

Field Trip to a Dummer, NH Road Cut and Iron Mountain

Bob Wilken, text
Tom Mortimer, photos

Several MMNE club members had been talking of taking a trip to Iron Mountain in Bartlett, NH for nearly three years. But, it just never happened. I recollect how Merry Porro was so enthusiastic and eager to go. I don't know the number of e-mails that I received from her on the subject! She was **ready!** Unfortunately, it never happened. For this reason she was in my thoughts on the long climb up the mountain.

If I had had my way I would have dragged my feet and found reasons not to do the trip again this year. The reason for this probably was the daunting nature of the climb to the mines. Tom got assertive though and proposed that we do it as early in September as possible. For a variety of reasons it still didn't happen until Sept 21-22. Tom researched info in the U.S. Bureau of Mines "New England Beryllium Investigations" and plotted GPS waypoints based upon UTM coordinates in an article by Alan Plante. He determined where the trailhead was, all the directions to get to it and the location of each of the adits on the mountain. After all, he **is** an engineer! I did the easy part researching lodging for one overnight and booking the reservation. Otherwise I was a casual navigating consultant in the car

In my mind the reason for overnight lodging was to get up to Bartlett the day before to scout out the area and to be ready for an early ascent to the mines. Tom was confident he had everything set, so he had other ideas. He had visited a Route 110 road cut in Dummer, NH back in the late '80's and indicated that there were "interesting things" to be found there. Regular collectors have known the location for years as a source for very nice octahedral pyrite.

So, Tom and I arrived at the Villager Motel in Bartlett around 1PM. We quickly dumped our overnight essentials and headed north up Route 16 toward Berlin and Dummer. After so many years Tom wasn't exactly sure where in Dummer the road cut was. From Route 16 we traced westward over 110A and found no road cuts. The only other possibility was a short section of 110 in the southwest portion of the town. Sure enough, we came upon several exposures on each side of this road. Tom quickly remarked that the road was considerably wider than he remembered it and he lamented the missed opportunity of the road-widening project.

Gear in hand, we set out to explore the exposures. They mostly consisted of a very hard, highly metamorphosed silvery phyllite. There were quartz seams – some solid and others, pockety alpine seams occasionally filled with calcite. In certain places the rock showed hints of green color due to the presence of what I would call very minor epidote. Here and there we could see iron staining due to pyrite. Tom quickly found the remains of the octahedral pyrite digs. But I was interested in micros, not thumbnail pyrite, so we headed off up the northeast side of the road to look for the things we couldn't see. We each settled in at a prospective quartz seam and chiseled out bits and pieces as best we could. Then we moved on down from one place to another sampling the whole way. After about two hours we each had an abundant amount of rock to take home.

Now it seems I had the "Dum" mer luck of finding something at the Rt 110 road cut. Tom has indicated that all of his material went in his chuck-bucket. My finds consisted of a scant number of yellow titanites, red rutiles, two or three hematite xls, , a fair amount of adularia and lots of chlorite balls. Etching the calcite out of quartz seams revealed some of these finds.

Early the next morning we headed out for a good breakfast and then to Jericho Road in Bartlett. With his GPS Tom determined that we had overshot the mileage. The old woods road was not visible and it became apparent that a long driveway to a new home had likely erased its juncture with Jericho Road. We noticed a young lady with a couple of children awaiting a school bus at a dirt drive right about where the old mine road should have been. She directed us to pick up the trail a short distance up her drive and gave us permission to park. She wondered why we wanted to go to the mine this way and said that hikers usually took a trail from a now defunct alpaca farm off Green Hill Road. Since Tom had all the gps waypoints and Alan Plante's trail description, we felt it would be best to follow the planned-for way up to the mines. Perhaps some exploration in the future will bear out whether the Green Hill Rd way is better, easier, shorter or not.

The day was cool and cloudy to start. Among the things Tom had around his neck were a weatherproof trail map, loupe, compass, Gene Bearss altimeter and GPS. The old access road began quite level (at about 900' elevation) but after a while cut up to the right across and into the hillside at a moderate climb. After a point the road no longer showed signs of even rudimentary upkeep. We were soon on an old, overgrown woods road that evidenced occasional washouts. Our first destination after about a three quarter mile hike was what is referred to as "the foundation" location. This was nothing more than an old boulder foundation for a building going back to the mining days.



Rutile Crystal, 0.5 mm Rt 110 Road Cut Dummer, NH. Field collected by Bob Wilken

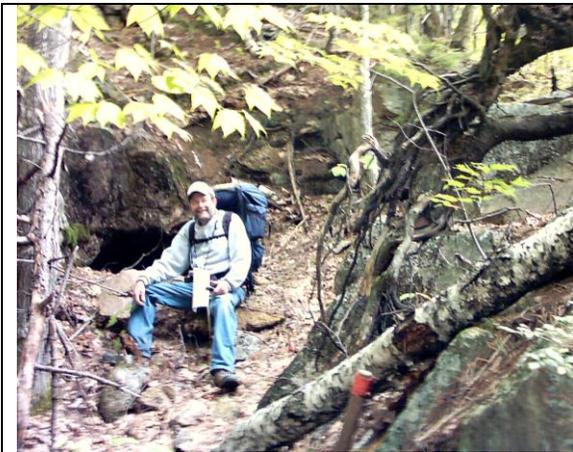


Tom's Iron Mtn. "survival kit", (I carry too much!)
Top row: pair of FRS radios, cell phone, Gene Bearss altimeter, headlamp flashlight.
Bottom row: GPS, Aiptek camera, compass, loop & whistle, topo map with GPS destinations marked.

After marking the location on his GPS we headed toward a wash to the right of the old foundation. (When I say "wash" I mean a boulder-filled, seasonal stream that at points was nothing more than steep, granite bedrock covered with moss and algae. Here we picked up some old yellow and red flagging and a rudimentary footpath. From here the climb became moderately steep. Our next destination was the lower adit pit. The foot-path soon crossed to the right side of the wash. We could see how treacherous the crossing could have been had the rock been wet. Fortunately for us we had had a pretty good dry spell. We weren't always sure that we were on the trail but after a minute or two we would pick up a marker again. Soon occasional cairns mixed in with the flagging. When we came upon the "Lower adit pit" (Pit 2) Tom took another GPS reading and we took a brief photo opportunity. We didn't linger because there were no tailings or dumps remaining here. All ore had originally been packed down the mountain.

It was at this point that the sun and clear sky warmed our ascent. Now the climb became quite steep and cyclopean granite slabs sheeted parts of the mountainside. At intervals “giant-steps” were required to clamber up and over the gray, sometimes mossy and scrubby slabs. Cairns became more common as trail markers. We would have to stop periodically to scan ahead to pick up the next cairn. If we couldn’t we just had to pick what looked like the most trodden path. When we reached the “Upper adit pit” (Pit 3) we essentially found two piles of rock: one pile of reddish-black, stained granite; the other, solid, heavy black hematite ore. After another GPS reading and photo-op in front of the adit we finally settled in for collecting. Tom made the first and only clearly identifiable micro find of the day. He broke a piece of ore with quartz “nodule” to find several beautiful danalites had popped out. A bit “green”, I went in search of similar material and soon came up with some danalite too.

After a couple of hours we felt we should press on to the highest pit referred to as the “Shaft Pit” (Pit 5). Leaving all but our collecting gear we headed up a relatively short but equally difficult climb as our last. Once again we came to a very orderly “dump”: one ore pile and another of oxidized granite waste. The adit pit was water-filled here. We sampled again looking hopefully for seams or vugs. To me they seemed a lot scarcer here. But, this was where others had found some rather rare bazzite. We then descended back to Pit 3, spent another half hour or so and determined that we better head down the mountain.



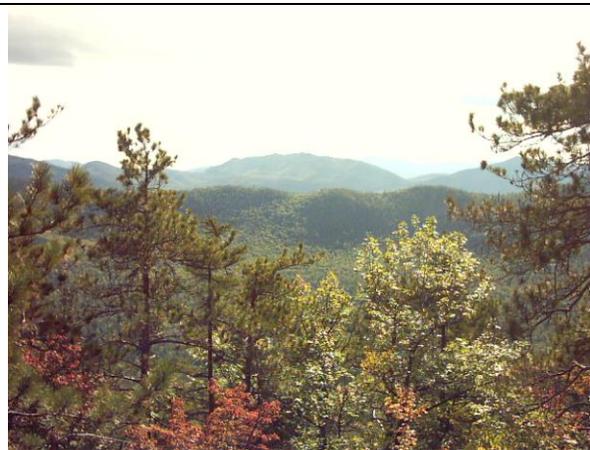
Tom Mortimer in front of adit of Iron Mtn. “Lower Adit Pit”



Bob Wilken collecting at the Upper Adit Pit.



The sweatshirts came off in the afternoon as the sun warmed the dumps of the Upper Adit Pit.

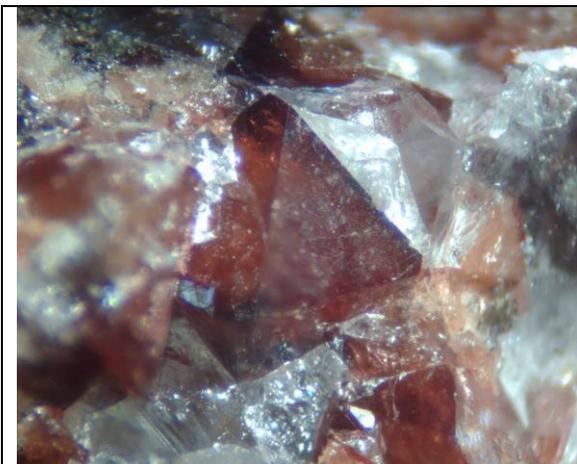


A view from the Upper Adit Pit.

The ascent had brought us from about a 900-foot elevation to a little short of 2100 feet over very rough terrain. The hike was approximately a mile and a half. The climb took approximately 2 hours and the descent took almost as long. It was equally difficult descending, now-and-then having to slide over the granite “shelves” on our rumps. And, it was no easier to sight trail markers either. For all our effort we each were able to carry down only seven or eight pounds of material.

My finds consisted of some beautiful red danalites, one sharp vitreous helvite partially submerged in quartz, two other average helvite specimens, a specimen with disk-shaped siderite xls, embedded hemimorphite fans, a single fluorite cube (!), a pyrite cube (!) and two xls perched side-by-side on quartz that look like yellow-orange titanite: one wedge shaped the other lamellar. Another wedged-shaped titanite (?) is visible as an inclusion in a quartz xl through two of the facets. Sphalerite and galena are common gangue minerals that are evident shot throughout the granite. It appears that countless “rusty” pockets in the granite are a result of the deterioration of sphalerite. This is where helvite is occasionally found.

In addition to his beautiful red danalite, Tom’s finds included zoned danalites (danalite as a rind but helvite at the core), several helvites and (the find of the day) a small cluster of blue bazzites in a hematite ore specimen.



Danalite, Iron Mtn. Upper Adit Pit. 2 mm xl
Tom Mortimer specimen & photo



Helvite Iron Mtn. Upper Adit Pit. 1 mm xl
Tom Mortimer specimen & photo

Further reading: An excellent article on the “Iron Mountain Mines” by Bob Janules was published in the Nov. 2004 issue of *Micromounters of New England Newsletter*. Check the newsletter back issues section of our MMNE web site.

Also additional photos of Iron Mtn. danalite and phenakite may be seen on <http://mindatnh.org>