed "spiders" made with fluorescent beads for Halloween.

Steve Blyskal showed a bolo tie clasp that Sigrid Stewart created for him in an HGMS Casting class. The design was based on the pattern on the shoulder stock of the Blyskawica, a Polish WWII machine pistol with a folding shoulder stock designed and produced in German-occupied Poland for use by the Polish resistance. Both Blyskawica and Blyskal mean "lightning" in Polish. He also showed agates from the Kokernot 06 Ranch.

See photos below.



*Drawing by Adam Jonca, uploaded to the Polish wiki by the author*



*Photo by Loldmanjenkins*



*Bolo Tie*

Drawing – Sandra Cline won the Mexican Geode

Before we Adjourn:

Refreshments were provided by Foster Kneeland. Foster will be out of town next month. Sharon Halton has volunteered to bring refreshments for October. Foster will be back for November's meeting. January will be his last meeting to provide refreshments.

During the break:

Feed the Kitty! Your donations go to offset the cost of the snacks.  
Thank the volunteers who made tonight possible.  
Thank the volunteers who make all of what HGMS is available.

Adjourn: James Wark moved to adjourn. Sandra Cline seconded the motion and the motion passed. The meeting adjourned at 8:33 p.m.

Vice President Metsa introduced the Program: Steve Blyskal presented information on the Naica Mine in Naica, Chihuahua which is called the Cave of Swords and the Cave of Giant Crystals.

## UPCOMING SHOWS

10/1/2022 - 10/2/2022

Central Arkansas Gem, Mineral, and Geology Society Annual show

Saturday 9:00-6:00 – Sunday 10:00-5:00

Cabot Event Center, 508 North Lincoln St, Cabot Arkansas

Email: lenoramur@aol.com; Website: centralarrockhound.org

10/08/2022 - 10/09/2022

Cowtown Gem, Mineral, & Glass Annual show

Saturday 10:00 - 5:00, Sunday 10:00 - 4:00

CERA, 3300 Bryant Irvin Rd; ; Free admission & parking

Contact Steve Shearin; Email: steve.l.shearin@lmco.com

10/08/2022 - 10/09/2022

Tri-City Gem & Mineral Society Show

Frank W. Mayborn Civic & Convention Center, 3301 N Third Street, Temple, TX

Tri-City Gem & Mineral Society

<https://www.facebook.com/groups/194934397585497/>

Contact Susan Lovelace, (619) 987-1140 or Email: selovelace@showdirection.com

10/14/2022 - 10/16/2022

50th Annual Gem & Mineral Show

Friday and Saturday 10:00-6:00, Sunday 10:00-4:00

Alario Center, 2000 Segnette Blvd, Westwego, LA 70094

Gem and Mineral Society of Louisiana

<https://www.gmsofla.org/>

10/21/2022 - 10/23/2022

Austin Gem & Mineral Show

Friday and Saturday 9:00-6:00, Sunday 10:00-5:00

Palmer Events Center, 900 Barton Springs Rd, Austin, TX 78704

Austin Gem & Mineral Society

<http://www.agms-tx.org/>

11/05/2022 - 11/06/2022

Golden Spread Gem Mineral & Treasure Show

Saturday 9:00-5:00, Sunday 9:00-5:00

Amarillo Civic Center Complex, 401 S Buchanan St, Amarillo, TX 79108

Golden Spread Gem Mineral & Treasure Society

<http://www.amarillotreasure.com/>

11/05/2022 - 11/06/2022

Midland Gem & Mineral Society Annual Show

Saturday 9:00-6:00, Sunday 10:00 - 5:00

Bush Convention Center, 105 N. Main, Midland Texas

11/11/2022 - 11/13/2022

Houston Gem & Mineral Society Annual Gem, Mineral, Jewelry & Fossil Show

Friday and Saturday 9:00-6:00, Sunday 10:00-5:00

Humble Civic Center, 8233 Will Clayton Parkway, Humble, TX 77338

11/19/2022 - 11/20/2022

Dallas Gem & Mineral Annual Fundraiser - 11/19/2022

Saturday 10:00-6:00, Sunday 10:00-5:00

Mesquite Convention Center, 1700 Rodeo Dr, Mesquite TX 75149

Dallas Gem & Mineral Society

<http://www.dallasgemandmineral.org/>

12/02/22 - 12/04/22

Dallas Christmas Bead & Jewelry Show

Grapevine Convention Center, 1210 S. Main St, Grapevine, Texas 76051

01/20/23 - 01/22/23

East Texas Gem & Mineral Society Show

Tyler Rose Garden Center, 420 Rose Park Drive, Tyler, Texas 75702

Shows Around the US - Dates ([rockngem.com](http://rockngem.com))

Please verify show times before traveling!