

Bulletin of the Roseville Rock Rollers Gem & Mineral Society, Inc. Volume 60, Issue 9 - September 2019

Educational Program

for September 10, 2019

To Be Announced . . .

From the President's Pen

Found myself teaching Chainmail at Camp Paradise the last full week of August, and I wanted to pass along that I had a wonderful time. The camp is a bit rustic, but when one considers the accommodations, food and classes taught, it sure is a good deal. The Roseville Rock Rollers (RRR) had three other members attending the camp for the first week as well, one of them our scholarship winner Jim Marsh. It appeared that each of the members had a wonderful time and were able to work on several lapidary art projects while attending the camp. RRR is planning to provide another scholarship again next year, but I do recommend each of you consider the camp if you want to try out something fun and new.

It is time for our society to elect new officers and ensure that our group continues on. I would hope that if anyone wants to step up and take on an officer position to please do so. If anyone is interested in a specific position, but does not know what the duties of that officer are, please look at our society web page. Under the Officers tab each officer position has a brief description of their duties.

Finally our show committee meeting is going to kick off on September 17, 2019. If anyone is interested in learning about what it takes to setup and run a gem and mineral show, please stop by the lapidary shop on the above listed evening. The meeting begins at 7PM sharp and normally runs for an hour or two depending on what material is covered and how many tangents we run off on!

I hope everyone had a wonderful summer, the leaves are beginning to change and the evenings are cooling off. We will probably have a few more nuclear hot days before we really jump into the cooling off period, but it won't be long before we all are pining for the warm summer days once again.

—Glenn Fiala

Vice President's Corner

Okay, here we go with my attempt to explain some "basics" of rocks (other than they are pretty). First, we need to have a simple definition of rocks and minerals: A mineral is a naturally occurring solid substance. A rock is a combination of one or more minerals. Some rocks are made up of many different minerals and some are made up almost entirely of one mineral.

Rocks are classified into 3 categories according to the way they were formed:

Igneous: Created by volcanic activity: These rocks are formed when lava cools and solidifies. (Obsidian)

Sedimentary: Compressed layers of sediment: (Sandstone)

Metamorphic: Changed by temperature or pressure (Marble)

Next month I will go into the different minerals that make up the three categories of rocks.

Our Educational Program for September 10, 2019 will be announced when it is confirmed. Looking forward to seeing all of you there.

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— Jan Kessler

Roseville Rock Rollers

MINUTES FOR ROSEVILLE ROCK ROLLERS EDUCATIONAL MEETING AUGUST 13, 2019

Call to Order at 7:00 p.m. by Vice President Jan Kessler. **Flag Salute.**

Introductions of Guests and New Members.

Present: Members 43+, Juniors 2, and Guests 8.

Recess for Refreshments.

Business Meeting:

- **Sunshine** a sympathy card was sent to Tim Carlson and a get well card was sent to Vern Iverson,
- **Juniors** Carole Kowalik reported 2 Juniors were at the Rookies' meeting. They played the Rockhound game and worked on opal triplets
- **Treasurer** Terry Yoschak reported the financial records for the 2019 Show were ready for audit. Kim Fiala volunteered to do this audit.
- Secretary/Membership Florence Brady reported 254 members with applications being accepted during the meeting.
- Vice President/Programs Jan reported the program for September's Ed. Mtg. is to be decided.
- CFMS Director Mike Hunerlach was absent.
- Vest, Tee Shirts & Patches Debi Roberts has club items for sale.
- **Field Trips** Glenn reported on the field trip to the Gold Bug Mine Tour. He will lead a field trip to the Bear River near Colfax on Saturday, August 17th. A field trip to Fallon, NV is planned for possibly Sept 21, 22.
- Librarian/Historian Karla Shannon reported she did not bring any library items to the meeting. She is still working on reorganizing the Library inside the Lap Shop. Books and Rock and Gem magazines are available for checkout. Remember to sign out for each item taken,
- Show Show Chair Jim Hutchings reported he has submitted a formal request to the Fairgrounds regarding the 2020 show fees. Parking could be an issue as the Sports Center could be open for an event. Hopefully something can be worked out fee wise and for the show volunteers. Gloria Marie needs help with publicity/social media. Another chairperson, along with two other volunteers is needed for the Kids' Junction. First show committee meeting will be Sept. 17th, 7 p.m. at the Lap Shop. Would like to see some members attend and learn about how we do our show.
- Lapidary Shop Jim reported the A/C in the main room is barely adequate when the temperatures are high. Two students are taking the lapidary orientation classes along with another adult. Work on the siding and needed painting will be done when it is cooler.
- Lapidary Classes Cathy Nelson is working with Dan Bender to offer more silversmithing classes. The opal classes are filled and a 4th session might be held.
- **Refreshments** need signups for the Fall meetings.

Drawings – winners: Member, Lisa Giampietro; Junior, Ashley Wittmeyer; and Guest, Arnav Dabke

Old Business – none.

- **New Business** on behalf of Glenn Fiala' request, an explanation was given by Florence regarding the recent scam e-mailings, asking for gift certificates for another organization.
- **General Announcements** see bulletin for upcoming shows.

- **Show and Tell** the following guests and members shared their specimens and gave an explanation for each one: Jeridan, Veronica, Arnav, Jay Buscio, Debbie Bunn, Jim Hutchings and Dayna Peterson.
- Silent Auction Tim Carlson reported the SA will run for 10 more minutes.
- Adjournment meeting was adjourned at 8:10 p.m.

MINUTES FOR ROSEVILLE ROCK ROLLERS BOARD MEETING AUGUST 13, 2019

Call to Order – at 8:25 p.m. by Vice President Jan Kessler.

Present – 8 officers, a quorum was present.

- **Membership Applications** a motion was MSA to approve the membership applications for: Jay & Christine Buscio and Abhijeet Dabke and Arnav Dabke (Junior).
- **New Storage Trailer** discussed with Rob Blazina searching for a 7' x 16' storage/cargo trailer. He will check with Kelley Ballard for further information and resume searching.

Adjournment – meeting was adjourned at 8:30 p.m.

Respectfully submitted, Florence Brady, RRR Secretary

September Board Meeting

The meeting will be held Tuesday, September 24 at 7:00 PM in the club Lapidary Shop at the Fairgrounds.



Refreshments for the September 10 Educational meeting are to be provided by Barbara Manganello, Jim deBlanc, Tim Carlson, Wendy Terry, Dayna Peterson, Gene Engelbrite and Jake. Thank you all in advance!

🌿 Sunshine

A sympathy card was sent to Irene Perman for the passing of Eugene Perman, her husband of 76 years.

See obituary on Page 4.

When you know of any member who is ill or has been hospitalized, please contact our Sunshine Chair, Heather Crane, at (818) 903-4433 or hmcrane7@gmail.com

September Show Meeting

SHOWTIME!

OK, folks, here we go! Time to dust off the show manual and fire this thing up! We will have our first Show Committee meeting on Tuesday, September 17, at 7:00 PM at the lapidary shop! 200 Corporation Yard Road.

Who is on the Show Committee? You are!

We need additional folks to step up as understudies for the various show chairs, to back them up! In the meantime, we have a lot of things that need to be done that we can have you volunteer to handle!

So, come on down and be a part of the "behind the scenes" of one of the best shows in California! We do have a contract draft, and I will be reviewing that after Labor Day weekend!

The Show Committee meets on the 3rd Tuesday of the month, in September, November, January, February and March. This is a way for you to be active in the society, meet other RRR members and just have fun with the show!!

— Jim Hutchings, 2020 Show Chair (916) 995-7380



Lapidary Classes



Lapidary Classes -Introduction to Shop Use & Cabochon making is \$10 per class for 5 classes or \$45 paid in full. Our Shop is staffed Monday &

Wednesday nights 5 pm - 9 pm! Learn more about the Lapidary Arts & Cabochon Making. A DVD is available for viewing at the Shop for Cabochon Making.

Regular \$5 per day or \$20 monthly rates apply for lapidary shop use after Orientation/Introduction classes.

Large & Extra Large Saws: \$2 per slab for 18 inch saw & or 24 inch saw for cutting large & extra large rocks.

Crafty Days - Crafty Days is an open get together/play day for anybody wanting to work on their craft while yakking and snacking! We always have fun! Bring whatever you are working on and a snack to share. We meet 1st and 3rd Mondays each month. No class or class fee, \$5 for use of the Shop is the only fee. 10-2pm at the Lapidary Shop.

Crafty Days this month are only on September 16.



Rookie Rock Roller News



The Rookies will meet at the lapidary shop on September 10th at 5:30 p.m. At our last meeting, Jim Hutchings gave a little presentation on Opal Triplets. He helped the juniors put them together. Then we had a shortened

version of the Rock Hound game. Ashley won by a hair.

Later. We joined the adults for the ice cream social.

At this upcoming meeting, we will smooth out the edges of the opal triplets. There are extras so that, if you did not make it to the July meeting, you can still participate.

Let me know if there are any badges you have worked on.

See you at the meeting,

Carole Kowalik, Junior Advisor (916) 871-0573 home3004@gmail.com





Got RRR Library Books? Return them!

RRR Building Fund

If you overpay on your membership dues, or simply wish to contribute, we will allocate your donation to the Building Fund. As soon as we reach a total of \$500, a new savings account will be set up at our bank to be reserved for this fund. Currently we have \$348.

In Memoriam

Eugene Perman

Eugene was a Lifetime Member of the Roseville Rock Rollers. He and his wife Irene both joined in 1971.

Eugene served as an RRR Director, Librarian/ Historian and also Field Trip Coordinator. One of the tidbits mentioned in a past issue of this bulletin is that Gene and Irene donated over 400 slabs to the club, over 90 pounds in all!

Gene died on August 3 at the age of 99. He was a retired US Navy Veteran of WWII, 3 tours of Korea and Vietnam. He retired from McClellan AFB after 20 years. He and Irene were married for 76 years. He is also survived by three children plus grandchildren and great-grandchildren.

Viewing will be held Friday, Sept. 6, 2019, 4-8 pm, East Lawn Memorial Park, 4300 Folsom Blvd, Sacramento, CA.

Funeral will be held Monday, September 9, 2019, 11:00 at Town & Country Lutheran Church, 4049 Marconi Ave., Sacramento, CA 95821. Interment and honor guard will be at 2:30, East Lawn Folsom (East Terrace) Sept. 9, 2019 after funeral and light lunch.

— Information from Sacramento Bee

LAPIDARY SHOP NEWS

Can't wait for you all to bring in your summer finds to the lapidary shop to cut and make cabochons. Jim is in the shop at 5:00 pm Monday night for Mineral Identification.

The instructors and I are so glad for all the new people working in the shop, with some beautiful cabochons being made.

Lapidary hours: Monday 5:00 pm to 9:00 Wednesday 5:00pm to 9:00

— Denise Coyne



A New Show Trailer!

RRR has recently purchased a 2019 Haulmark trailer which will be used to store and transport items we use for the annual show. It is 7 ft x 16 ft and can be towed by a regular vehicle and will not require a specialized towing service, as the old show trailer did.



The old one ->



Roseville Rock Rollers

Huge Global Tsunami Followed Dinosaur-Killing Asteroid Impact

The cataclysmic Chicxulub impact roughly 66 million years ago spawned a tsunami that produced wave heights of several meters in distant waters, new simulations suggest.

Artist's impression of an asteroid in the distance impacting shallow waters near the modern-day Yucatán Peninsula. Credit: Science Photo Library/Alamy Stock Photo

By Katherine Kornei 20 December 2018

The devastating tsunamis that struck the coastlines of Chile, Haiti, Indonesia, and Japan in recent decades produced waves tens of meters high, unimaginable to most people accustomed to gentle seas. But millions of years ago, a truly inconceivable set of waves—the tallest roughly 1,500 meters high—rammed through the Gulf of Mexico and spread throughout the ancient ocean, producing wave heights of several meters in distant waters, new simulations show.

The enormous waves were triggered by a large asteroid slamming into the shallow waters of the modern-day Yucatán Peninsula. That asteroid impact, which occurred about 66 million years ago and created the Chicx-ulub crater, contributed to the demise of the dinosaurs.

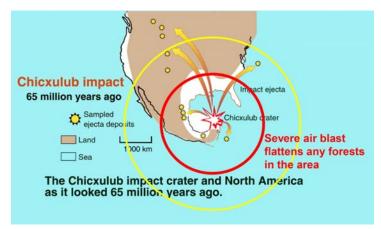


Molly Range, a paleoceanographer working at the University of Michigan when this research was conducted, and her colleagues have now modeled how the ensuing tsunami propagated in the Gulf of Mexico and beyond. "As far as we know, no one has done a global simulation of this impact," said Range. "A typical ocean model just can't handle an asteroid."

The first effect of the asteroid impact, the researchers found, would have been a roughly 1,500-meter-high tsunami wave. This wave represented the "initial blast of water away from the impact," said Range.

A few minutes later, the models show that water began refilling the gaping crater formed by the impact. "You have a steep wall of water that rushes back in," said Arbic. This rapid inflow likely triggered yet another set of waves. Although the strongest effects from the tsunami were felt in the Gulf of Mexico, the waves would have propagated globally, Range and her team found. Thanks to the seaway that existed between North America and South America at the time of the dinosaurs, the tsunami waves would have rushed freely into the Pacific Ocean.

Range and her colleagues calculated that the tsunami wave heights in the Pacific and Atlantic basins would have been as large as 14 meters. As these waves approached land and slowed down, they would have gotten even larger. But because the researchers' models didn't include the topography of the continents 66 million years ago, it wasn't possible to calculate actual wave run-up heights, Arbic said.



Displaced Sediments

The scientists also showed that the tsunami waves would have pushed water at the seafloor by more than 20 centimeters per second. Such strong water flows are sufficient to scour sediments from the bottom of the ocean, the researchers said. Scouring would have occurred in the South Pacific and the North Atlantic, the modeling revealed. Tantalizingly, in-progress research by the same team is showing that these very places are also where sediment coring experiments have found dislodged and displaced sediments.

This modeling provides a glimpse into a cataclysmic part of Earth's history that, thankfully, hasn't been repeated. But more advanced simulations—incorporating, for example, higher spatial resolution or estimates of on-land topography so wave run-ups can be estimated—would improve our understanding of this tsunami, Arbic explained.

But one thing is very clear: The Chicxulub tsunami was clearly a force to be reckoned with. As Arbic said, "It must have been one of the biggest tsunami ever."

—Katherine Kornei (hobbies4kk@gmail.com; @katherinekornei), Freelance Science Journalist Citation: Kornei, K. (2018), Huge global tsunami followed dinosaur-killing asteroid impact, Eos, 99, https://doi.org/10.1029/2018E0112419. Published on 20 December 2018.

https://eos.org/articles/huge-global-tsunami-followed-dinosaur-killing-asteroid-impact

Scientists Find Fossilized Fish That May Have Been Blasted by Debris From Asteroid That Ended the Dinosaur Age

Ryan F. Mandelbaum 3/29/19



Plaster cast of a Tanis deposit fossil showing a freshwater fish (dark brown) next to a marine ammonite (iridescence at top left). Photo: DePalma et al

At one of the most important ancient graveyards on Earth in North Dakota, paleontologists unearthed the fossilized remains of fish seemingly killed by the effects of the asteroid that ended the Cretaceous.

We know that a large asteroid struck the Earth 66 million years ago, and around the same time, the dinosaurs went extinct. We're not completely sure whether the asteroid was solely responsible for the mass extinction, but you might ask, "Shouldn't we see remnants of animals killed by the asteroid's effects?" Well, now we have found some.

"This is the last day of the Cretaceous," David Burnham, professor in the Department of Geology at the University of Kansas and one of the study's authors, told Gizmodo.

When a giant meteorite strikes, you'd expect chaotic effects, like rocks altered by the impact's high pressures and temperatures, enormous earthquakes, and tsunamis. But Earth's rocks don't directly preserve single days of the planet's several billion-year-old history. You've got to get creative when it comes to teasing apart the geologic record. For example, around the world, layers of rock 66 million years old seem to contain excess iridium, presumably deposited by the Chicxulub impactor that struck near what is today the Yucatán Peninsula of Mexico. Then there are tektites, small, glassy spheres of compressed and heated rock. Theoretically, there should also be fossilized evidence of animals killed by the asteroid's effects.

The Tanis formation

This is what makes the new research, led by Robert DePalma at the University of Kansas, so exciting—the description of a pair of sediment layers at the Tanis site of the The Hell Creek Formation in southwestern North Dakota. Both layers contain an excess of iridium, but only the lower level contains glass pieces that seemed to have been deposited from an inland-moving force. They take this to mean that they're observing two events: The upper layer is the settling dust from after the impact. The lower is a large deposit of sediment from the hours following the impact.

But if the rocks alone don't convince you, perhaps the fossils in the event deposit will. A large swath of ocean traveled up the interior of the United States during the late Cretaceous, terminating not far from the Tanis region. But the rocks at Tanis preserve a mixture of both freshwater fish, like paddlefish and sturgeon, and marine mollusks called ammonites—implying that around this time, the ocean had mixed with freshwater rivers. And lodged inside the fossilized paddlefish's gills were more of the glass spherules. It appeared that waves containing shocked glass from the impact over 3,050 kilometers (1,895 miles) away had inundated the area, and in their dying breaths, the fish had inhaled some of them.

Other researchers were impressed by the work. "When I first read it, I kept saying 'wow, wow, wow," H. Jay Melosh, distinguished professor of Earth, atmospheric, and planetary science at Purdue University, told



Gizmodo. "I think this is one of the most spectacular paleontological discoveries of the century. It's a snapshot of the moment at which major deaths were occurring right after the impact."

The researchers point out that there are other scenarios that might have brought the glass particles up to Tanis. Maybe there were meteorological events like gale-force winds, or landslides, the authors write in the paper, which will be published on Monday.

But the observations have far-reaching implications. The authors write: "Observations at Tanis expand our knowledge of the Chicxulub impact's damaging effects and their far-reaching scope. The highly probable link between impact-induced seismic shaking and the onshore inundation surge at Tanis reveals an important additional mechanism by which the Chicxulub impact could have caused catastrophic conditions in the Western Interior, and possibly worldwide, far from the impact site.

It's amazing to imagine how abruptly life on Earth changed in the hours and days after the Chicxulub asteroid hit. And it's equally amazing that we could find direct evidence from that time locked away in the remains of the creatures who experienced it.

https://gizmodo.com/scientists-find-fossilized-fish-that-may-have-been-blas-1833671176



September Calendar

Birthstone: Sapphire



Sun	Mon	Tues	Weds	Thurs	Fri	Sat	
I	2	3	4 Lapidary Shop 5:00-9:00 pm	5	6	7	
8	9 Lapidary Shop 5:00-9:00 pm Mineral ID	10 Meetings: Rookies 5:30 pm Club 7:00 pm	l I Lapidary Shop 5:00-9:00 pm	12	13	14	
15	I6 Crafty Day 10-2 Lapidary Shop 5:00-9:00 pm Mineral ID	17 Show Meeting 7:00 pm	18 Lapidary Shop 5:00-9:00 pm	19	20	21	
22	23 Lapidary Shop 5:00-9:00 pm Mineral ID	24 Board Meeting 7:00 pm	25 Lapidary Shop 5:00-9:00 pm	26	27	28	
29	30 Lapidary Shop 5:00-9:00 pm Mineral ID	For more class information, contact Class Coordinator: Cathy Nelson (925) 321-2024 Email: canelson2@netscape.net					

Roseville Rock Rollers

Nevada County Show

See below for more details

"Earth's Treasures" Gem & Mineral Show

October 5 & 6, 2019 Saturday 10 - 5, Sunday 10 - 4

Admission: Adults: \$3 Under 13 & Students w/ID: Free Lots of free parking Featured display: pleistocene zoo A Collection of Mammal Fossils





Kid's Corner Silent Auction Half Hourly Raffle

Upcoming Northern California Shows

September 21 - 22: CHICO, CA

Feather River Lapidary & Mineral Society Silver Dollar Fairgrounds, 2357 Fair Street Hours: Sat 9:30 - 5; Sun 9:30 - 4 Lori Millard, (530) 533-2968 Email: lorimillard58@yahoo.com Website: www.featherriverrocks.org

September 21 - 22: MONTEREY, CA

Carmel Valley Gem & Mineral Society Monterey Fairgrounds, 2004 Fairgrounds Road Hours: 10 - 5 daily Contact: Janis Rovetti, (831) 372-1311 Email: janis12@sbcglobal.net Website: cvgms.rocks

September 28 - 29: LODI, CA

Stockton Lapidary & Mineral Club Lodi Grape Festival Grounds, 413 East Lockford Street Hours: 10 - 5 daily Contact: Mike Mathis, (510) 301-3612 Email: mmathis@nwp.org Website: stocktonlapidary.org

October 5 - 6: GRASS VALLEY, CA

Nevada County Gem & Mineral Society Nevada County Fairgrounds, 11228 McCourtney Road Hours: Sat 10 - 5, Sun 10 - 4 Contact: Mitchell Frank Van Hecke, (530) 575-4252 Email: 4vanclan5@att.net, Website: ncgms.org

October 19 - 20: PLACERVILLE, CA

El Dorado County Mineral & Gem Society El Dorado County Fairgrounds, 100 Placerville Drive Hours: 10 - 5 daily Contact: Debbie Winterson Email: info@rockandgemshow.org Website: eldoradorocks.org

October 26 - 27: SACRAMENTO, CA

Sacramento Mineral Society Scottish Rite Temple, 6151 H Street Hours: Sat 10 - 5; Sun 10 - 4 Contact: Alyssa Meiszinger, (916) 205-4441 Email: webadmin@sacramentomineralsociety.org Web Site: sacramentomineralsociety.org

November 2 - 3: CONCORD, CA

Contra Costa Mineral & Gem Society Centre Concord, 5298 Clayton Road Hours: 10 - 5 daily Contact: Mike Hopkins Email: mhopkins@ironhorsedesign.net Website: contracostamineralandgemsociety.org

November 9 - 10: YUBA CITY, CA

Sutter Buttes Gem & Mineral Society Yuba-Sutter Fairgrounds, 442 Franklin Blvd Hours: Sat 10 - 5; Sun 10 - 4 Contact: Karen Horita, (916) 677-6696 Email: horita@comcast.net Website: sutterbuttesgemmin.org

ROSEVILLE ROCK ROLLERS GEM & MINERAL SOCIETY BULLETIN EDITOR P.O. BOX 212 ROSEVILLE, CA 95678

Send exchange bulletins to above address



September 2019







the **ROLLIN' ROCK** ROSEVILLE ROCK ROLLERS, INC.



MEMBER, CALIFORNIA FEDERATION OF MINERALOGICAL SOCIETIES MEMBER, AMERICAN FEDERATION OF MINERALOGICAL SOCIETIES VOL. 60 NO. 9 SEPTEMBER 2019

EDUCATIONAL MEETING2ND TUESDAY OF EACH MONTH, 7:00 PMEXECUTIVE BOARD MEETING4TH TUESDAY OF EACH MONTH, 7:00 PM

EDUCATIONAL MEETING LOCATION: ROSEVILLE FAIRGROUNDS, JOHNSON HALL, 800 ALL AMERICA CITY BLVD., ROSEVILLE, CA

Changes and exceptions will be published in the bulletin. GUESTS AND VISITORS ALWAYS WELCOME