Cascade Caver

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Cascade Caver

CASCADE GROTTO

Volume 47, Issue Number 1
January/February 2008

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Membership in the Cascade Grotto is $15.00 per year. Subscription to the *Cascade Caver* is free to regular members. Membership for each additional family member is $2.00 per year. Subscription to the *Cascade Caver* is $15.00 per year. Subscription via email is $11.00 per year. Members can save $4.00 per year by subscribing to the e-mail version of the caver

GROTTO ADDRESS

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MEETINGS

Regular grotto meetings are held monthly at 7:00 pm on the third Friday of each month at the Shoreline Community Center in the Hamlin room. The Community Center is at 18560 1st Ave NE in Shoreline.

Please see the back cover for directions.

COVER

This month's cover was shot by Ron Zuber. Marla Pelowski "Descends!" into Silver and Gold cave at the Lava Beds National Monument 2007 Western And NCA Regional.

Upcoming Events:

- CAVE RIDGE
  JUNE 21, 2008
  CONTACT KARI DOLLER
- MT. ST. HELENS CAVING
  JUNE 21, 2008
  CONTACT KIM LUPER
- ROCKY MOUNTAIN REGIONAL
  JULY 4TH-6TH 2008
  LEADER: HOLE IN THE WALL GROTTO
- NSS CONVENTION
  AUGUST 11-15, 2008

Inside this issue:

Chairman's Corner

March 25, 2008
By Kari Doller
Cascade Grotto Chairman

I have been promising our esteemed Caver editor a chairman's column for over a year, so with no further ado, here it is.

Over the last year and a half, we have said hello to new friends and goodbye to old. We have helped prevent the demise of a cave that houses and protects bats, and joined forces with a team searching for new bat homes in need of protection thanks to the coordination of Chris Anderson. Many of us have even been able to experience our fine unfeathered friends up-close and personal thanks to Barbara Ogaard and Ron Zuber. Our vertical chair and secretary/treasurer Tom Evans, with the help of Dave McElmurry, has uncovered the opening of a potentially great cave (keep digging Tom…I believe in you). Danger cave has been mostly resurveyed thanks to the leadership and guidance of Michael McCormack and various willing assistants. Some of us have been able to experience a rescue first hand while others were able to offer support during the process, and we came out with a mighty fine story if I do say so myself (don't worry Michael…you'll get that one eventually).

In the upcoming months I would like to see us all work together to continue bringing new friends to the group, discovering new adventures, and revisiting old favorites. I am looking forward to spending the next year as your chairman. Together we will make this yet another great year.

University of Scouting, 2008

By Ron Zuber

Cascade Grotto cavers shared caving knowledge and expertise with boy scouts. The University of Scouting attracted 427 scouts with their leaders and parents who attend a variety of scouting activity and leadership classes. This was the Cascade Grotto's second year of participation.

Six cavers, Hubert Shen, Mark Sherman, Tom Evans, Aaron Stavens, Dan Crape, and I spent an entire Saturday in January at the Haller Middle School in Arlington, Washington. We displayed caving gear, books, NSS News, and other related caving stuff. Dan Crape brought the cutest mannequin of a little caver complete with helmet, lamp, coveralls, boots, kneepads and rope. For scouts nearly the same size as the mannequin this was a very big hit.

The day before the event I rigged three ropes from the gym's roof beams so Single Rope Techniques could be demonstrated. Some of our Grotto members don't need much coaxing to play on rope in the comfort of an indoor gym. I rigged a 300-foot rope so cavers could do longer climbs as desired. It didn't take long for the 300-footer to humble some vertical travelers. It must have been either the elevation or warm indoor temperature that slowed the caver's defiance of gravity up the rope.

Hubert Shen tweaked his ropewalker system. Evans and Stavens provided some comic relief while practicing vertical rescue techniques. Mark Sherman moved gingerly with a sore back while talking with scouts and answering questions. Discussing caves and caving with scouts proved rewarding for each of us when we saw faces light up with the knowledge that they too can explore caves.

DISCUSSING CAVES AND CAVING WITH SCOUTS PROVED REWARDING FOR EACH OF US WHEN WE SAW FACES LIGHT UP WITH THE KNOWLEDGE THAT THEY TOO CAN EXPLORE CAVES.

Our main goal was to communicate safe and soft caving to boy scouts, leaders and parents and to demonstrate SRT. We handed out information that can help scouts inform themselves about caves and caving. We also offered to assist groups of scouts truly interested in the topic.

Aaron Stavens brought his big 600-foot coil of PMI pit rope. That's an impressive chunk of rope for anyone especially a young and impressionable boy scout. We held a drawing this year with Cascade Grotto water bottles as the prizes. We asked each boy to lift the rope and guess its length and weight. Some of the boys could barely hang on to that nylon highway. The first scout must have been brighter than me because he guessed "about 180 meters and about 30 pounds." "Duhhh," I said, "this game is not as hard as I thought it would be. And these boys are a lot smarter than some of us cavers." As most cavers know 600 feet of 11mm PMI Pit Rope is 183 meters and weighs 29.85 pounds. All other guesses were all over the place, helping us to feel a little more secure with our knowledge.

The University of Scouting organizers and participants are grateful to us for our participation. Each year our booth and demonstrations have been voted among the best, most informative, and interesting. Some scouts may get involved in safe and soft caving thanks in part to our efforts.

Hawai'i Expedition 2007, Part 2

June 9, 2007
By Jansen Cardy

It was Friday February 23, and I was underground on the Big Island with the Cave Conservancy of Hawai`i. Ann Bosted, Norm Thompson and I were getting started on our phase of the Lani Kai Cave survey project, squeezing our way through the dug-open constriction that marked the end point of previous survey efforts. We found ourselves in nice passage heading *mauka* (uphill), mostly walking but with occasional breakdown to negotiate. There was a slight delay while 'somebody' who forgot the tape quickly scampered back to Don Coon's house to retrieve it. The survey finally got under way, with Ann sketching while Norm and I ran tape and instruments. We didn't sacrifice accuracy for speed, nor did we skimp on our photo-taking breaks. It was well after dark when we finally made it out. When the next day dawned we were right back into it, with the addition of Chris Beck making up the fourth member of our team. Starting where we left off, we continued surveying up the passage. We soon reached an impressive lava ball loitering in the middle of the passage, which we measured at about 30 feet in circumference. After taking many photos using a multitude of flashguns, we surveyed our way a couple of hundred more feet straight into a dead end. That abruptly signaled the conclusion of this project, after us adding over 600 feet of passage to a cave that now totals 3,442.8 feet.

Ann Bosted and Chris Beck with the giant lava ball in Lani Kai Cave

Don Coons poses for a photograph in Lani Kai Cave

On Sunday, Norm, Chris and I went to check out Free Fall Cave. Located in a neighboring subdivision, it features a narrow vertical entrance

Don Coons inside the picturesque entrance to Lani Kai Cave

rigged with an aluminum extension ladder tied in place. The cave earned its name the first time it was explored by local cavers, when Rose Herrera had been hit by a falling rock that knocked her off the ladder. She was lucky not to have been seriously hurt, and managed to safely exit without medical assistance. We climbed down the ladder and headed *makai* (downhill), choosing a large side lead to start our survey with Norm manning the sketch book. Chris had his laser Disto with him, making distances significantly easier to measure in this mazy area. This was to be a short survey day, with just a few hundred feet of passage added. The next day a bunch of us kept busy helping Don work on his house, and assisting Jack Vose construct an information kiosk on the nearby CCH preserve property. On Tuesday Ken Kloppenborg and I made the final trip of the season back into Misery Maze. Even with prolific side leads still branching everywhere, we wanted to see how far we could go *makai* in what resembled the main trunk. It was tough sur-

Chris Beck crawls over some smooth lava in Free Fall Cave

veying with just two of us, especially since I was also forced to use my fledgling sketching skills. We added another staggering 114 feet of length, before it finally pinched out in a nasty passage I dubbed the Miserable Conclusion Crawl. With more side passages left to survey, this area will still be on the menu for future survey trips.

Don Coons at the edge of Owl Pit, an impressive void in the lava landscape (Top Left of the pit)

As the month of March began on the Big Island, the pace slowed a little for me. I took a few days off from caving to spend some time with my wife Stacey (a non-caver) who was visiting. This had the effect of extracting a few of my fellow cavers out of the ground and away from their survey projects, in favor of joining us for a little snorkeling and sightseeing. With water temperatures in the high 70's and world-class coral reefs and tropical fish, why not? Plus some people apparently get excited about visiting plantations and tasting coffee on the Big Island. Go figure. After Stacey had left again, ten of us decided to hike to a remote beach a few miles from where we were staying. The interesting thing about this place Pohue Bay is the abundance of petroglyphs that cover some of the ancient trail we were following. So even without a swim, it was still a day at the beach to be remembered. On Tuesday March 6 it was time to dust off the vertical gear and go caving again. Six of us packed into a couple of cars, and headed off to Owl Pit. Relying on my GPS to tell me which way to hike, my arrival at the edge of this pit was sudden and breathtaking. It's not enormous in a Golondrinas kind of way, but it's still impressive. We rigged off a couple of convenient trees, and dropped in for a look.

Snorkling with the Honu (sea turtle) at Pu'uhonua O Honaunau - the Place of Refuge

Because life can't all be fun and games, as soon as we were down the pit out came the survey book and instruments. Although this wasn't quite virgin territory, the previous explorers had neglected to survey it. With Don Coons sketching, I shot compass, clino, and the disto while Bruce Dunlavy set stations and provided a target for me. We successfully worked our way around the 300-foot-plus perimeter, despite some difficulty aiming the laser a few times in direct sunlight. We then climbed down into the darkness at one edge of the pit, negotiating a maze of breakdown that lead to a large sloping chamber containing

Don Coons makes a sketch of Owl Pit while Sharon Jones climbs out

CAVERS GUIDE TO HAWAIIAN

***ANA*—**CAVE
***MAUKA*—**UPHILL
***MAKAI*—**DOWNHILL
HONU—SEA TURTLE

lava helictites. We finished surveying for the day, and I shot a few photos before heading back up into the daylight. Meanwhile the others had kept themselves busy bouncing the pit a few times – including our visiting gentleman from the South, Mr. Marion O. Smith. Marion is reputed to hold the record for the most in-cave vertical miles, apparently over a hundred in his lifetime so far. He kept the rope warm waiting for us with some additional help from the last two members in our group, Sharon Jones and Chris Beck. I thought I was the last one to drag myself up the rope, but in true style Marion jumped back on and bounced the pit one more time before totaling up his footage and heading out.

Additional photos of these caves can be found on Peter and Ann Bosted's website:

http://www.cavepics.com/
(Hawaii, February 2007)

Lava helictite in the dark depths of Owl Pit

Not Just Knots: The Petzl Pantin

May 16, 2007
By Thomas Evans

The Petzl Pantin, it is a small foot ascender affixed to the foot through a webbing harness. It has gained a following in Europe, where Frog applications are quite common. When I first ran across this ascender I thought it was a brilliant idea: a small, light weight ascender that can be kicked off and on the rope and has the potential to be a fast on and off rope device for a rope walker system, or a back up point of attachment for other climbing systems.

The Petzl Pantin from en.petzl.com

Petzl has made a quality product. The cam housing is small, just large enough to do the job and the cam action is very easy. I was originally enamored of it even though it is not a safety device. Putting on the Pantin was easy if a bit awkward. I realized quickly once ascending that I had a hard time keeping the Pantin on the rope. It slipped off the rope easily and frequently while I was climbing. Kicking the Pantin back on takes some practice, and I never really learned how to do it.

It is possible that the poor performance of the Pantin for me was purely due to my particular form. I saw more than one person climb without the Pantin coming off the rope. But for me I find it awkward and not the equal of other ascenders.

In its favor the Pantin is small, light weight, easy to get and use, and can be kicked on to the rope as claimed. These are all great qualities that, to me, are outweighed by its negatives The attachment straps thinner than I might have used. This may make it a short lived assembly in muddy and harsh conditions. For beginners, who need equipment that works regardless of form the Pantin fails miserably. As a beginner, I could not get it to work well at all. It ended up creating more problems for me on the rope, which could be dangerous for a new caver in a cave. Finally the Pantin is really purpose built to be a foot ascender. It can not be detached and used for hauling, or as a PCD (Progress Capture Device) for a rescue rig. It can really only be used as a right foot ascender due to its lack of clip in points and their size. This lack of mulifunctionality is its largest weakness.

In addition the side of the foot placement of the caming device imparts a roll to the foot on each step up if you are not paying attention. On long drops this could create a great deal of pain or discomfort, and is largely the reason why other climbing systems switched to mounting the foot cam above the arch of the foot. Lastly, the big selling point of the Pantin is it's easy on and off rope abilities. I found this personally to be a drawback in practice since I could not keep it on the rope. I would prefer an ascender that stays on during contortions on rope rather than popping off at the first irregular motion.

All in all I do not recommend the Pantin as an integral portion of a climbing system. It does exactly what it is advertised to do, and quite well for those who can use it. In my opinion, the function of the Pantin can be replaced with a stronger, more reliable ascender, that can be removed and used for some other purpose in a pinch. In a Frog System a Pantin may not be necessary while using good form.

The Pantin is not designed to be used as a primary or backup ascender. It can, however, be used as a climbing aid (with some practice). As always, don't just take my advice, go out and try it for yourself!

Pros:

- SMALL/LIGHTWEIGHT
- WELL CONSTRUCTED
- READILY AVAILABLE
- CAN KICK ON AND OFF ROPE

Cons:

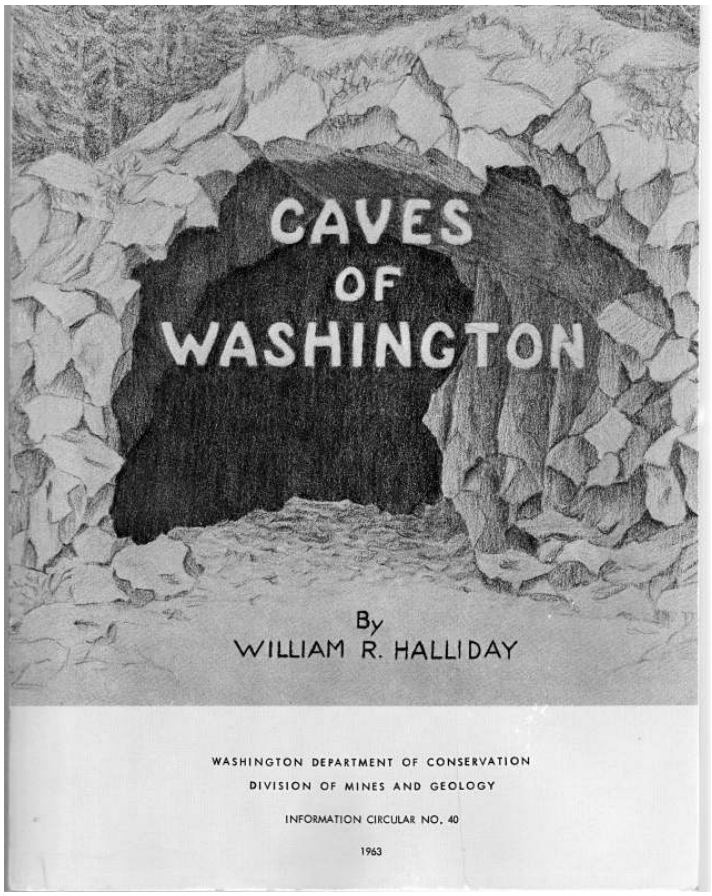
- ATTACHMENT WEBBING TO THIN
- NOT A SAFETY DEVICE
- SINGLE USE ONLY
- CAN BE DIFFICULT TO USE

Three Mile Creek Not Quite Three Miles – Yet.

June 13, 2006
By Dave Decker

Dr. William Halliday mentions this small cave in his book *Caves of Washington (1963)* saying, "The cave is not extensive. The single, roomy passage measures about 70 feet in maximum length, although local rumor indicates that originally it was much longer. These reports claim that the cave was partially choked with mud and reduced to its present size within the memory of old-timers still living." In the last paragraph Dr. Halliday states, "Excavation of the fill at the rear of this cave might prove of unusual speleologenetic (sic) interest."

When I first entered this cave nearly 50 years later, I was struck by the accuracy of Dr. Halliday's description. The cave is located on a steep hillside east of Lake Shannon in an ugly clear cut typical of the logging interests of the region. Thankfully, loggers left a small stand of trees near the cave entrance, although the upper sink was left bare and filled with logging slash. In the years since the area was logged, tons of surface debris has washed in through this upper entrance filling the back of the cave and blocking any continuing passage.



Through a close inspection of the entrance room, I concluded that the cave does continue into the hillside beyond the debris pile and extensive digging may lead to more passage. The reasoning behind this conclusion is that at the base of the debris pile on the north side of the room, a one-meter phreatic tube penetrates the fill for approximately four meters before finally being filled in. Taking a step back and examining this tube leads me to believe that it's part of a larger feature that continues beneath the fill and possibly further into the hillside. Other features of the room support this theory:

1. The breakdown pile at the entrance seems to have blocked the small seasonal stream that flows out of the cave, which normally would remove most of the fill coming in from above forming a sort of settling pond. This leads me to believe the actual level of the cave floor could be anywhere from a meter to two meters below the dirt comprising the current floor level. If this is the case, the entrance room is much larger in volume than it appears and must have had a substantial amount of water flow sometime before the Everson glaciations.

2. Looking toward the back of the cave, there are three areas that could lead to a continuation; the phreatic tube mentioned previously, a larger ceiling level passage in the main trend of the cave (which is most likely the central conduit) that is almost completely blocked by surficial fill, and a narrower passage on the south side of the room that has been the concentration of several digging trips. All three areas trend down in the general direction of the dip of the limestone, any or all of which could be indicative of roof features in a larger passage that has been filled in.

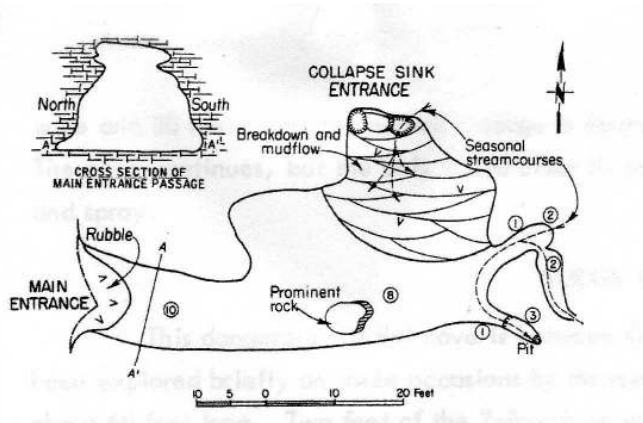


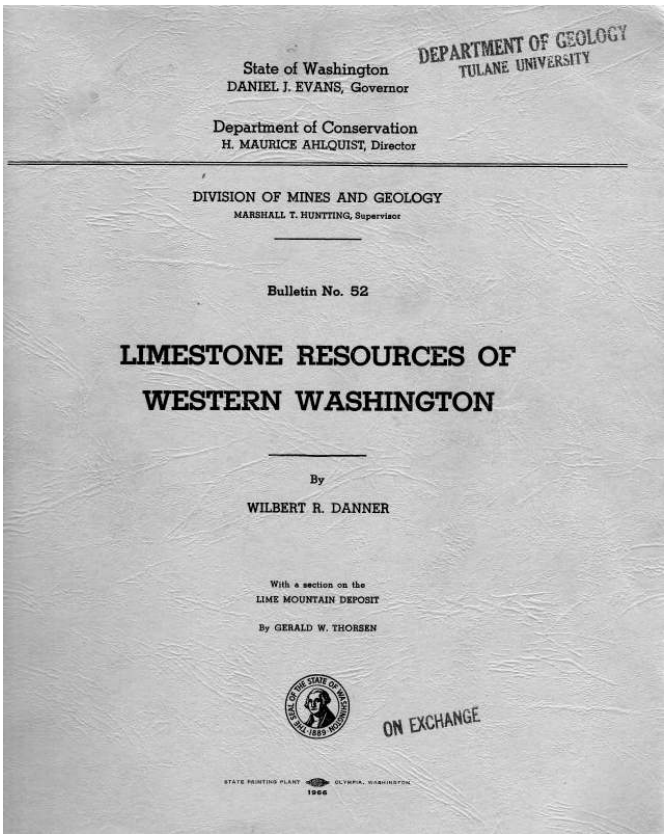
Figure 49.—Three Mile Creek Cave, Skagit County. Survey by Cascade Grotto, National Speleological Society. Additions by William R. Halliday, Washington Speleological Survey, 1956.

3. A small stream that issues forth from below the breakdown pile several meters west of the entrance is approximately two meters below the current floor level of the cave and is running clean and clear. There is no indication of the stream in the cave with the exception of an overflow channel in the northwest part of the room that disappears beneath the rubble and is floored by soft stratified sediment. The incised slots in this area mentioned by Halliday are no longer visible due to the infilling from the sinkhole.

In *Limestone Resources of Western Washington (1966)*, Dr. Wilbert Danner suggests the limestone deposit that contains the cave could be much larger than suggested by its limited exposure at the quarry face.

At least four trips have been made in an attempt to determine if there is more passage to be found, all by Cascade Grotto members. The first two trips succeeded in digging a two meter deep, one meter diameter pit at the back of the southern passage. A lot of fill was removed during each trip and dumped near the entrance where it was either redistributed or washed out of the cave by the overflow of the seasonal stream. On the third trip, I noticed that the passage continued to the east on the wall of the dig and within minutes over 1 cubic meter of dirt was moved and a passage defined heading east and down following the dip of the limestone. Excited by the possibility of a breakthrough, several diggers moved another 5 cubic meters of dirt over the course of a couple of hours following the trend of the passage. As the dig progressed, the emerging passage was wider at the bottom than at the top, seemed to be turning to the north toward the central conduit noted in the above paragraph and seemed to have a substantial amount of fill below where the diggers were working. Sooner than expected, the dig had to be terminated due to prior commitments, so all the diggers packed up and headed back to the cars. Excitement ran high and a return trip the following weekend was quickly planned.

A week following the discovery of "going" passage, three of the diggers from the previous trip and three more Cascade Grotto members resumed the excavation. They determined through removal of another foot of dirt from the "floor" of the passage that they were working at the ceiling of whatever might lie below. Several garden stakes had been brought to the cave to probe the fill and determine which direction the passage would progress. Each progressively longer probe was pushed into the floor as far as the handle proving that there was much more digging to do. As the removal continued into the newly found passage, it turned back to the east where another 3 cubic meters of earth was removed and a "going" dig was left for the next time, still heading east and down. The newly dug passage is now approximately 5 meters long, 1.3 meters high and varies from 30 cm at the ceiling to just over 60 cm at the floor. A large speleogen 66 cm wide, 1.3 meters long and 33 cm deep has been unearthed along with several large broken pieces of another speleogen. At the bottom of the pit where the passage was dis-



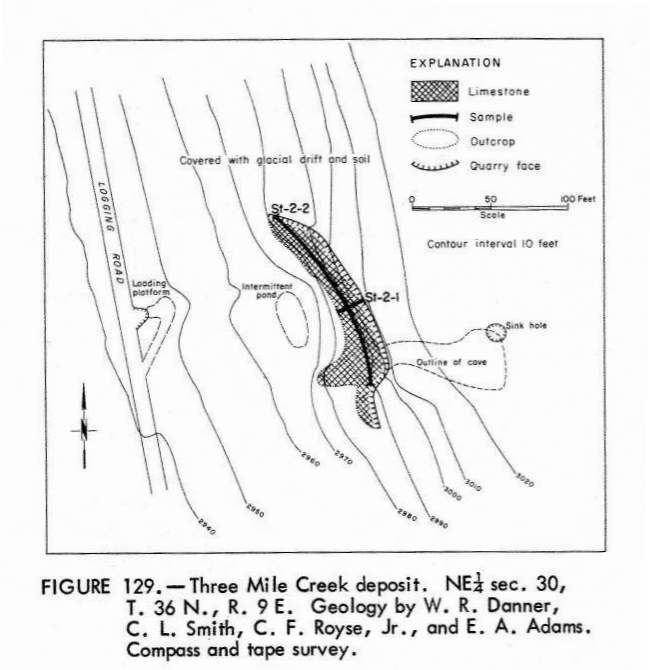


FIGURE 129.—Three Mile Creek deposit. NE¼ sec. 30, T. 36 N., R. 9 E. Geology by W. R. Danner, C. L. Smith, C. F. Royse, Jr., and E. A. Adams. Compass and tape survey.

covered, an 18 cm layer of almost white clay with another 5 cm layer of orange oxidized clay above it has been found. Two explanations for its origin have been proposed. The first is glacial outwash, which means the layers being dug at this point have been in place for at least 10,000 years. Alternatively, dissolved limestone has settled out to form the beginnings of a new layer of limestone. If this is the case, it may mean there is more passage beyond the blockage. No bones or other debris has been found in the fill at the back of the passage. During removal of the dirt near the ceiling, several air pockets were found ranging in size from 25 cm long by 12 cm wide to roughly 65 cm long by 30 cm wide. In the last air pocket, a Springtail was noted running around before it disappeared through a small crevice.

The method being used at the dig is a combination of digging, transport, removal, and disposal. The digging at the face is being accomplished by either trowel or trenching tool, depending on the current size of the passage and the type fill being removed. The type of fill so far includes lightly packed dirt, sand, and dense white clay. The transport stage consists of pushing the dirt away from the dig face with hands and feet by the digger with a second person behind using a small shovel to remove the tailings as well as continue the dig down into the floor. Removal is accomplished by dumping the dirt into a bucket that is hauled out of the pit by a third person, who dumps it into a small sled rigged to a haul line. The sled is pulled through the south passage up into the entrance chamber where it is dumped into another bucket and disposed of by a fourth person, either in the chamber itself or outside the cave entrance beyond the breakdown pile if there is a fifth person to help with the disposal.

The other two areas noted as possible dig sites, the central conduit and the phreatic tube on the north side of the entrance room have not been dug for one simple reason. They are both directly under the sinkhole and any digging done in them could possibly result in a collapse of the debris slope on top of the digger. If the current dig comes to a stand still due to reaching the water table or running into solid rock at the dig face, putting up reinforced walls to hold back the debris slope while digging is a possible as long as it is done correctly. It is my opinion that the central conduit provides a better chance of a breakthrough into going passage than either the north phreatic tube or the south passage.

Remains of what might have been a still have been removed from the entrance chamber. Two rusted cans and several short lengths of copper tubing were found lying near the entrance amid several five foot long, one foot diameter logs that had been brought in to the cave to be used as benches.

Hundreds of dead mosquitoes were found in the south passage during the last two trips. It appears as if they were imbedded in the limestone. My theory is that the remains of dead mosquitoes are "absorbed" into the wall as condensation covering the carcasses moves into the pores of the rock through capillary action essentially "sucking" the mosquitoes into the wall.

Appendix 1: Participants

Trip 1
July 28, 2002:
Dick Garnick
Rose Garnick
Aaron Stavens
Kaylie Stavens
Mike Fraley
Bob Brown
Eve Proper

Trip 2
May 4, 2004
Aaron Stavens
Hester Mallonee
Renato Dalle Mule
Unknown

Trip 3
October 11, 2004
Dave Decker
Hans Kimm

Trip 4
May 14, 2006
Dave Decker
Aaron Stavens
Kari Doller
Ron Zuber
John Nestor

Trip 5 (20 May 2006)
Dave Decker
Aaron Stavens
Kari Doller
Hester Mallonee
Dan Crape
Ed Friant

Appendix 2: Wildlife Present
(This list is inclusive of all trips the author has been on.)

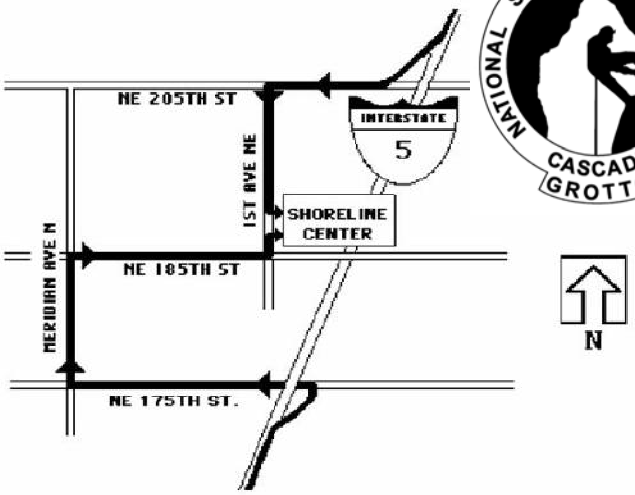
Bald Eagle
Raven
Brown Bear
White Tailed Deer
Cave Crickets
Harvestman Spiders
Mosquitoes
Springtail

Sketch of Three Mile Creek Cave believed to be by Dick Garnick

The Cascade Grotto meets at 7:00pm on the third Friday of each month at the Shoreline Community Center, 18560, 1st Ave NE in Shoreline.

To get to the Community Center from Seattle:
Take Exit 176 on Interstate 5 (175th St. N) and turn left at the light at the bottom of the off ramp. At the next traffic light (Meridian Ave. N) turn right. Turn right at 185th St. N (the next light). Turn left on 1st NE, which again is the next light.

The Community Center is on the right. Don't get confused with the Senior Center, which is on the end of the building. Enter the building on the southwest corner and find the Hamlin Room.



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