

## THE OLD LEAD MINES OF SOUTHEASTERN MINNESOTA

Most rockhounds know of the large lead-zinc mining region (now abandoned) centered in southwestern Wisconsin. Old mines and dumps are common around towns such as Platteville, Shullsburg and Mineral Point, Wisconsin; Galena, Illinois and Dubuque, Iowa. What is not common knowledge is that galena was locally worked in small mines and projects in southeastern Minnesota. Allen Heyl and Wallace West, two geologists with the U.S. Geological Survey, published an article in the December 1982 issue of *Economic Geology* listing these occurrences along with others in Wisconsin, Iowa and Illinois. I want to summarize Heyl and West's work on the Minnesota locations hoping that it will encourage collectors to investigate them and to look for others.

All of the deposits are in the dolostone, limestone and sandstone bedrock deposited in shallow seas during the Cambrian and Ordovician periods, about 450 to 550 million years ago. Subsequently lead-bearing fluids seeped along cracks and bedding planes, forming the galena. Galena is easy to recognize. It is steely grey, very dense and breaks into cubes. Chunks of galena can survive weathering, though they become coated with drab white to yellow lead carbonate and sulfates) and thus can be found "as float" in the soil above the lead veins. The Indians and white settlers sought out these deposits because galena can easily be processed to make lead bullets. The mines and prospects date from the 1800's. Finding them today will take persistence, some detective work and luck. I will give the section, township and range data so that those familiar with topographic maps can use it in their research. Remember to ask for permission before going onto private property.

Three lead occurrences are found along the Zumbro River. One lead vein, described as the "Half Breed Track" is found along the north bank of the river south of Wabasha in Section 17 T.110N R.10W. Another vein is described from an area along the Zumbro further west in Section 21 T109N R13W. Both are small lead veins in the Prairie du Chien dolostones. These veins were described in 1852, but have apparently not been reported on since. The third locality along the Zumbro is a series of prospects from the 1800's on the east bank of the river near Rochester at the west edge of Section 25 T.107N R.14W.

Further south one finds the old "Dresbach Lead Mine" a deposit of galena and pyrite in a vein cutting sandstone near Dresbach, Minnesota in the east half of the NE 1/4 NE 1/4 section 18 T.105N. R.4W. Nearby are the "Mineral Bluff Prospects" in the center of Section 18 T.105N R.4W where galena and pyrite were found along a fault zone cutting Prairie Chien dolostones. These prospects were apparently accessible in the 1950's.

The last set of occurrences Heyl and West mention are in Olmsted County, near Spring Valley, Minnesota. One is a find of galena, in a quarry active in 1884 in Section 13 T.103N R.10W. A few miles away, a series of prospect pits were dug along Watson Creek in Section 29 T.103N R.11W. Galena was reported found there as 'float" in soil above dolostone and limestone bedrock. Finally, West and Heyl mention a report galena "float" at Spring Valley, Minnesota from 1876.

I don't give these locations with any guarantee that you'll find them. I've never visited any of them. But they tickle my curiosity. Even if you don't find these exact locations, you may find new quarries and road cuts in these areas that are mineralized. Perhaps some sunny Saturday I'll go looking for these myself.