

3655 0002

near 259 Item 7

PROPERTY NAME: Calico Hills  
OTHER NAMES: None  
MINERAL COMMODITY(IES): Brucite, minor copper and possible  
TYPE OF DEPOSIT: precious metals  
ACCESSIBILITY: Approximately 6 miles north of the Cane Springs  
Road on the Nevada Test Site U.S. Government  
OWNERSHIP:  
PRODUCTION: None reported  
HISTORY: Examined as a possible nuclear waste disposal site.

County: Nye  
Mining District: Calico Hills  
AMS Sheet: Death Valley  
Quad Sheet: Jackass Flats 7 1/2  
Topopah Spring 7 1/2  
Sec. Unsurv. T R  
Coordinate (UTM):  
North 4 0 8 0 0 8 0 m  
East 0 5 6 7 2 8 0 m  
Zone +11

DEVELOPMENT: Three shallow shafts and ten prospects, fair roads, no structures, and one  
2500 foot drill hole.

ACTIVITY AT TIME OF EXAMINATION: None

GEOLOGY: According to Maldonado and others, 1979, the Calico Hills are part of a dome, elongate in a northeastern direction. The extensive radial fracturing along the margins are attributed to the doming and high-angle basin-and-range faulting the older rocks within the structure are devonian dolomites that were thrust over argillites and quartzites of the Eleana Formation. The older rocks are overlain unconformably by Tertiary rhyolite flows and tuffs. A number of small rhyolite plugs outcrop within the central part of the structure (Orkild and others, 1970, and McKay and others, 1964).

The three shafts and five of the prospects are located on the western margin of the dome structure and are all in dolomites of the Devonian Devils Gate Formation. These upper plate rocks are highly fractured and cross-cut by veins and veinlets of calcite and quartz. Sample # 1919 is from a gossan zone and quartz vein along a small shaft. Within the vein material are pods of azurite, malachite, pyrite and chalcopryrite. Sample #1920 is from a small shaft that was sunk on an EW quartz vein that has been cut by N45E, 50SE fault. The mineralization is simular to Sample #1919. Sample #1921 was selected from a dump near a shaft that was sunk on a steeply inclined calcite vein with Cu-oxides and sulfides.

Sample #1804 is from a breccia vein outcropping below the Mg prospects, and Sample # 1805 was taken from the Mg(OH)<sub>2</sub> Brucite(?) prospects. Three of the rhyolite plugs were sampled as were five other outcrops showing various types om mineralization including barite, gossan material and one volcanic that was anomalous in boron.

REMARKS: A 2500 foot hole was drilled in 1978 along the SW side of the dome. This was an attempt to characterize an intrusive that had been delineated by geologic, aeromagnetic, and regional gravity data. The work was being done to identify a large homogeneous rock mass having the right characteristics for a high level nuclear repository. The drill hole was in argillites for the first 1360 feet and in marble the rest of the way. Both units were determined to be in the Eleana Formation. The intrusive was not found.

REFERENCES: Geologic Map of the Topopah Spring Quad., Nye County Orkild and others 1970.  
Geology of the Jackass Flats Quad., Nye County McKay and Others, 1964.

EXAMINER: Quade/Bentz/Tingley

DATE VISITED: 1982-1983