



# CEDAR VALLEY GEMS

CEDAR VALLEY ROCK & MINERAL SOCIETY

CEDAR RAPIDS, IOWA

CEDAR VALLEY GEMS

DECEMBER 1995

VOL. 23, ISSUE 4, PAGE 1

## CHRISTMAS PARTY AND POTLUCK

The Christmas Party and potluck will be held Saturday, December 16, 1995. We will meet around 4 PM for a SHOW & BOARD MEETING. We will eat at 5:30 PM. The committee is planning an evening of games and music. We will sing-a-long to some of those old favorite Christmas carols. If you want to join the "orchestra," call Sharon Sonnleitner (396-4016). Please plan to come and join us - for a little while at least and share in the Christmas season.. There are some of you we have not seen for quite awhile. This is a good time to come and just visit and get acquainted.

Bring a well-filled basket, (salads, casseroles, desserts - whatever you like to fix) your own table service and whatever soft drink your family likes. Guests are always welcome.

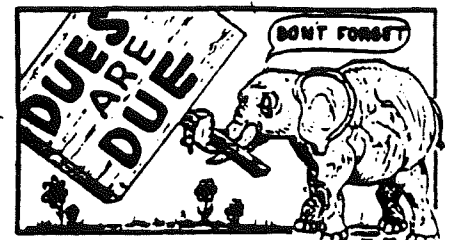


Don't forget to bring your donations for the needy baskets - canned goods, cereals, flour, sugar, puddings, etc. etc. We will pass the hat for cash donations to be used to purchase fresh meats, produce, and dairy products and whatever else will round out the needs of the families. The groceries will be collected and sorted at Norman and Alice Brown's. The committee will meet a few days before Christmas to shop and deliver the groceries and gifts. This has been a tradition of our club for a number of years - our chance to help someone less fortunate.

Do not carry your grocery donations and gifts in to AEGON. We will plan to transfer them to either Brown's car or someone who lives near their area.

## DUES DUES DUES

Dues are due - a mere \$7.00 per family, or individual. See Dale Stout at the party. Don't miss out on all the upcoming activities.



## JANUARY MEETING DATE CHANGE

Due to an AEGON awards banquet in the cafeteria on our regular meeting date, we will be changing the date of that meeting. Please check your January bulletin for the date!

## NEEDY BASKETS

We have a pretty big job ahead of us. Three homes and/or families

If you are giving gifts of clothing or toys, please be sure to mark the mother's name, or the child's name on the package or item so the committee can get it to the right person. The gifts need not be new, but should be in good condition.

If you plan to donate other gift items on these Alice Brown (393-7193) and items you are getting and avoid duplication and make



any of the clothing or lists, please call let her know what for whom so we can sure everyone is covered.

Number 1 is a single lady, Shirley, who needs large, long jogging pants, size 10 1/2 anklets, size 38 C bras, towels and food. She cannot have milk or any of the dairy products. Also, no corn.

Number 2 is a mother - 21 years old, Brandy - a Kirkwood student..

She needs T-shirts or sweat shirts - large. They need towels.

There are 3 little girls: Jessica age 5, size 6 - a toy or game

Rae Ann Age 4, size 4 - a toy or game

Dallas (D J) age 2 size 2 or 3. DJ has asthma and bronchial problems

(in visiting with the mother, Alice learned that the children need underwear. They like dresses and tights, hair bows. They could use coloring books & colors. They like Disney characters. Mother says kids will eat anything. They especially like cereals and fruits, also vegetables. The mother told Alice not to worry about her - just so the kids have a nice Christmas.

(The information immediately following the girl's names was given by Hacap. The other info Alice learned in talking with the mother)

Number 3 - single mother - age 31, Debbie

Amanda Age 13 Size 9 ladies jeans or slacks. Size M ladies sweat shirts

Erin Age 10 Size 12, girls jeans

Dustin Age 5 Size 6 sweat suit, boy's socks. likes power Rangers

Both of the girls could use some underwear

When Alice talked with the mother, Debbie, she said she didn't need anything. So, perhaps a sweat shirt or pants or whatever you think of.

(Probably paper products would be a good thought for either of the families)

-----

TANAGER PLACE - As you probably know Tanager Place is a home for children who have been victims of emotional, physical and sexual abuse. They sent us a copy of their Wish List. It is quite long. I will just list a few items, in the event you would like to help. I have a source that frequently gives me odds and ends of office supplies. Tanager has always been very pleased with whatever I have taken there. (If you wish to donate, I will be glad to take it over there. You may put your name and address on it, if you would like to receive credit. They list several items under Sporting goods and Equipment. Magazines: National Geographic, World, Sports Illustrated for Kids, Boys Life, Highlight for Kids. Clothing: gloves/mittens, hats/scarves, sweat pants, sweat shirts, school clothes and infant clothing. (They have children of all ages and sizes up through teen agers). Art supplies, school supplies, personal items, games, toys, children's books, scrap books, games, toys jigsaw puzzles and lots, lots more.

Alberta Cray

## SHOW NEWS

Nearly all of the dealer contracts have been confirmed. It is shaping up to be a good show.

At the last meeting Marv enumerated some of the 'geological happenings' that have been a factor in the development of Iowa - the gypsum mines and the Cardiff giant of the Fort Dodge area, the coal mines of Oskaloosa/Pella/Knoxville and other areas, such as Buxton, a coal mining town which has been buried and which was entirely populated by black families. Rockford Brick and Tile at Rockford, the Mines of Spain, Dubuque, the State Quarry from which the dimension stone was quarried for the old Capitol, and Stone City. Perhaps you know of others. Marv asked Bill Mitchell to chair a committee on the study of these sites. Also on the committee are Dale Stout, Sharon Sonnleitner, A. J. Johnson, Julie Sova and Alberta Cray. If any of you have time to do some research or writing about any of these areas, we surely will appreciate your help. Also if you know of any booklets or publications that can be used as resource material, please let us hear from you. Incidentally, I have recently learned that there was a tile factory right here in Cedar Rapids on the southwest side. And though the Mississippi River clam shells are not a geological happening, the many, many Mother of Pearl items that were made from the Mississippi River clams, certainly contributed to the development of Iowa's economy. There were button factories in Muscatine, (the pearl button capital of the nation), Gutenberg, Lansing, and Washington, Iowa. And other towns. All of these are possibilities for fine exhibits.

Our theme is **CELEBRATING IOWA'S SESQUICENTENNIAL - 150 YEARS OF GEOLOGICAL CONTRIBUTIONS TO THE DEVELOPMENT OF IOWA**. The date is March 23 & 24, 1996.

Plan to come early December 16 for the show committee meeting. Let the co-chairpersons, Marv Houg & Sharon Sonnleitner, know which committee you would like to help with. There is a lot to be done and **YOUR HELP IS NEEDED**.

Alberta Cray

-----

**SHOP HINT** - After a tube of epoxy has been opened dab a bit of Vaseline on the threads. The cap will not stick and mess up your tube. Also put some Vaseline around the rim of your tumbler before bolting on the lid. It makes a tighter seal and it will be easier to remove the lid.

From the PEGMATITE & PICK AND DOP STICK via PEBBLE PUSHER



-----

**SOAPSTONE BED WARMER**

You can keep warm this winter and save energy simply by taking a rock to bed with you at night, says Jeff Barnes who lives in Bernheim, Maine. He says soapstone is Nature's electric blanket or hot water bottle. He says his soapstone method is a tried and true energy-saver and warmer. It can keep your feet warm during the coldest nights and keeping your feet warm is the key to keeping your body warm. Soapstone is cheap because you can put it on top of a radiator or a wood stove or beside the fire or throw it in the oven for an hour while you cook dinner, and you don't have to use any extra energy. Soapstone's special heat-retaining qualities have been known to man since the days of prehistoric Egypt.

via Pegmatite and several others

## WHAT ARE THE ODDS?

by John Stade

*Have you ever considered how great the odds are against a fossil winding up in your collection?*

First a creature must die a peaceful, natural death--not be torn apart by a predator or smashed by some natural catastrophe (fig. 1). Then it must fall into a quiet environment where it is quickly covered by silt and protected from the ravages of weather (fig. 2). If it is a shallow-water organism, there must be no wave action to break up and scatter pieces of the creature. If on land, the leaf or animal must be quickly buried before it can be eaten by insects or be blown around by the wind.

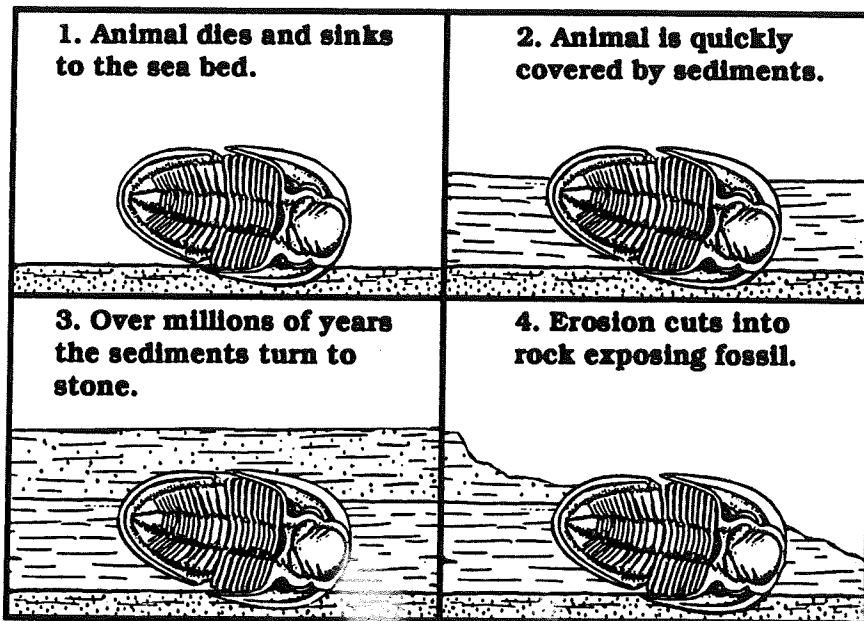
Once the creature is buried, its troubles are not over. Erosion must not expose the critter before it has the chance to turn to fossil. In the case of a shell, the environment must not be acidic or the shell would disappear. With a leaf, the environment must be free of oxygen, or it would decay. And with other animals, the mud covering the fossil-to-be must be foul enough that no worms, burrowing creatures, or other scavengers would choose to live in it and be tempted to disturb the fossil's peaceful rest.

Now the fossil must lie there undisturbed for hundreds of millions of years while more sediments are being deposited on top of it (fig. 3). Then the sediments are uplifted over more millions of years into a mountain range. Very slowly erosion cuts down much of the rock to almost where the fossil lies.

Then, in an instant of geologic time, the highway department comes along and puts a roadcut through the formation. In the blink of an eye, geologically speaking, the fossil is exposed at the surface, and you come driving by (fig. 4).

A few days earlier the fossil was covered with mud; a few days later it might be eroded away. But in all these millions of years, *you* are there, at precisely the right moment. You shout, "Wow! Look what I've found!" You carefully grab your rock hammer and chisel, and accidentally smash the poor thing to smithereens.

*from PALEO Notes, 6-7/93,  
Guy Darrough, ed.*

**How a fossil is formed.**

THUNDER EGGS - UNRELATED TO THE WEATHER AND  
NOT AFFILIATED WITH CHICKENS

by Fred Greef, *Washington Agate*

You know them when you see them, but they're not easy to describe. Scientists have studied them, but aren't sure just how they formed. And where did they get a weird name anyway? To answer the last question, it's a Warm Springs Indian legend that tells of Mount Hood and Mount Jefferson Thunder Spirits becoming angry with one another. They hurled spherical rocks back and forth during violent thunder and lightning storms. The Spirits had stolen these weapons from the thunderbird's nests. Stray shots landed in the Warm Springs Indian reservation where they can still be found today.

The thunder egg is the state rock of Oregon (although not technically a rock). Some of the nicest specimens and most fruitful hunting areas are found east of Oregon's Cascade Mountains.

As to a description, thunder eggs are balls of rhyolite matrix filled with agate, chalcedony, jasper, or opal. (Rhyolite is a fine-grained volcanic rock composed of quartz and feldspar - much like granite.) The rhyolite shell is often knobby and may have a ribbed pattern. The agate centers may be banded, or contain plumes, moss like inclusions, and/or fortification or other patterns. Thunder eggs can also be hollow or lined with quartz crystals like geodes. Some eggs with multicolored plumes (flowers) in chalcedony are among the most valuable. Friday plume thunder eggs from the Richardson Ranch have colorful bouquets of "flowers" and are the most famous. Some eggs have clear centers and others contain white, red, yellow, orange and blue in various combinations. Some of my favorites are those filled with pastel-colored jasper patterns.

Thunder eggs can still be dug for a small fee in several locations on the Richardson Ranch near Madras, Oregon. Other nearby locations have included the Kennedy Ranch east of the Richardson Ranch, Antelope Ranch south of Antelope, the Friend Ranch near Ashwood, and the Hay Creek Ranch south of Richardson's. Most of these sites were fee basis diggings locations, but are no longer open to the public.

Thunder eggs are also plentiful in the Ochoco National Forest near Prineville. The Lucky Strike Mine has several beds open on a fee-dig basis. There are also several Prineville Chamber of Commerce sites where thundereggs can still be dug for free. These include Whistler, White Fur, and White Rock Springs.

The Succor Creek area near the Idaho border is a famous Oregon thunder egg location. And don't forget "Thunder Egg Days" around the first week in August which is the annual show in Nyssa, Oregon, close to Succor Creek.

Kelley Creek, near Lakeview, is another well known site. Many other states have thunder eggs, including New Mexico where one of my favorites has been found near Demming. This type has black, red, and blue agate centers. It's fun to dig, cut, and polish these fascinating balls of colorful pattern.

Just don't throw any at me in a rainstorm.

via NEWS NUGGETS 12/95

(Is anyone headed west next year? News Nuggets also carries and article about several of the Thunderegg ranches - very informative if you are going that direction. Let me know if you want it in next month's bulletin.) Alberta

ARIZONA COPPER  
(MORENCI MINE)

This is the first of three articles relating to the copper industry in Morenci, Arizona. The first article covers the history of Morenci Mine, the second article briefly describes the process used to convert the ore into pure copper, and the last article tells of a rewarding rock hunt in the mine.

HISTORY OF COPPER MINING (MORENCI, ARIZONA)

The copper story in Morenci, Arizona, began in 1865 when from California volunteer Union soldiers passed through the area. The first prospectors arrived in 1870, looking for gold. They failed to discover significant quantities of gold, but were intrigued by the rich copper deposits they found on both sides of Chase Creek. Several companies operated the mine until 1921 when Phelps Dodge became the sole owner. For sixty years all mining in the district was by underground methods. During the Great Depression copper prices fell so low that by 1932 all mining had been suspended. The underground mines never reopened.

Before the arrival of railroads and trucks, ore was transported by wagon train. In 1879 the first railroad was built.

In 1937 open pit mining was begun and ore was hauled in 5 yard and 22.5 yard trucks. Today ore is hauled to the crusher (located in the open pit mine) in much larger trucks. The newer vehicles will carry 240 tons of ore.

Here are a few statistics furnished by Phelps Dodge concerning the size of the operations. The mining operations cover an area of 50,000 acres. The open pit mine itself is 1.8 miles long and is the equivalent of 27 football fields placed end to end. Over two and a half billion tons of rock and ore have been removed from the open pit mine since it was first opened in 1937.

By Chet Smith in THE TULIP CITY CONGLOMERATE 8/'94

REFINING COPPER IN THE MORENCI MINE

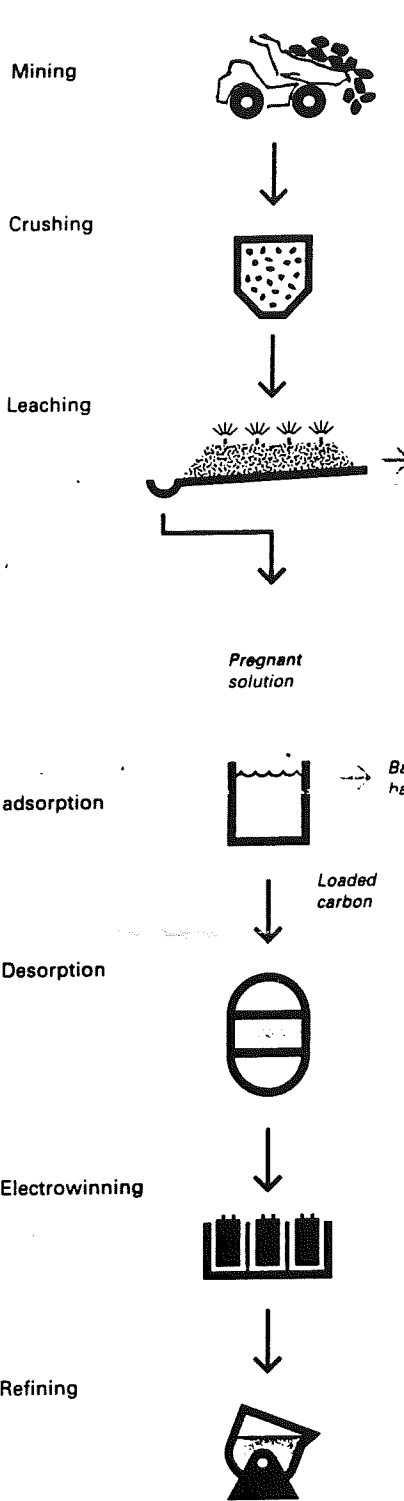
Part 2 of 3  
by CHET SMITH

The copper ore being mined today contains less than 1-2% copper compared to 20% that was available when the mine opened in 1872. Thus, the old method of smelting the ore to obtain the copper is not economical and newer techniques are being used. The new process is known as solvent-extraction-electro winning. It is a relatively simple process to produce practically pure copper from water that has been percolated through huge stockpiles of copper-bearing rock.

This process consists of four steps as described below:

STEP 1: LEACHING. The first step, leaching, starts with the sprinkling of slightly acidic water on one of the low grade ore stockpiles. The water percolates through the stockpile, dissolving copper minerals contained in the rock as it descends. The copper-laden water, now called "pregnant leach solution," exits from the bottom of the stockpile, flows to a collection pond, and is pumped to one of the solvent extraction plants.

STEP 2: EXTRACTION. In the second step, extraction, the pregnant leach solution is mixed vigorously with an equal volume of kerosene-based solvent that contains an organic chemical specifically designed to extract copper. After the solutions have been mixed for about two minutes the mixture is allowed to settle.



The solution, which has given up its copper to the organic chemical, is the heavier of the two solutions and sinks to the bottom. Now called "raffinate," it is pumped back to the top of the stockpile to begin another cycle. The solvent containing the copper-laden organic chemical, called "loaded organic," floats to the top and is pumped to the next section of the solvent extraction plant.

**STEP 3: STRIPPING.** In the third step, stripping, the loaded organic is mixed with a copper-bearing sulfuric acid solution, called "electrolyte," and the copper migrates from the organic to the electrolyte. The mixed solutions then are allowed to settle; the solvent that has been stripped of its copper, called "barren organic," floats to the top and is sent back to the extraction step to pick up another load of copper. The electrolyte containing the copper, called "rich electrolyte," settles to the bottom and is pumped to the electrowinning tankhouse.

**STEP 4: ELECTROWINNING.** In the final step, electrowinning, the rich electrolyte is pumped through a series of tanks or "cells." Hanging in the tanks are insoluble lead plates alternating with sheets of copper. Each lead plate serves as the anode pole of an electric circuit; each cathode pole begins as a thin "starter sheet" of pure copper. A direct current is passed through the electrolyte, reducing some of the copper ions to copper metal, which accumulates on the starter sheet.

After seven days in the cell a starter sheet has grown to a slab of virtually pure copper weighing about 200 pounds. At that point it is removed from the cell and replaced with a new starter sheet. The harvested cathodes are ready for sale or for further processing into other copper products. The electrolyte that has passed through the tankhouse, partially depleted of its copper and thus called "lean electrolyte," is returned to the stripping step to have its copper content upgraded once again.

A fairly simple process yet a tremendous investment is required to efficiently produce copper from low grade ore. In 1990 nearly 150,000 tons of ore were processed in one day. The plant produces nearly 350 million pounds of copper per year. They are able to do so at a cost of approximately thirty cents per pound. To achieve this over 145 million dollars has been invested in the Morenci Mining operations.

TULIP CITY CONGLOMERATE 10/'94

Illustration adapted from Echo Bay Mines 1994 Annual Report

CONTINUED NEXT MONTH



## LOOKING BACK - BITS OF CLUB HISTORY

*(Most of the information for this brief history of our club and newsletter was gleaned from 'books' maintained by LaVonne Grove and Leslie Blin, and a club history which was written by Gladys Tobac.)*

The club was started in 1951. There were members interested and active in all phases of the hobby, from collecting to lapidary, fossils, & fluorescents. All of these people had a desire to share their knowledge on where to find, how to clean and maintain, labelling, etc. In 1951, meetings were held in members' homes. During 1952 they began meeting in a room in Science Hall at Coe College. They continued meeting there until December 1964.

I am not sure when they joined the Midwest Federation, but I believe it was in 1955, or 1956. The first by-laws were formed in October 1954. The first club exhibit was held at the Cedar Rapids Recreation Department's HOBBY SHOW. Club exhibits through the years of '55 - '58, were held in conjunction with the Science Fair.

Personally, I have little to share with you about the club's activities until our daughter joined in the fall of 1962.

The club left the Coe College location December 1964, due to a continuing growth of the membership and poor parking facilities. They moved to the R.E.C. Bldg at the east end of Marion.

At the time we became interested in the club, the meeting time and place was handwritten and mailed to each member family on a post card.

We attended the meetings with our daughter that year. The rock "bug" attacked us and hung on tenaciously. The following year we ceased using our daughter as an excuse and joined as a family.

During the summer of 1962, I asked Alberta to pick me up a few rocks on their vacation trip to Seattle, Washington and California. Upon their return, I could scarcely wait to see what they had brought. Alberta had found it difficult to understand her fascination with the rocks and admitted she found herself gathering two of everything. How could this rock "bug" spread so fast and have such a voracious appetite? Alberta and Bud decided to join the club with us that same year.

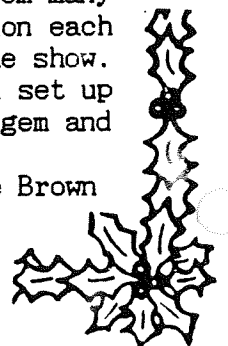
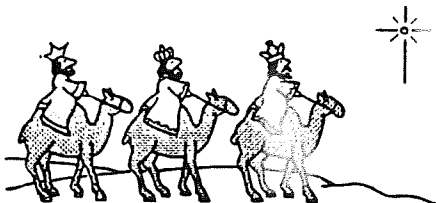
When officers were elected for the 1964-1965 term, Norman was elected president and Alberta was elected to secretary/treasurer. Hmmm! Was the club just waiting for new blood? This was soon to be the demise of the post card notification of meetings' time and place. Alberta felt a more friendly social greeting would bring us together. She began a sheet which she duplicated with the use of carbon paper. This sheet brought us time, place, hostesses, the program, tidbits of information and a listing of club shows. The first sheet was sent in May 1964. I wonder if those who elected the new officers were concerned about the aggressive upstarts who had been put in such high positions.

At this time the slate of officers was president, vice-president and secretary/treasurer. In the fall of 1965, a liaison officer was added.

In the summer of 1964, our club displayed 3 cases at the Illowa show and swap (Davenport?) The cases were borrowed. Specimens were collected from many of our members. We gathered at a member's house to temporarily position each specimen in the cases. Then they were wrapped and packed to take to the show. Several members were instrumental in getting these cases to the show and set up before the grand opening. We each felt very proud to be a part of this gem and mineral show. We certainly found it interesting and informative.

Alice Brown

CONTINUED NEXT MONTH





## 'ALL THAT GLITTERS IS NOT GOLD'

by Mel Albright, Chair safety

In Gilbert and Sullivan's operetta, *H.M. S. Pinafore*, *Butttermcup* reminds us that 'all that glitters is not gold' and that 'jackdaws strut in peacock feathers.' We should keep her advice in mind when we read 'hints' in our own and in exchange bulletins. These ideas come from people with good faith, but often with little or no scientific background. Editors copy from each other with little effort to evaluate the ideas. Many feel as I did when I started - 'if it didn't work, it wouldn't have been suggested.' So - they may be shortcuts to disaster. A few that I have seen include:

*"Use permanent automobile anti-freeze in your saw instead of cutting oil."*

I do not know what this would do to your saw blade or how well it would lubricate. I do know that ethylene glycol (antifreeze) is a toxic material. It is bad for your health and for that of any pets you may have around. Skin exposure and breathing of the mist created by the saw would both be bad for you. his hint is a a real loser. DO NOT DO IT!

*"Use kerosene as a cutting oil in your saw"* Again, this is a bad idea. Kerosene is a FUEL. It is less volatile than gasoline and more volatile than diesel oil. It doesn't ignite as easily as gasoline, but it will ignite from sparks and heat. You could end up with several gallons of fiery fluid running around the floor. DO NOT DO IT !

*"Heat a cob and some wax in a microwave oven for fast dopping"*. Do you remember Mt. St. Helen? The big explosion that occurred? That came from superheated steam. You can create a smaller version of the same explosion in your microwave if you follow this hint. All rocks have water in the pores inside. Microwaves work by heating water. The steam formed can create unbelievable force when it is confined as in the rock pores. When the rock fractures, there will be lots of shrapnel flying around. DO NOT DO IT !

Generic 'mix this with that to do this' hints. When two chemicals are mixed, there is often a reaction. Some reactions are quite vigorous and release lots of energy. Mixing acid and water is an example (see 'superheated steam' above). AAA - always add acid to water, not the reverse. Other mixing reactions release toxic fumes. An example is porcelain cleaner and laundry bleach. They release chlorine gas. If you try one of these hints, start outdoors and with limited quantities. Or, - DO NOT DO IT!

Remember, - some good sounding ideas are really, really bad. Read them with caution and, if you're not familiar with the materials' properties, ask someone about them.

AFMS Newsletter 12/95

-----  
WIRE SAW BLADES

A good place to keep saw blades for silver smithing is in a used transparent "Bic" ballpoint pen. Birdie Nichols of Chagrin Falls, OH, removes the used pen filler by grasping the metal tip with pliers. The empty pen will hold a package of 12 saw blades which can be kept clean by replacing the plastic cap. A label marker will help identify which size blade is stored. Small drills can also be stored this way.

From CFMS Newsletter via Bellflower Gem &amp; Mineral Society

## Millefiori Beads and Polymer Clay

I had seen some beads at the Denver show and read a little here and there about bead making. A lady at the Idabel show was wearing beads her husband made from local clay that he had rolled and hardened on a wood-burning stove. He then drilled holes in the beads and painted each one. So with all this running around in my head, I was ready for the February 1994, issue of *Rock and Gem*. On the cover was "Bead Making - Millefiori, Enamel, Clay." I read the article and made a trip to a local hobby store for supplies.

After reading the article three times to be sure I understood, on the third time I highlighted the most needed information. I found a one-foot long by six-inch wide board which was covered with wax paper for cutting and rolling the clay. I did not have an aluminum bread pan so I took a round aluminum pan and squared it by hand as best I could.

I then took the six different colors of clay and cut a 1/4 inch wide piece off the ends with my X-Acto knife. I cut each long piece into three pieces. Then I took different colors and layered them to make a rough rod. Next, the rod was rolled out to make a smooth rod. The rod will get longer and thinner as you roll it out. I then rolled up the rod to make it like a cane. Some rods I rolled loose and others I rolled tight for different looks. You then have to roll very lightly again to remove the rough edges. I cut lengths different sizes to roll into different size beads. I then put them on a wire and hung the wire over the pie pan and put it in the oven. Something went wrong soon - there was smoke coming out of the toaster oven. The article said that if you over-cook them, the beads will turn brown. They were right. I did some more on my small toaster oven and did them 10 minutes at 170 degrees. Sure looked good that time. I cut some clay from rolls and flattened them out. I had made several rolls that were different colors. I took the flattened clay and wrapped it around the cool overheated (brown) beads and rebaked them at 170 degrees for ten minutes. They came out looking very good. I would suggest that you only try a few beads in the oven to see if you have everything right.

Next, I had to put the polish on them. I had only one hibachi stick to hold the beads, so I improvised with large wooden matches that I cut points on the end. Then I stood the sticks in florist clay while the beads dried. The variety of bead shapes is unlimited.

I hope this helps someone else. I hope you have as much fun as I did making millefiori beads, as I had a grandson helping me. He added to the creative fun.

### Supplies for Millefiori Clay Beads

Things you should get if you want to learn and do millefiori beads:

1. Polymer clay is sold under different names: Fimo (TM), Sculpey III (TM), or Super Sculpey (TM).
2. A 1 x 4 or 6 or 8 inch wide board 8 to 18 inches long. Cover the board with wax paper and tape wax paper so it will stay on. This is what you will use to cut and work clay on.
3. A knife, X-Acto knife or razor blade.
4. A small aluminum pan, like a bread pan - a pie pan is not deep enough.
5. A large needle, knitting needle is good for the size hole you want. You can use sharp wire.
6. A couple of heavy copper wires or cut coat hangers all long enough to fit on the pan. Hang beads on the wire suspended above the pan sides. The wire needs to be the right size for the bead holes.
7. A very small jar and a small paint brush to coat beads. Gloss varnish gives the beads a bright shine.

Fimo and Sculpey are two polymer clays that I have tried. Wal-Mart is now carrying Creative Craft Clay. The white was too chalky but the other colors are fine. It seems about the same as the other brands.

The Creative Craft Clay has instructions on the back. The baking time is about the same as the others, but this one uses a regular home oven, not a toaster oven. Try carefully in gas or propane ovens since they have different heating ranges, as do different electric ovens.

I made some bola tips with inserts for some small rose rocks. I will make some very small ones for my very small rose rocks. The larger items can lie flat in a flat pan and they bake properly. I ran out of wire pins, so I used straightened paper clips with a small hook on the end so it would not pull out of the clay. They are a little harder to work with than pin wire. I cut off the extra wire and used round-nose pliers to make a loop.

With all the different polymer clays, the price just gets better for those who work with it. The ideas are unlimited, and it can become an addictive hobby.

- George Finley, from Shawnee Slate 3/94,  
via The Rockfinder 10/95

via THE ROCKPILE



AMERICAN  
LANDS  
ACCESS  
ASSOCIATION

ALERTS

AND

ACTION

Protecting the Public Lands for the Public

The ALAA is desperately in need of funds to support a lobbyist in Washington for a few months in an effort to secure passage of this legislation. Please send contributions as individuals and/or clubs to Mr. Ed Romack, Treasurer ALAA, 655 8th Street, Idaho Falls, ID 83401.

**WE NEED YOUR HELP!**



**WE NEED YOUR HELP!**

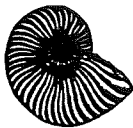
Join the  
American  
Lands Access  
Association  
NOW!

The American Lands Access Association is a 501(c)(4) organization. Its purpose is to promote and ensure the right of amateur hobby fossil and mineral collecting, recreational prospecting and mining, and the use of public and private lands for educational and recreational purposes; and to carry the voice of all amateur collectors and hobbyists to our elected officials, government regulators and public lands managers.

WE ALSO NEED YOUR HELP!...We want to encourage you also to support and contribute to ALAA...help save our happy homes, so that when you come to take us home with you, we'll be available...



**WE NEED YOUR HELP!**



**GOOD ROCKHOUNDS EVERYWHERE**

The ALAA is soliciting contributions to finance sending a representative to Washington, D.C. to lobby for passage of the "Fossil Protection Act of 1995." A large number of clubs in the NFMS have contributed amounts ranging from \$100.00 to \$500.00. Please consider making a donation either as an individual or as a club. Donations should be sent to:

ALAA  
c/o Ed Romack, Treasurer,  
655 8th Street,  
Idaho Falls, ID 83401.

*From AFMS Newsletter, Sept., 1995*



via the MWF Newsletter



**AMERICAN  
LANDS  
ACCESS  
ASSOCIATION, INC.**

---- Protecting the Public Lands for the Public ----

**MEMBERSHIP APPLICATION**

Please enroll me as a member of the ALAA!  
Annual Membership Fee: \$ 25.00

NAME \_\_\_\_\_  
ADDRESS \_\_\_\_\_  
CITY \_\_\_\_\_ STATE \_\_\_\_\_ ZIP \_\_\_\_\_  
PHONE \_\_\_\_\_ HOBBY INTEREST \_\_\_\_\_  
CLUB AFFILIATION \_\_\_\_\_

Remit fees to: ALAA, R. Ed. Romack, Treasurer, 655 Eighth Street, Idaho Falls, ID 83401

The A.L.A.A. is a 501(c)(4) organization. Its purpose is promoting and ensuring the right of the amateur hobby collecting, recreational prospecting and mining, and the use of public and private lands for educational and recreational purposes; and to carry the voice of all amateur collectors and hobbyists to our elected officials, government regulators and public land managers. Contributions to the A.L.A.A. are not deductible as charitable contributions for Federal Tax Purposes.

CEDAR VALLEY ROCKS & MINERALS SOCIETY  
OFFICERS, BOARD MEMBERS and COMMITTEE CHAIRS

President	Marv Houg	395-0577	Board	
1st Vice President	Jeff Groff	365-4585	Bill Mitchel	1-338-6693
2nd Vice President	Julie Sova	373-2980	Bob Sweet	393-6415
Secretary	Tom Whitlatch	373-2980	Allan Johnson	363-5419
Treasurer	Dale Stout	365-7798	SHOW CHAIR	Marv Houg
Editor	Alberta Cray	362-5530		Sharon Sonnleitner
Co-Editor	Gladys Zobac	396-0210	Field Trips	Marv Houg
Liaison	Alice Brown	393-7193		Sharon Sonnleitner
Telephone	Leslie Blin	377-3339	Historian	Leslie Blin
Sunshine	Gladys Zobac	396-0210	Hospitality	Marv & Sue Houg
	Jean Cerveny	846-2245		

ALBERTA CRAY, EDITOR  
CEDAR VALLEY GEMS  
1125 J. AVE. N.W.  
CEDAR RAPIDS, IA 52405



*Historian*

