## **The Sierra Pelonagram**



The Sierra Pelona Rock Club is a non-profit organization founded in 1959 with the objective to sponsor activities and promote interest and education in: mineralogy, lapidary, geology, paleontology and related subjects.

#### Sierra Pelona Rock Club General Meeting February 16, 2021 Via Zoom

The meeting was called to order at 7:10pm. There were nine members in attendance.

Bill reminded those attending that dues were due for the club and any unpaid members would be dropped as of February 28.

Literally, that being the only real item on the agenda, the meeting was adjourned at 7:20 for Tina White's program The Ten Most Toxic Minerals. We all found it quite interesting and suggested that when we can hold in-person meetings, this will be repeated.

The program ended at 8:15 and after a bit of chat, everyone signed off.

**Respectfully Submitted** 

Heidi S Webber, Secretary SPRC



Sierra Pelona Rock Club Board Meeting March 2, 2021 Via Zoom

The meeting was called to order at 7.07pm. In attendance were Julie Tinoco, Bill and Heidi Webber, Ron Rackliffe and Tina White.

Bill announced that we lost 15 members during this years' membership renewal. They were dropped from the roster on February 28 and new rosters were emailed out. We now have 52 members. We also gained a new Pebble Pup. Goldie Crocket had a sweet baby boy named Ocean. Congratulations.

Tina White said that the March program will be on various forms of calcium carbonate. She said you will be surprised at the huge number of rocks that are made of it. Come to the General Meeting on March 16 to find out!

This was probably the shortest meeting ever as we adjourned at 7:27 with nothing more to discuss at this time.

Respectfully Submitted

Heidi S Webber, Secretary SPRC

## Birthdays

### April

March Richard Carlson Ruth Hidalgo Linda Jenkins Ed Learn Bill Webber

April Lynne Alexander Yolanda Resnick Greg Mazourek Michael Shane



## **Officers:**

President – Bill Webber Vice-President – Julie Tinoco Secretary: Heidi Webber Treasurer –Shana Brunes-Ruiz Federation Director (CFMS/AFMS) --Ron Rackliffe

## **Chairpersons:**

Claim--Linda Jenkins Donation Rock Table--Akiko Strathmann Equipment--Bill Webber Field Trips – Julie Tinoco Historian -Open Hospitality – Ron Rackliffe Membership – Heidi Webber Website-- Larry Holt Pelonagram Publisher, Editor – Heidi Webber Programs –Tina White Publicity –Open Sunshine--Brigitte Mazourek

The Sierra Pelona Rock Club, is a member of the California and American Federation of Mineralogical Societies, Inc. (CFMS/AFMS). The general club meetings (Open to the public) are at 7:30 PM, on the 3rd Tuesday of each month at:

## The Clubhouse of the Greenbrier Mobile Estates EAST 21301 Soledad Canyon Rd Canyon Country, CA 91351

Contact the Club or the Sierra Pelonagram Editor at:

Sierra Pelona Rock Club P.O. Box 221256 Newhall, Ca. 91322 Or e-mail: <u>hwebber@pacbell.net</u> Visit the SPRC website <u>www.sierrapelona.com</u>

#### **President's Message**



Hello March! It's hard to believe that it's just been a year since all our lives changed so dramatically. It looks like things are easing up and soon we will be able to have our gatherings and meetings freely. Boy, do I miss that!

I'd like to announce that we acquired another Pebble Pup member last week. One of our newest members, Goldie Crockett had a beautiful baby boy named Ocean. Many of you haven't met her yet as she joined us just last March before the shutdown and was never introduced to the club in general. However, she met many of you on field trips before. Her children Golden and Ashton joined the club last month too. We are so looking forward to meeting Ocean as soon as it is safe to do so. Congratulations!

So, we are looking forward to our normal nice long spring. This is a perfect time to hit the desert looking for treasure. Soon (we hope!) we will be able to have the workshops start back up. There is a light at the end of this tunnel.

Until then, stay healthy.

Bill Webber, President SPRC

# Happy St. Patrick's Day!

#### The Feathery Gemstone Seraphinite

Seraphinite is a trade name for a particular form of clinochlore, a member of the chlorite group.

The dark green color of seraphinite is enhanced by a silvery and feathery shimmer caused by mica inclusions.

The name, 'seraphinite' comes from a Greek word, seraphim, meaning a winged heavenly being, because of the feather-like appearance of the chatoyant fibers in the stone.

With shorter down-like feathery growths leading into longer "flight feathers"; the resemblance even spurs fanciful marketing phrases like "silver plume seraphinite." Seraphinite is generally dark green to gray in color, has chatoyancy, and has hardness between 2 and 4 on the Mohs scale of mineral hardness.

The chlorites are a group of phyllosilicate minerals. The name comes from the Greek word for green, chloros, since most chlorites are green, though they also occur in white, yellow, red, lavender or black. The most common chlorite varieties are clinoclore, pennantite and chamosite. There are only two gem-quality



minerals in the chlorite group, both types of clinochlore: Seraphinite and kammererite.

The mineral clinochlore was first identified in 1851 in West Chester, Pennsylvania. It has since been discovered in a number of other locales in the USA, including New York, Arizona and New Jersey. Clinochlore can also be found in other countries, including Spain, Switzerland, Russia, Turkey and Italy.

Seraphinite, like the other clinochlorites, is magnesium iron aluminum silicate hyroxide. It is quite a soft stone, with a hardness of only 2 to 2.5 on the Mohs scale. Like all the chlorites, seraphinite exhibits perfect cleavage in one direction.

When polished, seraphinite displays a pearly to vitreous luster. It has a density of 2.55 to 2.75, which is approximately the same range as quartz or beryl. Its refractive index is 1.576 to 1.599, similar to emerald and aquamarine.

Due to its softness, seraphinite is mainly a collector's stone. What makes it of special interest is the silvery chatoyant fibers, which form patterns similar to feathers.

Reference: Geology In



#### Incredible Map of Pangea With Modern-Day Borders

As volcanic eruptions and earthquakes occasionally remind us, the earth beneath our feet is constantly on the move.

Continental plates only move around 1-4 inches per year, so we don't notice the tectonic forces that are continually reshaping the surface of our planet. But on a long enough timeline, those inches add up to big changes in the way landmasses on Earth are configured.

Today's map, by Massimo Pietrobon, is a look back to when all land on the planet was arranged into a supercontinent called Pangea. Pietrobon's map is unique in that it overlays the approximate borders of present-day countries to help us understand how Pangea broke apart to form the world that we know today.

#### Pangea: The World as One

Pangea was the latest in a line of supercontinents in Earth's history.

Pangea began developing over 300 million years ago, eventually making up one-third of the earth's surface. The remainder of the planet was an enormous ocean known as Panthalassa.

As time goes by, scientists are beginning to piece together more information on the climate and patterns of life on the supercontinent. Similar to parts of Central Asia today, the center of the landmass is thought to have been arid and inhospitable, with temperatures reaching 113°F (45°C). The extreme temperatures revealed by climate simulations are supported by the fact that very few fossils are found in the modern day regions that once existed in the middle of Pangea. The strong contrast between the Pangea supercontinent and Panthalassa is believed to have triggered intense cross-equatorial monsoons.

By this unique point in history, plants and animals had spread across the landmass, and animals (such as dinosaurs) were able to wander freely across the entire expanse of Pangea.

#### Breaking Up is Hard to Do

Around 200 million years ago, magma began to swell up through a weakness in the earth's crust, creating the volcanic rift zone that would eventually cleave the supercontinent into pieces. Over time, this rift zone would become the Atlantic Ocean. The most visible evidence of this split is in the similar shape of the coastlines of modern-day Brazil and West Africa.

Present-day North America broke away from Europe and Africa, and as the map highlights, Atlantic Canada was once connected to Spain and Morocco.

The concept of plate tectonics is behind some of modern Earth's most striking features. The Himalayas, for example, were formed after the Indian subcontinent broke off the eastern side of Africa and crashed directly into Asia. Many of the world's tallest mountains were formed by this process of plate convergence – a process that, as far as we know, is unique to Earth.

#### What the Very Distant Future Holds

Since the average continent is only moving about 1 foot (0.3m) every decade, it's unlikely you'll ever be alive to see an epic geographical revision to the world map.

However, for whatever life exists on Earth roughly 300 million years in the future, they may have front row seats in seeing the emergence of a new supercontinent: Pangea Proxima.