Candelaria Mining Co. Silver Ingot

by Dave Johnson



This engraved silver ingot is from the Candelaria Mining Co. with main offices in New York City and Mine office in San Pedro, Galeana District, Chihuahua, Mexico. Prior to the Mexican Revolution of the early 20th Century, the Candelaria Mining Co. was the principal mining firm in northern Chihuahua. In 1906 the company employed more than 1200 men in its' mines. Mining properties totalled about 4,200 acres along with additional grazing lands and miscellaneous properties. The actual mining tract was about 3/4 mile wide by 5 miles long. Principal development was in the northern portion of the tract, with the 700' San Pedro Mine, 700' Candelaria Mine, 600' San Nicolas Mine and 500' Congresso Mine. There were other lesser mines, including the Cobriza, with shafts 175-350' deep. There was a total, in 1906, of about 3,200' of shaft development and about 25,000 of underground workings.

The Country rock being worked was porphyry, diorite and limestone, with ore bodies being somewhat erratic. The San Pedro was the oldest mine and produced the highest grade ore until overtaken by the Candelaria Mine. The Candelaria, in 1906, was shipping first class ore with average smelter returns of 20% lead, 10% zinc, 8% copper, 400 oz. silver and 0.5 oz. gold per ton. The San Nicolas produced silver-lead and copper, with the latter a chalcopyrite. The Congresso Mine produced lead carbonates.

The mines were wet and the company began installing a new pumping plant of 3,000,000 gal./day capacity in 1905. The company first operated a copper matting furnace at the mines, hauling coke 90 miles in wagons, from Villa Ahumada, on the Mexican Central Railway. Later a railroad was constructed to Juarez, opposite El Paso, where a reduction plant, including concentrator and smelter was built. The Guggenheims purchased this plant and Candelaria ores were then treated at the Aguascalientes works of the American Smelting & Refining Co.

