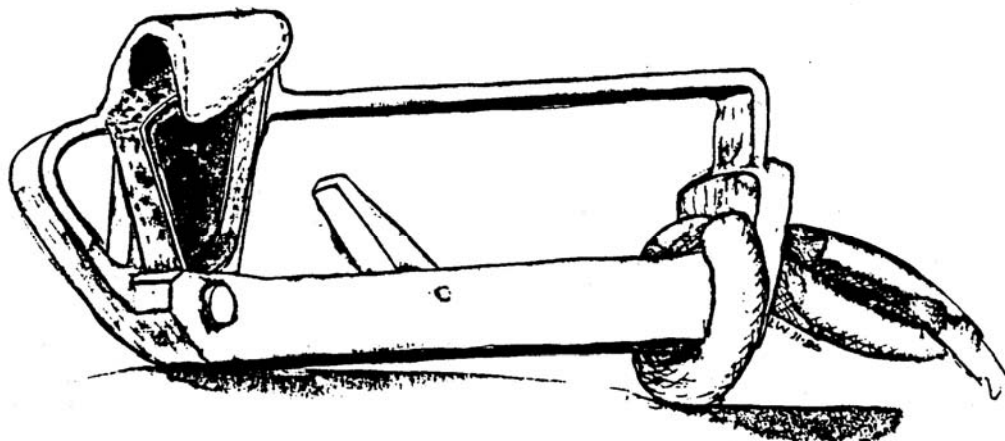
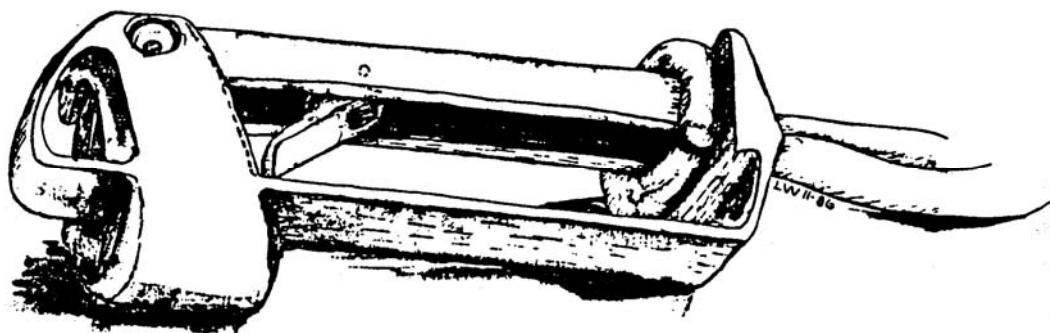
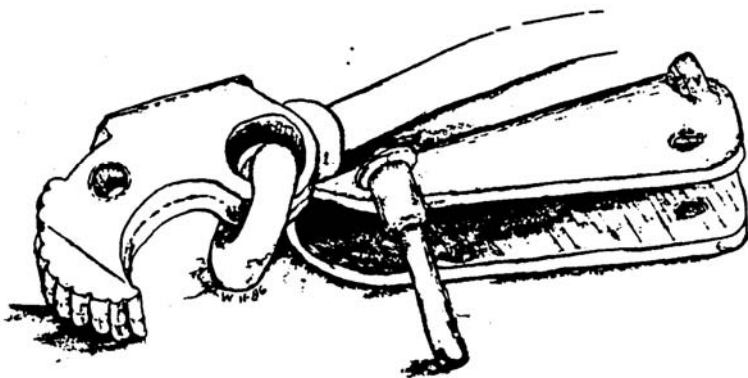
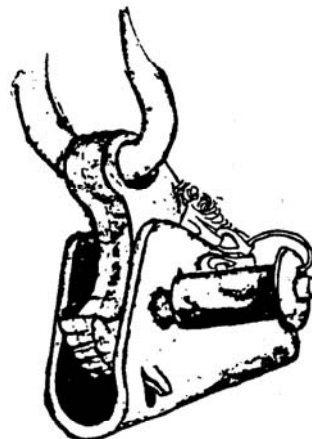


THE SAG RAG

JUL-AUG 91 Vol 10 #4



The SAG RAG is published bi-monthly by the Shasta Area Grotto of the National Speleological Society. Editors: Jim and Liz Wolff, PO Box 865, McCloud, Ca. 96057. Printing: Ray Miller. Grotto meetings are held the second Friday of the month at 7:30 pm. Meeting places are announced in the newsletter. Membership dues (including newsletter) are \$6, due January 1, and prorated by quarter. Newsletter subscriptions are \$6/year, due January 1, and prorated by quarter.

Uncopyrighted material may be copied, with credit given to the author and the SAG RAG.

MEETING

MINUTES

July 12 Meeting: at Kangaroo Mtn, on the border of the Red Buttes Wilderness. Present: SAG members George Reel, Jim Kottinger, Jim Wolff, Neils Smith, Bill & Judy Broeckel, Bowersox family; JSG members Marc Sorenson & Bill Kenney; WVG members Scott & Joy Linn.

Chairman Neils Smith called the meeting to order eventually. Minutes: none. Treasurer's report: none. No correspondence.

The regional in September was discussed.

The next grotto meeting is at Wolff's.

The meeting was adjourned soon.

August 8 meeting at Wolff's in McCloud. Present: G & D Reel, Ray Miller, Bill Broeckel, J & L Wolff, Steve Knutson.

Treasurer Ray Miller called the meeting to order. Minutes from May and July were read and approved. Treasury: \$297.41.

Letter from Al & Phylis Henderson was passed around. Letter from Kenny Laidlaw on regional program. Bulletin on rescue seminar.

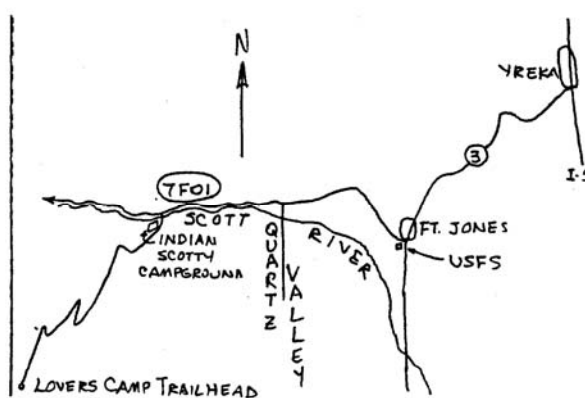
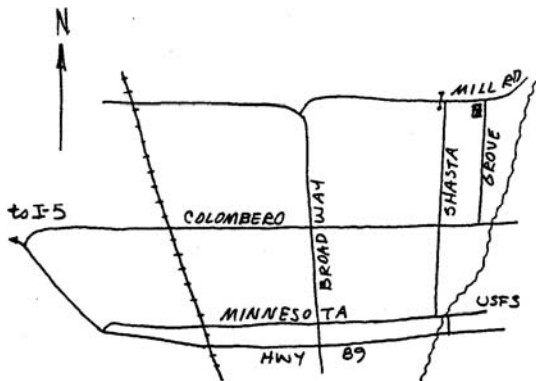
Old Business: Judy Broeckel volunteers to type articles for SAG RAG for one year. Wolffs will compile info, Ray or Reels will copy and mail. Regional: scout trip needed to Harris Springs; rescue theme is shaping up; region will supply us with plastic ware, paper plates & cups, coffee pot, carboys. Ray will make badges; 5 direction signs needed; cave trip guide sheets needed.

New Business: Steve Knutson KMCTF director reported vandalism to Frozen Falls Cave in the Marbles. SAG & initials scratched on wall. Request we publish this & conservation message in RAG. Next grotto meetings set. Wolffs will check with Oregon Caves for dates for work weekend, Oct or Nov. Jefferson State Grotto wants to visit Lakelevel Cave.

CALENDAR

Sept 13 SAG meeting at Wolffs in McCloud. 516 Mill Rd. 964-3123

Oct 11 SAG meeting in the Marble Mtns. Hike 5½ miles from Lovers Camp. Follow signs for Marble Valley. Cold nights.



Sept 28-29, 1991 Western Regional Meeting at Harris Springs Campground. Registration materials in the California Caver or contact Wolffs, PO Box 865, McCloud CA 96057.

New SAG RAG Editor

Judy Broeckel has volunteered to be the new typist/editor for the SAG RAG on a trial basis for one year. All articles, maps, drawings, and regular columns should be sent to: Judy Broeckel, 624 Annie St., Yreka, CA 96097

CONSERVATION ALERT

Those of you who were at the August grotto meeting heard Steve Knutson, head of the Klamath Mountains Conservation Task Force, tell of someone unknown to the KMCTF (or to the SAG members present) scratching our grotto's initials on the wall at the bottom of the entrance drop of Frozen Falls Cave in the Marble Mtns. The vandal put his initials, too.

Hear ye, Hear ye! It is not couth to deface the walls, floors, or ceilings of caves for a moment's glory (and the unending disgust of other cavers), or for your "friends" to see your initials there. Such doings are punishable by state and federal laws..

1991 Western Regional Meet



1991 WESTERN REGIONAL
HARRIS SPRINGS
SEPT 28-29

The Shasta Area Grotto will be hosting the Western Region at Harris Springs Campground during the Sept 28-29 weekend. Set up will be done Friday Sept 27 and the first arrivals are expected the same day. Costs are minimal: \$3 registration + \$3 for a Sunday brunch. Activities include caving, a slide show, caving, a rescue awareness seminar, caving, caving, an auction, & more caving. Days will be hot, nights cold. See the latest California Caver or contact Wolffs for more information and registration materials.

Rusty Cave Revisited by Liz Wolff

Rusty Cave was discovered by SAG members in late 1988, revisited in 1989 when a sketch map was made, and again in March 1991 to survey. The cave's name is an obvious one if you go and look at the walls, ceiling and floors of this cave located in the Subway Cave area, in the midst of a lava flow surrounded by manzanita brush, mountain mahogany and sage. A shallow sink having 2 entrances leading off, one to the north with about a mile of short cave segments, and to the east – Rusty Cave. The intrepid crew of Neils Smith, Bill Broeckel, and Jim & Liz Wolff found their way into the cave at around 11 a.m. In summer 1989 the cave had been dry, but now after nearly a month of rain and snow the cave was very wet. Dripping water, puddles and miniature rivulets were everywhere in the cave. This made it hard to stay dry in the crawls, and there were more of those than I remembered. Neils went in with some trepidation; memories of a particular crawl that he hadn't been able to do during the last trip. This time would be different: he had help in the form of a sand floor and willing diggers.

The cave begins with sand floor and walking height, but soon the ceiling lowers to stoop walking height, and then to crawling. The sand floor in the entrance area has been sculpted by water and feet into rounded lumps drilled by dripping water to resemble melted bowling balls. Lavacicles adorn the ceiling.

The tight spot that worried Neils was soon reached, surveyed through, and enlarged while Bill took pictures of the 'little people' (lava stalagmites) on the floor beyond the crawl. From there it was mostly stoop walking to the cave divide.

Here we found lava rosettes, mini volcanoes, little people, all kinds of lavacicles, and walking passage even for Neils. Some discussion followed as to which passage was longer, the right or left, and it was decided to do the right side since it was "shorter". It was longer than the estimates of 400' – 500', by several hundred feet.

While traversing this mostly stoop walking sized passage we found two sites with bones, and a live spider on its web way in the back of the cave. The right branch of the cave ended in a rough crawl way, with puddles, that no one wanted to push. It even had a bit of air flow.

At this point we were all hungry and wanting a bush badly so we opted to come back some other day to finish the survey. We had mapped 1670 feet.

Kingsley Cave by Phylis Henderson

On May 1st we finally decided to lay to rest the Kingsley Cave "legend", heading for the Black Oak Grove trailhead. We camped for two nights. A beautiful location, totally deserted at that time of year, but the access roads we wouldn't recommend to our worst enemies. They made the Bee Camp road look like a parkway.

The second morning, with our trusty maps and unerring sense of direction we proceeded baldly down to Kingsley Cave. As Al so aptly put it, it was about three miles down, two miles exploring up and down the canyon, and six miles back up. The weak one of the party of two was sick on the way back and had to have help, still he never lost his voice.

Kingsley Cave is not a cave but is the largest known shelter in this area. It is about 100 feet wide, 45 deep, and 25 feet high. Though it has a south-west exposure, the depth and configuration provide a dry and sheltered area under almost any storm conditions. The ceiling runs back almost 20 feet before starting to curve downward to the back wall. Otherwise it is a more or less standard "eyebrow" shaped shelter, typical of this area.

A couple of weeks earlier we had tried to get to Black Oak Grove via the Grapevine and Pellegreen Jeep Trails. It isn't long – about 10 miles in 4 1/2 hours. About halfway through we came upon a man walking a bicycle down the road toward Kingsley Cave. He had left his van at the east end of Pellegreen. We talked at length, compared maps, exchanged names, and proceeded on our separate ways.

He telephoned us two days later, saying he almost didn't get out, and wasn't sure he had found the cave. From his description, he did find it. He was from Arkansas and told us that "Californians" had a reputation for being somewhat abrupt and lacking in understanding. We think we have, at least partially, changed his mind.

Kangaroo Mountain Trips by various participants by Bill Broeckel

This joint outing with Jefferson State Grotto attracted a diversity of cavers from two states. Those who endangered their motor vehicles on those last few miles of road were encouraged by the old caver maxim "Bad roads, good caves". Bee Camp is so situated as to allow the on-timers to observe the progress of the late-comers as they inched up the road. The subsequent grotto meeting conducted by the campfire light may have set a speed record for such meetings.

Morning revealed the dramatic colors of the area's rich natural history: red mountains of peridotite rock, white portions of exposed marble, blue sky, and green vegetation of distinguished variety. Reaching the caves involved a modest hike, a nice easy one this time. At the marble the cavers generally dispersed onto and into the rock. The full story here is not known to me, but there were at least three caves looked into fairly well: Scar Cave, Hungry Cave, and Sinking Waters Cave.

At Sinking Waters a surface stream becomes subsurface, sort of a reverse spring. A salamander, brown on top and orange underneath, headed downstream and was destined to become a cave related vertebrate. Jim Wolff had a map from a previous era of caving. He thought that more mud had washed in than he remembered. Lots of grass seeds were sprouting in total darkness, pale cave gardens. Were the seeds brought in recently? Is the mud a legacy of the mining operation upstream? The cavers got muddy in here but most of this could be avoided by simply giving up the last 15 feet or so, where you actually have to lay down in it in order to proceed.

Hungry Cave – cavers enter the mouth of this one, where they get chewed on for awhile back in the molars, until eventually the cave spits them out.



Map: Scar Cave

Scar Cave – a sliding entrance is the narrowest part of this cave. It is easier to slide down than to slide up, as any child at the playground knows. Actually I'm not sure this was really Scar Cave, so I drew a little sketch profile. If this looks familiar to anyone who remembers Scar cave, let me know. The cave is undecorated except for a few small bits of flowstone, and a crawlway where you are surrounded by interesting wall spots. To me this seemed like a tremendous cave.

Time flies like bats in a cave, suddenly I had to run home late for work; I don't know what else happened over the weekend, it appeared to me that everyone was having fun.

Wolff's Version by himself....

I had been trying to get the grotto to go to this fine area for years, now the time was finally here! July 12th was to be a joint grotto meeting with the Jefferson State Grotto (J.S.G.). It had been over twenty years since I had been there, but I had the help of at least two cavers that had been there in the last year that clued me in on a few changes. The Red Buttes Wilderness boundary had been put in since I was there last, so we had to hike in!

Neils Smith, "Sarge" John Talley from the Sierra Army Depot and myself arrived late in the afternoon, just before dark. There we were met by Rick Bowersox and family of Chico (prospective SAG members), Marc Sorensen and Bill Kenney of the J.S.G. Jim Kottinger and George Reel were there too. Bill Broeckel and family showed up late in the evening, just before Scott Linn and his wife of the Willamette Valley Grotto showed up to make it a Three grotto function.

The meeting was fairly uneventful (see meeting summary elsewhere in the RAG), but we swapped lots of lies around the camp fire anyway. The next day, our plans were to go caving until we dropped!

John was fairly new to caving, but proved himself in the caves there on the mountain. It was only he and Bill B. that shoved on thru the wet, muddy crawl at the end of Sinking Waters Cave. We saw several other caves that day, and each of us had a good time. We also covered a certain part of the karst that was supposed to have Ledge Cave in it, but didn't find it.

by Al & Phylis Henderson....

After watching a swim meet in Yreka the weekend before the grotto meeting, we drove on up to Bee Camp to check the directions. It was an "interesting" drive for a normal car. However, we did get there and back. An impressively beautiful view & scenery.

The weekend of the grotto meeting we had two little league all-star games to attend. But we were so impressed with the area that we drove back July 18, and camped overnight at Bee Camp. Early Friday morning we walked out on the road toward Kangaroo Mt. for the second time – we had already done considerable exploring the night before. About half way to the divide, or gate, as we have called it, in a moment of foolishness (idiocy) we decided to climb to the top of the Red Butte karst ridge for the view and possibly go down the other side and check back along the brush line to the gap. The view was worth it, the climb wasn't.

About three quarters of the way up where we were first coming out of the brush onto the bare limestone, the climb was becoming very steep and we needed all the grips onto the rock that we could get, a minor incident occurred. Our leader of the moment stirred up a very large ant nest. They were red ants about 5/8 of an inch long and very aggressive. Also they were very efficient biters. Needless to say, this accelerated our rate of climb greatly and we soon reached the top of the ridge.

The view was well worth the climb, in itself it was well worth the entire trip. We were felt we were on top of the world. However, there still two problems, the north side of the ridge was quite steep and there were still numerous ants on top of the ridge. I would call it Ant Heaven.

A careful survey of the ridge in both directions indicated no acceptable way down the north side, so we decided on a strategic withdrawal to the road by a slightly different path to avoid the ants. This took some

time, my foot already told me during the climb that I should be walking on more level terrain. So we did. We walked down through the "gate" and down to the old building sites in the valley.

Just before we reached the mine we separated, Al went up the karst while I went farther on up the chute between the karst and the mine area. We found at least five caves with small entrances, mostly vertical. Two of them were very interesting, but due to the pressure of time and lack of equipment, we couldn't explore much. Incidentally, while we were exploring the USFS installed two metal gates across the opening on the rock fence on the divide.

The trip home was very long. It is about a 5 hour drive for us, but we may go again. There must be something in the Red Butte karst.

**U S Geological & Cave Research Foundation Field Trip to Hat Creek
and Lava Beds Nat. Mon. June 21 to 26, 1991** reported by B. Rogers

Fri, June 21: After a day of less-than-fun and games inspecting the Battle Creek fault (one of the participants was preyed upon by a hungry tick, developing Lyme Disease... keep those little beasts at bay folks!), we arrived at Hat Cr. campground, set up camp, and had a mixed repast. After dinner approximately 20 CRF cavers, USGS geoscientists, former cavers, pseudo-scientists, camp followers and general rabble stuffed themselves into three cars and drove to Subway Cave. Unlimbering flashlights of various luminosity the group charged into the cave. The appointed trip leader was deemed Purveyor of All Known Knowledge of Lava Tubes (little knowing that said trip leader had never been in Subway Cave) and soon all interested members of the group were deeply enmeshed in a rambling discourse of how this segment of Madam Peles' Plumbing Shop had formed. The appearance of two slightly frightened Little Brown Bats (*Myotis sp.*) at the southeast entrance signaled an informal and informative discussion of bats in general. Naturally this ended in a long series of funny bat stories. On the way back through the cave a former caver-turned-astronaut-turned-geologist, who had spent 2 years studying the tubes in Lava Beds, high-tailed it into the "closed" portion of the cave and a small party followed. (It must be remembered that very few of these participants had ever been in a cave before, so the novelty of acting out the Adventures of Tom Sawyer proved irresistible.) The pseudo-leaders finally emerged to find the County Sheriff speeding away from a visibly relieved group of grumbling geoscientists. Seems that the pseudo-leaders had all the car keys, and as the balance of the group milled about the parking lot in the dark, The Law sped by. Seeing a group of people staggering about in the dark The Officer thought he smelled a group of drunken adolescents emerging from a beer party in Subway Cave. Arriving with all lights flashing it took only minutes for him to realize that what he really had were a stone-cold-sober group of adolescent-acting adults impatiently awaiting their "leaders' " return from a subterranean adventure. With a sigh he wished them luck, then sped off as the keyholders finally emerged from the depths.

Sat, June 22: The assembled party, now numbering 24, arrived in Lava Beds just after noon, had lunch, and set up camp. After lunch we met Gary Hathaway and Michele Moore of the park staff, and proceeded to Captain Jack's Stronghold, where Hathaway gave an extended (2.5 hour) version of his 40 minute Modoc War of 1872 talk, to the delight of the group. A short visit into Captain Jack's Cave was part of the presentation. The assemblage then consolidated into the same 3 cars to drive to Fern Cave. Nearly 2 hours were spent in the cave inspecting the pictographs, listening to Hathaway's account of the 1990 Modoc encampment, touring the immediate entrance area of the cave, and oohhing and aaahhing over both the walls of rock art and the 5' long ferns. A somewhat organized general withdrawal was made and the cave cleared by approximately 6 pm. After dinner at the HQ area, the USGS group journeyed out to Skull Cave where those present explored the extent of the cave, debated the merits of Aaron Waters' theory of formation by steam explosion of the cave (see USGS Bulletin 1673 for more details), and closely inspected the ice deposits. The cave was finally cleared by midnight.

Sun, June 23: After a quick but exhaustive tour of Valentine Cave and a short stop for Quaternary landslide explanation in the middle of the road near Pluto's Cave (where the ersatz trip coordinator was nearly run down by two local pickup trucks) the group proceeded to the Yreka Bakery to meet two more USGS personnel, and devastate the \$7 Champagne Brunch. After suitable quantities of coffee were applied, the bulk of the group returned to the Bay Area. Mat Rice, Pat Rice, Skip Scott, and an aged and infirm sage parading under the unlikely pseudonym of Roger returned to the Monument after obtaining suitable supplies and stopping for a quick inspection tour of Windy Cave in the rain pelting down on the Pluto's Cave basalt. The balance of the day was spent in setting up and cleaning the Field Cabin, meeting with Pat Toops and Barney Stouffel, and arranging for the Monument's SCA person, Morgan Mitchell, to accompany us the next day to look for a rumored cave near Indian Butte to the south of the Caldwell trench area.

Mon, June 24: After a slow start due to the lingering effects of previous cave-related injuries to the senior partners of the CRF contingent, the group picked UP M. Mitchell and proceeded to get semi-seriously lost in a maze of logging roads on the north slopes of Cougar Butte. Several promising looking long surface flows of andesitic basalt (?) and andesite (?) on both the north and west slopes of Cougar Butte were fruitlessly explored for caves. A series of very impressive NNW trending, nearly vertical-walled, very high ridges of lava near the upstream termination of the Caldwell trench were inspected and some arm waving undertaken as to their relationship to the NNW trending Gillem Bluff fault and other structural features. After several more fruitless hours of thrashing the mountain mahogany, the party retreated to Tickner-Berthas Cupboard Cave and explored its entire length. Four sleeping *Plecotus townsendii* were found in the cave: two in the upper Tickner section and two in the middle Berthas section. More old gypsum crusts in the lower Berthas section were noted as well. The party then proceeded to Crissy's Cave and found no bats present. Through the monumental efforts of Mitchell and Rogers, the three segments of Crissy's Cave were connected, making it a single cave. The provisional name of Dix's Pipedream for the central section is hereby dropped from the record. Mitchell related how earlier this summer he had squeezed into the eastern continuation of this tube (something neither Mark Perkins [Oregon batologist] nor Pseudo-Sage Rogers could manage) and found it still heading east and steeply dropping through a very, very low crawlway; he did not completely explore this passage. He applied the name Moss Drop cave to the cave and it certainly fits the mossy entrance. A disorderly retreat was made to the West Valentine Distributary trench and the entrance to Cranefly Hole pointed out to Mitchell. A Hearty Family Hike was then made out to Pumice Railway Cave (where no bats were found), Sneet Cave (where no bats were found, but a small piece of breakdown falling on M. Rice's back caused some consternation), and a look at the entrance of the Rollerdom were made. Under lowering skies and rising physical pain the party elected to call it a day and returned to dinner at the Field Cabin.

Tues, June 25: Assembling at the apartments M. Moore, M. Mitchell, M. Rice, P. Rice, B. Rogers and S. Scott drove to the Merrill trench, proceeded down stream, but were unable to find the Ash Pit. Continuing further down trench, the senior members of the party were also unable to find another small cave in the bottom of the trench, so to make up for this inability to find much of anything, another small apparently unknown cave was found by Mitchell nearly 3/4 of the way down the trench on its east side. The group finally assembled at the entrance to Castle Cave and immediately began to survey the cave. Once inside, it was obvious that a short field course in cave survey was needed so Pseudo-Sage Rogers proceeded with same. The survey proceeded without comment, save the usual grouching of the compass operator as to the impassibility of the stations selected by the lead tape person. At the bottom of the entrance room, a narrow slot leading downwards to the northwest was not entered or surveyed due to the consensus of the group that the shifting 0.5 to 1 m boulders one would have to crawl through had the distinct possibility of dramatically moving, thus sealing one inside the passage if they collapsed. Being that this appeared to be a near certainty should the passage be entered, the opportunity was passed by all present. A large, lower level with ice rediscovered (?) by Moore earlier this summer was entered and surveyed. A fair amount of seasonal ice was observed and the vertical stability of many 1-2 m diameter blocks of basalt tested with predictable results: they are large enough to-cause bodily harm and they roll very, very easily. To the sound of chattering teeth, the party left the cave in disarray, stopping only to listen to one anonymous member of the party loudly state that they were not interested in man-handling a sedan chair through the cave for the Token Trip Leader, but were on grape peeling duties that day. The party exited the cave and were immediately pelted with ever-increasing volume and sizes of hail. By the time the group made landfall at the cars, hail the size of garbanzo beans was merrily pattering off hardhats. A general retreat was made and the rest of the day spent recouping from the storm and making a preliminary plot of the map. Moore foolishly accepted a dinner invite from the CRF group and was forced to consume vast quantities of questionable food-like substances. Mitchell declined, instead hiking out to Bat Cave with B. Stouffel in further lowering skies. It is uncertain who got the best deal.

Wed, June 26: The cabin was put in order, the map shown and spirited off for Xeroxing by B. Stouffel, and one last harassing trip made to Moore's domicile to invite her to participate in the late July Bataan Death March Re-enactment Hearty Family Hike. For her part, Ms. Moore entertained the troops by injuring herself on the somewhat unyielding oak furniture. After this an uneventful return to the Bay Area was made.

Lava Beds National Monument by Bill McGahey

My first outing with the CRF at Lava Beds was as informative as it was varied. Marc Sorensen (Jefferson St Grotto) encouraged me to go with him, and although packing 35 pounds across hot lava fields gave me doubts at times, I'm glad he did. We arrived early on Thursday evening and decided to drop the middle, and deepest, of the Fleener Chimneys. I was delighted to find the short horizontal tube connecting it to the southernmost chimney, and disappointed to find the northernmost pit largely filled with rubble.

Friday began with an inordinate compounding of logistical flailing, but we eventually got out to Skull Cave parking lot, and onto the Lyons Road trail. Mike Sims and his group left Marc and I at our campsite near Bat Cave, and we discovered a HUGE Juniper tree half hidden in a deep lava trench while waiting for Bill Devereaux and Bob Martin to meet us. We later measured the base circumference of the juniper at just over 15 feet.

When Bill and Bob arrived, Bill began by explaining the process of our efforts. Features are divided into three main categories: cultural (lumber, graffiti, walkways); biological (bats, droppings, nests); and geological (soil type, lava type, and formations). We discussed the various subheadings the survey includes, allowing us to better aid the cause.

We began our inventories with what we thought was Backbone Cave. It was a 300' tube that dropped steeply to an area of ice containing some very nice crystal formations. The highlight was a marker by J. D. Howard naming the cave Deer Cavern dated 1921.

After evaluating one other cave, we returned to the mouth of Bat Cave and settled in for dinner. At dusk a veritable river of bats began to emerge, and it continued unabated for at least half an hour. I will always remember the eerie sound of thousands of bat wings and the awesome sight of clouds of bats disappearing into deep purple skies, accentuated by the pale full moon rising.

Saturday began with a return to Marc's juniper tree and a survey of Natural Bridge and Skylight Cave the northernmost of caves mapped by A. C. Waters along the Skull Cave trench. Searching further to the north, Bill soon found a large cave about 300 feet long that dipped steeply at the end and had a skylight about half way down. It contained some very large breakdown blocks, and a nice display of remelt features at the far end.

Continuing northward along the trench, I tasted the thrill of discovery myself, when I spotted a large opening at the north end of a sink. An owl flew by upon my entry, but the cave turned out to be a typical tube of about 200' ending in breakdown that showed daylight. Encouraged by Bill Devereaux to give it a name, I called it Willy's Pipedream, since it was not the mile long unbroken tube with multiple interconnecting side passages I still dream of finding out there somewhere.

Pressed for time, we continued our cross country march to the north without much further ado, although we spotted one other large opening that we did not have time to enter. Ranger Pat Toops was waiting when we arrived at Fossil Cave, and by the time Marc and I hiked to the truck and back for our vertical gear, we were all getting tired and a little cranky. But our spirits were quickly renewed when we made the 40' drop into the cave. We had clearly saved the best for last. Pat felt that the ferns growing below the skylight were better than Fern Cave; and the variety of remelt and mineral formations are more beautiful and varied than anything I have seen in 15 years of exploring the monument. Although the cave is only about 400' long we spent over two hours gawking at its subtle splendor. A section of wall had separated inward leaving taffy-like ridges which made me feel almost as if I were watching the lava flow.

We returned to the trucks by the light of the moon, and from there to the CRF cabin near park headquarters. Mike Sims and his crew had found a cave they thought was Backbone containing J. D. Howard's marker naming it Coyote. Marc and I had to leave before they resolved which, if either, of the caves actually was the one now called Backbone.

Helping with this project has given me a better appreciation for the subtle intrigue that lava tubes can provide, and there remains no doubt in anyone's mind that there are still many new caves to be discovered along the trench between Bat Cave and Fossil.

Marble Mountains Aug. 2 – 4, 1991 by Bill McGahey

The crew consisted of Jim & Liz Wolff, Adrian Sears (a research student from San Francisco), Bill Kenney (Jefferson St Grotto), Cindy Wright and myself. Friday morning Cindy and I were wondering if we would have to settle for the clean air and gorgeous views. After Bill Kenney arrived I was getting geared up for a visit to Upstairs Downstairs, but as things finally did unravel, I'm sure it was much more pleasant for all of us.

The trip [to Trail Junction Cave] was just right for me: challenging and instructive without being overwhelming. Meeting Adrian Sears was very nice, and he gave me both the excuse and the confidence to go into Bigfoot Cave. The value of a runner from my lower jumar to my chest box, as [Jim] suggested, became even more obvious in ascending the pit. It was difficult to "thumb" the jumars because of the wet, dirty rope; and being the last man out, I had to drag the rope through the lower [ascender] which was a little awkward and time consuming.

Cindy was also challenged and enjoyed Liz's company on their mapping trip to Skunk Hollow Cave. Her legs look like she's been flogged, but she says she had fun and hopes she was helpful to the cause. My enthusiasm is higher than ever and I hope soon to graduate beyond "tourist caver" and begin aiding the effort of mapping and exploring. It was a wonderful weekend.

Sisson Museum Exhibit by Ray Miller

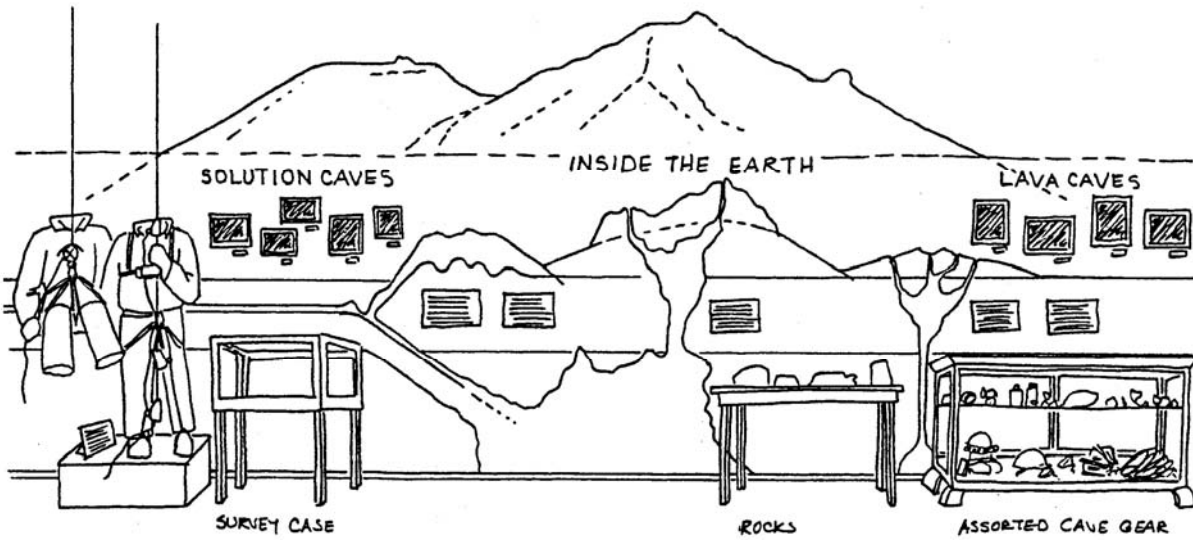
The Sisson Museum is a community museum featuring exhibits on history and natural history. It is located on the state fish hatchery grounds at Mount Shasta. The museum presents well thought out displays rather than the usual accumulation of stuff in dirty, overcrowded and under lit cases common to many community museums. Exhibits are usually changed every two years on a rotating basis. Over the past few issues of the SAG RAG you may have noticed references in the minutes of meetings to an exhibit at the Sisson Museum.

Last fall Glorious Leader Neils Smith, who is a great suggester, thought it would be a wonderful idea for "us" to offer our services to the museum. "We" would design, construct and supply artifacts for a caving exhibit if the museum would help with the construction costs. The museum was planning a new exhibit on the Medicine Lake Highlands, so why didn't "we" combine the two? SAG voted a maximum of \$100 to the project. Work began with Liz Wolff assuming [being "volunteered" – ed comment] the dual role of "us" and "we".

Liz worked up a design for the exhibit and presented it to the museum's Exhibits Committee. Her proposal received a rousing and unqualified Hot D---. After a bit of give and take over wall space and show cases, Liz transformed her concept into reality in the form of a mural over 20 feet long. It is a typical cross section of the Pacific Northwest from the coast to about 200 miles inland. Depicted in vivid colors are the subduction zone, the coastal mountains, a strata-volcano and a shield volcano. Solution and lava caves are depicted. The mural fades into a pre-existing drawing of Mount Shasta.

Forward of the mural are show cases with caving gear and an exhibit of cave surveying. Durable rock specimens are on an open table as a hands-on display. The Audio-Visual machine owned by the museum is used to present a 10 minute narrated slide show that covers cave types, decorations, conservation, safety and bats. Two well used coveralls stuffed with newspaper demonstrate the use of rappelling and ascending devices. The enclosed special edition of the SAG RAG is available as a hand out.

This exhibit is a real grabber. It attracts and holds the attention of museum visitors. The efforts of Liz and those SAG members she enlisted to assist with the grunt work is so appreciated by the Sisson Museum they have picked up the entire cost of the exhibit. I guess what I'm trying to say is GOOD SHOW, GANG!!



Sisson Museum Cave Exhibit

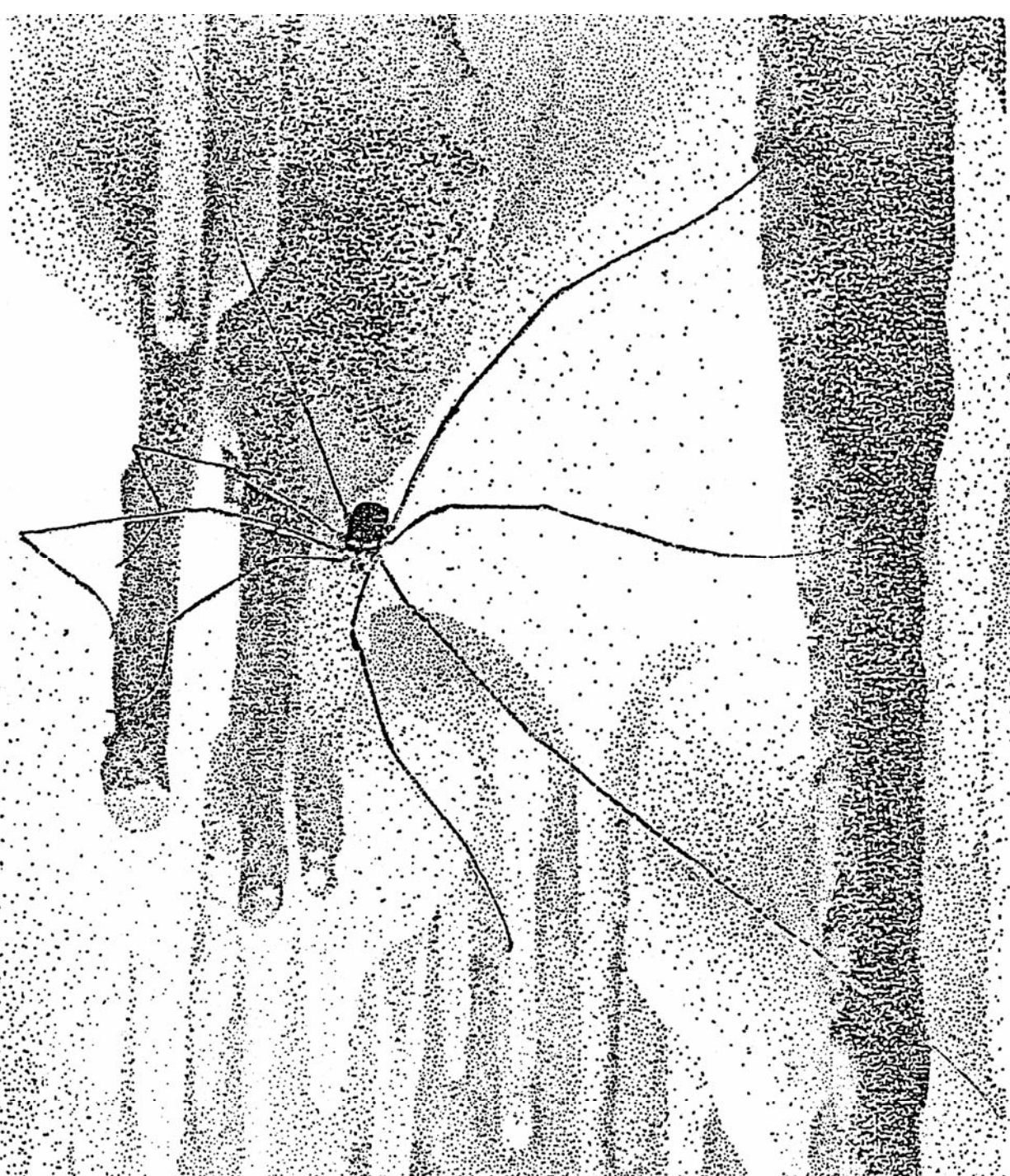
The SAG RAG
 c/o Jim and Liz Wolff
 P.O. Box 865
 McCloud, CA 96057

FIRST CLASS MAIL
 Forwarding and Address Correction Requested

TO:

TABLE OF CONTENTS

Page 2 July and August meeting minutes; Calendar
 Page 3 New editor; Conservation alert; Western Regional meet
 Page 3 Rusty Cave revisited – by Liz Wolff
 Page 4 Kingsley Cave – by Phylis Henderson
 Page 4 Kangaroo Mountain trips – by Bill Broeckel
 Page 5 – by Jim Wolff
 – by Al & Phylis Henderson
 Page 6 USGS and CRF field trip – by B. Rogers
 Page 8 Lava Beds NM – by Bill McGahey
 Page 9 Marble Mts. – by Bill McGahey
 Page 9 Sisson Museum exhibit – by Ray Miller
 Pages 11-14 Special SAG RAG Edition (Sisson Museum visitor handout)



SPECIAL EDITION OF
The SAG RAG
SHASTA AREA GROTTO NEWSLETTER

LizWolff
11-82

Special Edition of the Shasta Area Grotto's Newsletter, The "SAG RAG"

ABOUT THE SHASTA AREA GROTTTO

The Shasta Area Grotto is an international organization of the National Speleological Society (NSS). Our objective is to promote all aspects of caving, including scientific investigation, conservation, safety and fellowship. Shasta Area Grotto members are from southern Oregon and California from the coast to Nevada and from Red Bluff

north. Monthly meetings are normally held in member's homes. Those interested in organized caving are encouraged to contact Jim Kottinger at (916)926-3975, or NSS, Cave Avenue, Huntsville, AL 35810.

Current Shasta Area Grotto projects include cave exploration and mapping, support of scientific studies, conser-

tion and placing and maintaining cave registers.

OUR COVER

The Harvestman Spider, also known as the Daddy-longlegs, adapts readily to limestone caves throughout North America. Drawing by Liz Wolff, member of the Shasta Area Grotto

OREGON CAVES RESTORATION PROJECT: MUD, ROCK, SURVEYING and FUN
by Bill McGahey

I knew we were in for an exciting weekend when I found Chuck (Chaz) Davis pouring water on a couch as I drove up to the lodge at Oregon Caves. An ember from the fire had ignited the cushions, but fortunately he caught it in time. After opening several windows to clear the smoke from the lobby, we settled in front of the fireplace to wait for other cavers. Just after dark, the couch ignited again, and we got a second adrenaline rush while discharging two fire extinguishers.

About that time Liz and Jim Wolff, Neils and Sharon Smith and Steve Knutson showed up, and we got into a conversation involving spontaneous human combustion. This aided in making it a bit merrier when Oregon Caves Head Guide Jay Wofford arrived and announced their Power Wagon (4wd vehicle) was on fire. Some time later we all slept, but at least a few of us slept armed with personal fire extinguishers.

Saturday we were greeted with a sumptuous breakfast and then headed into the cave with late arrivals Dick and Even LaForge and Jay's friend Lisa. We had our arms full of buckets and digging implements. It was a short hike up to the 110 entrance (an entrance closed to the public) and from there a short way to the Spiral Staircase. We worked under the Staircase removing rubble and dirt, and it was fun to see the physical changes our efforts made on the cave. Several passages were widened considerably. A small room was emptied of rubble, and an area of previous excavation was refilled. We dug, filled buckets, hauled, and dug some more until there were no more empty buckets. Coincidentally that occurred at lunch time, so we took our 40-50 pound buckets and

hauled or dragged them in various manners through a stoop passageway back to the 110 entrance.

After lunch, we broke into two survey groups. After an impromptu lesson on keeping the survey book we headed for our starting points. Liz, Dick and I, followed by Evan, mapped several small side passages while Steve, Jim, Jay and Neils worked in another area. Jay led Team 1 to the start of Paradise Alley and pointed out a lead right beside the trail. He told of more wonders and leads down there and left to go survey with Team 2.

Evan, who began the survey with us, crawled into the small hole by the trail and said it didn't go. We knew that, but needed to know how far it did go so it could be added to the map. We re-charted ceiling heights in the main Paradise Alley passage since the efforts of other cave restorers had lowered the floor considerably. They had exposed side passages as well, and I, being of sound mind(?) and good wind, 'volunteered' to crawl, squeeze, climb and otherwise force myself into all the holes Dick and Liz could talk me into exploring. Evan soon surmised that surveying was even slower than photography, and left for greener pastures outside.

We were joined by Jim and Neils when we were about to start on the passage underneath the Grand Column. Down there were crystal lined pools, clear soda straws, pure white formations and one wafer thin flowstone shelf, also pure white, with miniature columns and other formations. The opportunity to see that one passage was worth having to lay face down in frigid mud and survey.

When we left the cave for dinner,

feeling like we had done a day's work, we were rewarded with a delicious roast turkey dinner. The weekend was further enlivened with the presence of the only surviving member of the 1930 survey crew. He told of setting a fire in a "nearby" cave and later smelling smoke in the Ghost Room. Discussion was lively and theories about which cave and where were propounded. The myth and the search goes on!

After a couple hours relaxation in front of the fireplace in the lodge Dick, 'JD' (one of the tour guides), and I went back into the cave to map a small passage JD had found near the Spiral Staircase. It was a tight U-shaped passage, and contained the most delicate soda straws I have had the pleasure of lying next to. Sleep came easily to me that night.

Sunday began with another excellent meal, and was followed by a lengthy political discussion between Dick and Steve. Jim and I finally convinced them (with pantomime) to continue their dialogue in the cave, and we got our last trip underway. We began by taking some measurements along the River Styx to reflect recent restoration work. Similar data was collected in two other places on the way to the Ghost Room. From there, Steve led us to the Bone Room. The intrigue of this crawly, blocky breakdown laden area of the cave was excelled only by the conversation with my companions.

It was a rare privilege for me, and a weekend of memories I will not forget. We did so much work, so fast, that the Monument wants us back. Who else will work hard for peanuts (or turkey and dressing) and enjoy it? So long as we are fed we will do almost anything!

Special Edition of the Shasta Area Grotto's Newsletter, The 'SAG RAG'

DIXIE'S BACK IN TOWN, OR HANGING AROUND WITH A BATLADY
by Liz Wolff and Ray Miller

Dixie Pierson was back - the world class bat biologist from U.C. Berkeley. The only person known to science who needs to sit in the dark on a pile of bat guano periodically and get a "bat fix". We have never visited her home, but we are willing to bet she keeps bats in her closets. When she travels she is worse than a new mommy taking out her baby. Two tons of gear to find an 8 gram (1/4 ounce) critter.

Her trip was a hurry up affair. As always she had more things to do then time to do them in, but while in the area she wanted to check the nursery colonies of Plecotus bats we had reported. The project we are assisting her with is a long term study for California Department of Fish and (non)Game to determine bat population trends.

If you think white lights impart an eerie glow in a cave try moving through a cave using a red light. A red light is less disturbing to bats. On Friday, August 19, we used red lights to locate a nursery colony, and then left to set up night vision equipment at the cave

entrance. This device, commonly known as a "star scope" was developed for use in Vietnam (at least something good came out of that conflict). It's a fantastic system with only one minor flaw - The price tag is in the rather exclusive neighborhood of 8 thousand bucks.

Sitting in the dark, watching the eerie green glow in the star scopes, Liz and Dixie counted 304 bats that exited, with more flying in the cave that never came out. The young spend 2 or 3 weeks careening about the cave learning to fly before venturing out into the wide open spaces.

Monday, August 22, was a long day. We started by checking a colony south of Medicine Lake. There were about 200 bats. After eating lunch in a cool cave entrance we checked it, and then another cave for possible bats, drawing a blank in both locations; finding only moth wings that indicate bats had been there. Plecotus are moth-eating bats, but they spit out the wings. A messy habit, but useful to those trying to study bats.

We ended the day north of Mount

Shasta where we really hit the jackpot. The bats started flying at dusk, and it was some 2 hours later when we finally quit counting. Our educated best guess was a few over 700 bats, with an accurate count out of the question due to a very large cave entrance which allowed the bats to spread out too much. In any case, a super large bat batch. The mothers were flying in and out trying to entice their young to go out and hunt bugs, so we had to subtract as well as add to our bat count. The kids added to the confusion by getting into the traffic pattern, shooting landings, and sometimes bouncing off the walls. All the bats would divert from their normal route to come over and indulge their curiosity about us.

It was past midnight when Dixie and Ray arrived at his house where she was a house guest, and you will never guess what Dixie found swirling past the yard light... Yep, bats. So there they were in the wee hours wandering through the yard, attic and storage shed with a sonic bat locator. The resident owl was saying 'DUMB' instead of 'WROO'.

CLEANER TODAY

By George Reel

Jim Kottinger and George Reel went caving Sunday afternoon. It was prearranged that they would introduce a group of young people from Yreka to the underground world of lava tubes. When making arrangements with the group leader we expected he would bring along 8 to 10 youngsters. As Jim and George approached all they could see were heads; many, many heads bobbing around outside the cave waiting for us. Our 10 had turned into 20, including many adults. All were covered with some sort of head gear and carried 2 sources of light. They had been warned this was a prerequisite for going into caves. Very good so far.

While Jim was placing a ladder in a cave entrance I (George) was giving a safety and cave preservation speech to the group. I wish I could remember what I said, for as we came out of the first cave we filled a 33 gallon garbage bag with trash the group picked up. They also filled a large cardboard box with trash from a second cave. We had also talked about bats and that some species hibernate in caves. We told about the bats that were removed from a cave last year by some boys who turned them loose in a Weed supermarket, and that all the bats had to die because of that prank. We were not sure if we would see any

bats or if the colony had been destroyed. I'm glad to report there were hibernating bats. Unable to say just how many, but I would guess 25-30. From our talk bats became interesting rather than something to fear. All the bats were treated with the utmost respect, and great care was taken by all not to disturb them.

Both Jim and I enjoyed the trip, glad to have gone with this group, and would be willing to take them on another trip to another cave. Because of this group our cave system is a little cleaner. No! A lot cleaner for their having been there.

Special Edition of the Shasta Area Grotto's Newsletter, The "SAG RAG"

1989 CAVE MANAGEMENT SEMINAR
by Liz Wolff

The Cave Management Seminar was hosted by the USFS and the American Cave Conservation Association in Bend, Oregon. The setting was plush, and the coffee, tea and muffins were plentiful. The meetings were informative, covering subjects from Archaeology to law, gates to biology. Most of the people there worked with the USFS, BLM or Park Service. Some were cavers. The purpose of the seminar was to acquaint land managers of cave geology, biology, archaeology and the new Federal Cave Resources Protection Act.

The first topic explored was the role of federal agencies in cave management. The Federal Government owns many caves and is now required to manage them in some way. Many agencies don't know where their caves are, what to do with them, or how to manage them. The geolo-

gy of caves, specifically lava tubes, was explored. Then Archaeology was uncovered for the attendees. After lunch the legal aspects of cave management was covered, including liability and risk management. Horror stories were told, and it was discussed how lawsuits brought by accident victims could have been avoided. Then bats and their need were discussed. After a short break we were told how management plans could grow from recreational use into true management, and management success stories were related.

Wednesday morning hydrology and biota were scrutinized by Tom Aley of the Ozark Underground Laboratory. Cave gates, their construction, purpose and function was the topic of a biologist. Air circulation, movement of water and the biotic community, and restriction of

human passage were all parts of the talk. Wednesday afternoon was taken up with the new cave protection law itself, the reason for it, and how to implement it into the land use planning process. After that we had a skull session on strategies for developing cave assessment plans. The whole group divided into smaller groups and discussed specific problems on their districts or parks, and how to solve them. A question and answer round table followed, with the writers of the Cave Resources Protection Act.

Thursday we visited Lava River Cave, a semi commercial cave off Highway 97. Before entering the cave the ranger on duty gave a brief history of the management: mistakes, ways that problems were handled, and successes; while we all stood in the falling snow.

SONIN 60 ELECTRONIC DISTANCE MEASURING INSTRUMENT - A Users Report
by Ray Miller

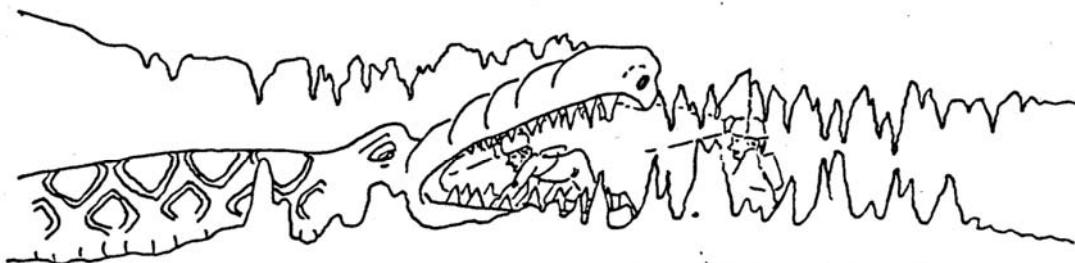
There was a report in another publication giving the Sonin 60 Electronic Measuring Instrument (EDMI) "rave review". Hopefully before all cave surveyors run out and plunk down their eighty or so dollars, they will listen to another opinion.

The Sonin 60 EDM works like a box of bats with a calculator. An ultrasonic pulse goes out, and the echo is timed and converted to distance. As long as the "read" button is pressed the EDM updates 4 times a second. Distances in

feet or meters can be added, subtracted and multiplied to give area and volume. So far great, but the receiver is not directional enough to be an asset to cave surveyors. A projection or undulating surface makes the thing go ape, probably due to extra bounces of the signal. As each sample of the timed return is displayed, differences of over 100% are often encountered. I have had good results in caves with flat walls, but there are sometimes hard to find.

The Sonin 60 really comes into its own getting ceiling heights in large lava tubes.

Sonin also produces a Model 150 which uses a slave unit at one station and a master unit at another. Its range is 150 feet, and its price is \$134.95. Calling the company convinced me this instrument would also be unsuitable for caves. They claim obstructions within 35 degrees of line-of-sight will confuse the instrument. Sonin can be reached toll free at 1-800-223-7511.



AFTER YOU GET PAST THE STALAGMITES
IT'S AN EASY PUSH!