



ALL ABOUT RUBIES

Monday, October 12 at 7:30 PM, in the Multipurpose Room at the Culver City Veterans Memorial Complex, 4117 Overland Ave, Culver City, CA 90230, presented by Darrell Claussen.

What constitutes a ruby? How rubies are made. How Rubies are rated in value compared with other gemstones? Where & why the best rubies are found today and in the past? Why best rubies are rare? History of ruby mining. Ruby myths. Notable Rubies of the past and their impact on societies. And conflict in the Mogok Valley, Myanmar, and Mozambique. Our October presenter will discuss all this and more.

Darrell Clausen is an excellent communicator, light-hearted and good-humored. He joined the Army Security Agency and was stationed in northern Thailand. This provided the background for his first novel, *Flower Soldier*, an international love story in the mountains of Laos. His second novel, *Chasing Rubies*, features a man obsessed with Burmese rubies trying to outlive an unscrupulous past. His love of the owner of a Beverly Hills jewelry shop takes him to the Burmese in desperate search of a smuggled ruby. There, he finds he has to embrace the life he is trying to escape to discover what matters most in his life.

Darrell graduated from ICU University in Tokyo, and after ten years in Japan, returned to California, where he co-owns a tour agency and travels frequently to Asia and Europe.

Darrell has written many short stories centered around his experiences with people of different languages and cultures, and he thrives in international settings. His humor and knowledge make him an entertaining speaker to any audience.

The Culver City Rock & Mineral Club brings together persons interested in the Earth Sciences to engage in research and study, to assist members in the collection and preservation of rocks and minerals, and in the study and practice of lapidary and related arts.



PRESIDENT'S LETTER

Dear All:

We are in the early planning stages for the 2027 Fiesta of Gems, and I am happy to announce our chosen mineral for the 2027 show: Citrine. We are getting an early start for the show this year and will soon be reaching out to our membership to fill several important roles, including a new vendor co-chair.



We need some of our newer members to step up and get more invested in volunteering for a number of positions to ensure our club's future. Don't be shy!

We had a wonderful meeting in September with our special guest, Elisha Jhoti, who treated us to a fantastic insight into the upcoming exploration of the Moon. Everyone also got to see real Moon dust, brought back by the Apollo 11 astronauts in 1969, through a microscope.

The upcoming meeting on October 12th will be with Darrell Clausen, who will be discussing Rubies.

Hope to see you soon.
Alexa



SEPTEMBER MEETING PRESENTATION

Back to the Moon: Dr. Elisha Jhoti Takes CCRMC to the Lunar Surface

On September 14, 2026, the Culver City Rock & Mineral Club welcomed Dr. Elisha Jhoti for a fascinating presentation, "Back to the Moon," exploring NASA's plans to return humans to the lunar surface and what scientists have learned and continue to study about our nearest celestial neighbor.



Dr. Jhoti, a UCLA scientist and a CCRMC member, recently successfully defended her PhD in Lunar and Mars Science. She also serves as Workforce Chair of the Lunar Exploration Analysis Group, giving her a unique perspective on both the science and the people preparing for the next era of lunar exploration.

Her presentation examined NASA's Artemis program and the challenges involved in sending astronauts back to the Moon, including exploration of the lunar South Pole and the search for water ice. Dr. Jhoti also explained how scientists can simulate lunar conditions here on Earth to better understand the Moon and prepare astronauts and equipment for future missions.

One of the most fascinating aspects of the presentation was NASA's effort to recreate the dramatically different surface environments found on the Moon and she actually displayed a few samples of the simulants created by NASA. The dark basaltic plains,

formed by ancient volcanic activity, are quite different from the bright, anorthosite-rich highlands. NASA has developed realistic terrestrial simulations using carefully selected materials designed to mimic these contrasting lunar surfaces. These simulated environments allow astronauts to practice walking, working, collecting geological samples, operating equipment, and conducting scientific experiments under conditions intended to approximate the challenges of an actual lunar mission.

For the rock and mineral enthusiasts of CCRMC, however, the real highlight was considerably smaller—microscopic pieces of the Moon itself.

Dr. Jhoti brought genuine lunar dust recovered by Apollo astronauts during their extravehicular activities, or EVAs, and members had the extraordinary opportunity to examine the material under a microscope. What might appear from a distance to be nothing more than gray dust became a fascinating collection of tiny fragments, grains, and irregular particles when magnified. These were not laboratory simulations or terrestrial analogous, but material that had actually been collected from the lunar surface by astronauts during their excursions outside the Apollo spacecraft.

Looking through the microscope provided an intimate connection to the Apollo missions. Each tiny particle had a history measured not merely in geo-

logical time, but in the minutes and hours of an astronaut's work on the lunar surface. The material had been scooped, gathered, handled, and returned to Earth from a place nearly a quarter-million miles away — the ultimate rockhounding field trip — and members of CCRMC were able to examine it with their own eyes.

Dr. Jhoti also discussed the fundamental geology of the Moon, including its volcanic basalt and anorthosite. The contrast between these materials helped illustrate why understanding lunar geology is essential to planning future exploration. And, as Dr. Jhoti reminded the audience, despite its familiar appearance, the Moon is made of rock—not cheese!

For CCRMC, the evening offered a particularly fitting combination of geology, mineralogy, space exploration, and hands-on science. Dr. Jhoti's presentation demonstrated that the study of rocks does not stop at the Earth's surface. The same curiosity that leads us to examine an unusual mineral or specimen can ultimately take us hundreds of thousands of miles into space—and, on this evening, bring a little piece of the Moon right into the club meeting room.



LAPIDARY WORKSHOP HOURS

10866 Culver Boulevard
Culver City, CA 90230
(310) 836-4611

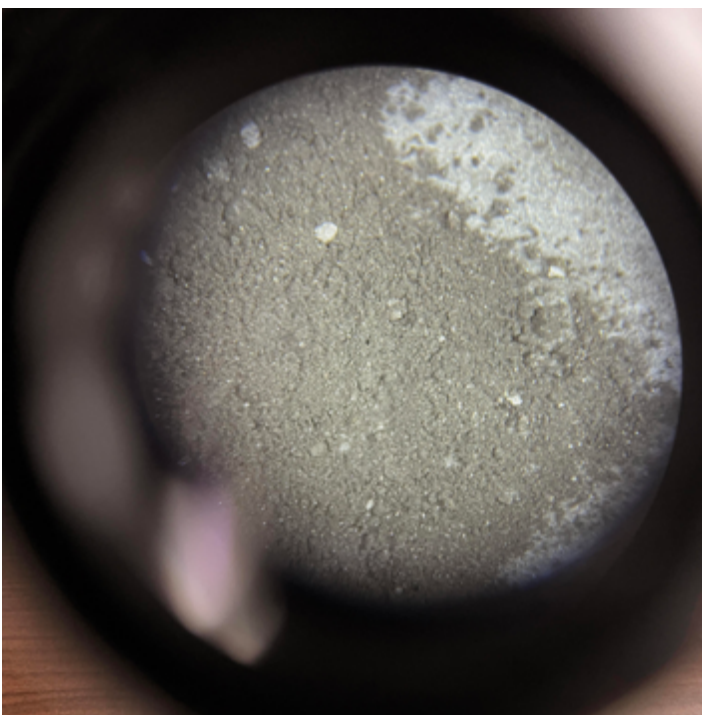
The shop is open:

Saturdays 12 to 4 PM – Steve Dover
ccrmc-saturdayshop@culvercityrocks.org

Sundays from 12 to 4 PM – Jette Sorensen
ccrmc-sundaylapshop@culvercityrocks.org

Wednesday
First and second Wednesday of the month only
From 4 to 8 PM
ccrmc-First2Wednesdayshop@culvercityrocks.org
The shop is located behind the Scout House

Go to the [Lapidary Shop on our website](#) to make a



reservation, or use the links above to send an email to check for availability; do not just show up.

If you have not made a reservation, you can call the shop at 310-836-4611 during open hours to see if there is room.

Wear old clothes. Do not wear open-toed shoes or short shorts. Tie long hair back. Bring eye and ear protection; masks are voluntary but recommended.

OCTOBER WORKSHOPS

KINTSUGI
OCTOBER 3, 11 AM – 3 PM
IN THE SCOUT HOUSE,
10866 CULVER BLVD.
INSTRUCTOR, MONICA MORENO

Discover the art of Kintsugi through the repair of broken stone. In this hands-on workshop, participants will learn the traditional philosophy and techniques of Kintsugi while using contemporary, accessible materials instead of gold. The methods taught can later be adapted to traditional Kintsugi with precious metals, but this workshop emphasizes that beauty and meaning are not dependent on expensive materials.

What is Kintsugi? The Japanese art of kintsugi involves using a strong adhesive mixed with metallic powder—such as gold, silver, or copper—to bond the fractured pieces together of an object while proudly accentuating the visible scar lines.

Together, we will transform fractured stones into enduring objects that celebrate resilience rather than conceal breakage. Along the way, we'll explore how repairing meaningful objects can become a practice of honoring memory, preserving personal history, and recognizing the emotional significance that ordinary materials can hold. Participants will leave with a completed repaired stone, foundational Kintsugi skills, and a renewed perspective on restoration as both an artistic process and a metaphor for the stories we choose to carry forward.

All materials and tools will be provided. No prior experience necessary.

Things you could bring: If you have them, please bring a lead pencil and permanent marker, your prescription eyeglasses and/or safety glasses, and an apron if you prefer your clothing not get dirty.

Safety Notes: Please wear closed-toe shoes and long pants. Long hair should be tied back away from your face. Refrain from wearing long dangling jewelry and loose long sleeves.

Workshop fee: \$48.00; \$38.00 for CCRMC Members. Payable in advance with registration.

REGISTRATION: www.Desviado.com/event-list



LAPIDARY 101
SUNDAY, 10/11, 9 AM-12 PM
at the club's Lapidary Shop
Instructor – Jette Sorensen

Description: Get to know the equipment in the club's lapidary workshop. Use a trim saw to cut the outline for a cabochon. Shape the stone on the grinding wheels, then polish it with the Expando wheels. Use the arbor with a leather wheel to get a high polish. Go home with a cabochon you can use for a pendant.

Safety Notes: Wear old clothes; you will get wet. Wear closed-toe shoes. Long hair should be tied back away from your face. Refrain from wearing long dangling jewelry and loose long sleeves. Bring eye and ear protection.

\$25 CCRMC Members only. Limited to 4 members. Payable in advance via Zelle to jetsorensen@gmail.com. Email Jette for availability at jetsorensen@gmail.com

SILVERSMITHING – BEZEL FROM SCRATCH SUNDAY, 10/25, 9 AM – 12 PM

In the Lapidary Shop, 10866 Culver Blvd
Instructor - Jette Sorensen

Description: Wearing a pendant, made with a cabochon you have cut and polished yourself, set in a bezel you made yourself, is a great feeling. This workshop will teach you to fit your cabochon with the right height bezel wire. Then fit that bezel wire on an Argentium silver backplate. Solder the wire onto the backplate. Refit the stone into the soldered backplate and secure it with bezel setting tools. After that, cut or saw the excess backplate and file it to remove any burs for an expert look.

Prior soldering metal experience required.

Safety Notes: Wear natural fabrics, such as cotton. Wear closed-toe shoes. Long hair should be tied back away from your face. Refrain from wearing long dangling jewelry and loose long sleeves. Bring eye protection, prescription glasses, or readers.

Workshop Fee: \$80 payable in advance. Limited to four members

Email Jette Sorensen to reserve a spot and get payment information: jetsorensen@gmail.com

Time permitting, you will also set small cabochons in small bezel cups and prong settings.

What to bring: Skinny rings from prior workshops, if possible. Eye protection, prescription or readers. We bring: All tools needed, Argentium Sterling Silver, premade bezels, prong settings, tubing, and cabochons.

Workshop fee: \$80.00. Payable in advance via Zelle to jetsorensen@gmail.com. Prior soldering experience required. For reservation, email jetsorensen@gmail.com. Limited to four CCRMC members.

BENCH TIPS

EMERY BOARDS

I feel the key to getting a lustrous polish on your



jewelry work is having a good selection of sandpaper handy for pre-polishing before going to the buffer. I generally start around 400 grit and then go to 800 and 1200.

While some projects do require sheets of sandpaper, my favorite way of sanding small jewelry items is to use emery boards for doing your nails. I like the ones with a thin foam core. They have enough resistance to sand the high points off a flat surface and yet give a little when you're trying to smooth off a curved surface.

These nail boards are inexpensive and come in a variety of grits. Some grits are so fine they give an almost finished surface. Pick up a few at a beauty supply company, at your local drug store, or from Amazon.

WEAR YOUR MASK

As I understand it, any particle breathed into your lungs is never expelled. Doesn't matter if it's smoke from a fire, a piece of dust or a microscopic particle of Quartz from your diamond disc. Once in the lungs, it becomes encapsulated in mucus, develops some calcification around it, and sits there as a foreign object for the rest of your life.

It makes sense to wear a good respirator or at least one of the N-95 masks we wear during flu season. Harbor Freight sells them very inexpensively.

See More of my Smart Solutions for Jewelry Making at <http://amazon.com/dp/B0BQ8YVLTJ>

— Brad Smith



MINERAL REPORT: JEWEL-BEARINGS AND SYNTHETIC RUBIES

Turn over a mechanical watch with a glass back and look past the moving gears. Somewhere in that little brass landscape is a red dot. It might be smaller than the head of a pin. Nobody proposes with it. Nobody asks whether its color is “pigeon blood” - a provocative name for a prized class of rubies. A steel pivot rests inside it, turning as the watch runs. This is a synthetic ruby, and it has spent its working life helping you arrive somewhere on time.

To understand how it got there, we have to begin with the hunt for durability.

Early watchmakers faced a problem familiar to anyone who has watched a loose wheel wobble: moving metal gradually changes the surface it moves against. Inside a watch, that change is consequential. A spring supplies a limited amount of energy, and friction spends some of it before it can do useful work. As a bearing wears, a pivot has more room to wander. The mechanism becomes less dependable. Keeping time requires finding something that can endure time.

By 1704, Nicolas Fatio de Duillier and the watch-

making brothers Peter and Jacob Debaufre were seeking patent protection in England for using drilled gemstones as bearings. A precious stone could provide a harder resting place for a moving shaft than brass. The proposal also provoked opposition from other watchmakers, who challenged the patent. Apparently even a tiny hole in a gemstone could become a sufficiently large hole in someone else’s business.

Ruby was well suited to this intimate machinery. It is the red variety of corundum, an aluminum oxide crystal with a hardness of nine on the Mohs scale. A steel pivot moving against a carefully polished ruby encounters a surface that strongly resists abrasion. With appropriate lubrication, the bearing helps motion continue while limiting wear.

But a natural gemstone still had to be found before it could be put to work. Watchmakers needed dependable material in quantities that geology was under no obligation to provide. Toward the end of the nineteenth century, the French chemist Auguste Verneuil developed a way to grow ruby. When he announced his flame-fusion process in 1902, the stone’s future opened beyond what could be recovered from the ground.

Imagine our watch ruby before its hole was drilled. Its beginning is a fine powder of alumina with a little chromium oxide added. The powder falls through an oxygen-hydrogen flame hot enough to melt it. Droplets gather on a support below. As the support slowly descends, the accumulating material crystallizes into an elongated body called a boule. An icicle made by fire. Inside it, atoms settle into the ordered arrangement that makes corundum corundum.



The chromium supplies the red. Small amounts enter the structure in place of aluminum, changing how the crystal interacts with light. The resulting color may look luxurious, but the watchmaker is chiefly interested in the body carrying it. That body is ruby, grown under human supervision. Its hardness does not depend on having spent a long time underground. Geological age and material capability have gone their separate ways.

The boule must now be reduced to the scale of the watch. A minute piece becomes a pierced bearing, its hole precisely sized for the pivot. Around the opening, a recess holds lubricating oil. We have taken a crystal born in tremendous heat and prepared it to host a nearly invisible quantity of oil. The wheel turns in this carefully arranged meeting between stone and metal.



FIELD TRIP TO CASTLE AND BROWN BUTTE IN MOJAVE DESERT

October 10, 2026, 8 AM at Albertson's Parking lot in Rosamond

We meet off Rosamond Blvd., in the city of Rosamond.

Take the 5 freeway to the 14 North (exit 162). Go to Rosamond Blvd., about 58 miles. Take exit 55 at Rosamond Blvd/Edward's AFB, make a left, and go under the freeway. After the freeway bridge on the right side, you will see the Albertsons parking lot, with McDonald's on the corner. We'll meet there at 8 AM. The Albertsons Street address is 2547 Rosamond.

A four-wheel-drive or high-clearance vehicle is best, but this site is accessible by most vehicles. Be sure to arrive early or on time. Late arrivals may find us gone.

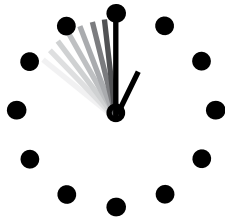
We will be going to Brown Butte and Castle Butte. They are in the same vicinity.



Synthetic production made these working gems available on an industrial scale. Their descendants remain inside mechanical watches today, including expensive ones whose appeal depends partly on traditional craftsmanship. The watch can advertise its jewel count because the crystals have useful jobs within it. Our little ruby belongs to a history in which learning to grow a gemstone helped sustain the craft of making something move reliably.

The jewel-bearing ruby's beauty becomes apparent through what it permits. You lift a cup, miss a train, hold someone's hand; beneath those gestures, the pivot continues to turn. To look closely at it is to encounter a different kind of preciousness, one measured through the reticence of a surface that allows another body to keep moving smoothly.

– Joel Kuennen, Mineral Chair



THE MINUTES

Culver City Rock and Mineral Club
Meeting Monday August 10th

Board Meeting

In Attendance – Stephanie Dangott, Steve Dover, Darrell Robb, Brit Smith, Joannie Ripner, Gary Mitchell, Jette Sorensen and Karen Wallen.

Called to order 6:35 PM by club vice-president Steve.

Shop – Steve stated that shop will now be open the first 2 Wednesdays of the month. Also, someone is turning the refrigerator too high. It makes the drinks freeze.

Brit purchased finger guards people can use at the shop on the grinding wheels. Darrell stated that it would be a shop purchase and Brit should get reimbursed from the shop. Suggested cost is 50 cents each.

Karen provided a silent auction report from the August picnic. She confirmed that people were more respectful of each other. However, she stated one person was overbidding and upsetting some people.

Treasury – Darrell states club is in good shape. The Wende Museum provided the club a \$5000 grant to use on the new storage unit set up. He also stated that the August silent auction made \$521.25 in cash and \$150.50 in Zelle.

Gary stated that the 2 caged fans in the shop need to be replaced. This will also include cleaning the vents.

Darrell made a motion to approve \$1600 to replace the fans and clean the vents. Stephanie seconded it. The motion passed.

Jette – The following workshops are being offered in

the coming weeks:

- Lapidary 101
- Beginning Bezel Setting with Premade Bezels
- Kintsugi

The presentation in October is about Rubies

Stephanie stated that there will not be an Alley this winter due to scheduling conflicts for members that normally participate.

The 2027 Fiesta of Gems stone is citrine. Gary confirmed that he has nice specimens that can be photographed for the postcards.

Stephanie made a motion to adjourn and Steve seconded. Meeting closed at 7:09 PM.

General Meeting

Called to order by Vice President Steve at 7:35 PM.
3 workshops coming up.

- Lapidary 101
- Beginning Bezel Setting with Premade Bezels
- Kintsugi

Next month's presentation is about Rubies.

The board approved purchase and installation of replacement cage fans for the shop.

Tentative field trips to be announced at a later date.

Meeting ended at 7:45 PM

Presentation "Back to the Moon" presented by Dr. Elisha Jhoti

Submitted by Stephanie Dangott, Recording Secretary



UPCOMING SHOWS

Oct 17, 2026 - West Hills, CA
First United Methodist Church, 22700 Sherman Way, West Hills, CA 91307

Woodland Hills Rock Chippers
Hours: Saturday, 10 am - 5 pm
27th Annual Gem Show
Contact: barnettcelia53@gmail.com
Website: rockchippers.org

Oct 31-Nov 1, 2026 - Orange, CA
Velvet Rose Event Center, 300 S. Flower Street, Orange, CA 92868

American Opal Society
Hours: Sat 10am-6pm; Sun 10am-5pm
Come visit our 55th Annual Opal, Gem & Jewelry Show!
Opal and gem dealers from around the USA and beyond. Huge drawing! GRAND PRIZE: custom design by Stan McCall
Admission \$5 Adults; Students with ID and Children under 15 FREE
FREE Parking
Contact: info@opalsociety.org (714) 501-9959
Website: opalsociety.org

More shows at cfmsinc..org

SEPTEMBER NEW MEMBERS

Aaron Celestian
Jessica Herron
Wendy O'Daniels
Kim Watters

OCTOBER MEMBER BIRTHDAYS

Claudene Anderson
Dom Bastian
Steve Dover
Liam Goldsmith
Nickie Jessup
Minda Moe
Miriam Schulman
Brit Smith
Jennifer Tong



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The Nugget – Submissions

The submission deadline is on the 15th of every month. Articles or notes without a byline are written by the Editor. Photographs without credits are shot by a CCRMC member. Email the Nugget submissions to the Editor: nugget@culvercityrocks.org

The Nugget – Advertisements

The Nugget accepts paid advertisements. The cost for an eighth of a page is \$7 per insertion, payable in advance. Size is about 2" high x 3.5" wide. Ad location is at the discretion of the Editor.`` Ads, copy, or business cards must be received by the 10th of the month. Email submissions to the Editor: nugget@culvercityrocks.org

Mailing Address

Culver City Rock & Mineral Club
PO Box 3324
Culver City, CA 90231
info@culvercityrocks.org
310-836-4611

See local field trips posted on LA-Rocks at [facebook.com/groups/411978609512229](https://www.facebook.com/groups/411978609512229)

More field trips are posted on SoCal Rocks www.facebook.com/groups/2605376056257691

Zoom Address

<https://zoom.us/j/3108364611?pwd=WnRTclZTS-3RJMEdWdlV2c01mQWxqdz09>

Meeting ID: 310 836 4611

Password: rocks

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The CCRMC is a nonprofit 501(c)(4) organization.

2026 Elected Officers

President - Alexa Hunter
Vice President - Steven Dover
Treasurer - Darrell Robb
Recording Secretary - Stephanie Dangott
Corresponding Secretary: Ellen Moe
Parliamentarian - Ana Maria Strambi Guimaraes

2026 Committee Chairs

Education - Merrilee Marks
Federation Director - Ellen Moe
Field Trips - Michael Sadeghi, Harvey Schwartz
Librarian - Joannie Rippner
Membership - Regina Lozano
Minerals - Joel Kuennen
Photography - Brit Smith
Programs - Jette Sorensen
Publications - Jette Sorensen,
Joel Kuennen
Publicity - Janice Metz
Social - Co-Chairs Peggy Oberg, Steve Dover
Sunshine – Stephanie Dangott
Trading Post - Gary Mitchell
Zoom Host - Darren Cokin

Board of Directors

2026 + 2027

TBD