

History and Development of the Golden Wonder Mine 1874 - 2011

Mining operations in the Lake City district date from 1874, when the Ute and Ule properties were placed in production. In that same year, the **Golden Fleece** vein, later to become one of the celebrated mines of Colorado, was discovered. By 1880, Lake City was a boom camp. *The discovery of the Golden Wonder vein dates to 1880, when attention was directed to Gold Hill, on which the Golden Wonder mine was located, by the discovery of a large boulder of vein material, which reportedly assayed in excess of one thousand ounces gold per ton.* Subsequent prospecting led to the discovery of the gold-bearing vein, which was staked, and later patented, by Thomas L. Beam and Perry Fisher.

Initial work on the Golden Wonder vein consisted of a shaft 10 to 15 feet deep, sunk by Beam and Fisher. These men later sold the property to a Mr. Sauers, who drifted the old No. 1 level, tapping the shaft sunk by Beam and Fisher. Sauers is reported to have taken out a limited body of ore prior to 1889.

The property was leased to a Mr. Alvoid from 1900–1909. During this period Alvoid drove the No. 3 level crosscut but later abandoned his lease.

The Golden Wonder was then leased to a Mr. Watson and a Mr. Ralph, who developed a large stope of high-grade ore between the No. 2 and No. 3 levels of the mine. It appears probable that this work may have been accomplished during the years 1911 to 1912.

Several other individuals leased the mine during the years 1912 – 1928. Records indicate active ore production from the mine in 1926 and 1927 by the operators, Golden Wonder Mining and Milling Company.

In 1939, John W. Vickers (San Juan Gold, Incorporated), acquired the property from the Sauers estate, with financial assistance from Jules S. Bache [44]

[44] Jules Bache was a German born immigrant who became an investment banker, investing in many mining companies and mining operations, especially in Canada. His achievements included not only being a major shareholder in Dome Lines Limited, but also took control of Leopold Cohn & Co., a stock brokerage firm founded by his uncle, renamed it as J. S. Bache and Company and built it into one of the top brokerage houses of the United States, outranked at the time only by Merrill Lynch.

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and drove the No. 2 level crosscut to gain access to the partially stoped area existing between the 2nd and 3rd levels of the mine.

[45] Vickers completed the Watson and Ralph stope to the surface prior to the direct shipment of very rich, hand-sorted ore to the smelter.

Following 1930, work at the Golden Wonder property was sporadic. The Creel winze, was sunk in 1934 or 1935, and some production was achieved from the property in 1937. [46] In 1939, Golden Mammoth, Inc. built a truck road to the property, repaired buildings, re-timbered the mine, and shipped considerable crude ore to a smelter. In 1956, Moab Uranium Company conducted a limited amount of work on the property.

During the summer of 1969, Southern Union Production Company re-opened and re-timbered portions of the No. 3 level, and during the following year, drove an access crosscut to the vein structure on the third level (the initial crosscut to the 3rd level driven by Alvoid was quite lengthy and torturous), in addition to clearing out collapsed material on the second and third levels of the mine. The SUPCO winze with lateral drifting off the winze on the fourth level. Work was halted on the property early in 1972, when Southern Union made the decision to discontinue all mining operations in western United States and South America.

In 1973, Rocky Mountain Ventures secured a lease on the property and shipped a tonnage of dump material to the Peanut Mill at Crested Butte, Colorado for milling.

In June, 1977, the Golden Wonder mine and adjacent properties were acquired by Lake City Mines, Inc., through the efforts of Mr. Michael MacGuire. Later the properties of the Ute-Ule group, on Henson Creek, including the Ute-Ule 100 ton-per-day flotation mill, were acquired to provide milling facilities. During the winter of 1977-78, Lake City Mines, Inc., advanced the fourth level of the mine,

[45] This crosscut was driven entirely through an extremely altered zone of rhyolite, so altered that the crosscut has almost entirely collapsed. The rhyolite encountered in this crosscut is so argillized that it can be molded in the hand as if it were a modeling clay.

[46] The Creel winze was a short winze collared on the 3rd level of the mine, but in driving downward, no allowance was made for the dip of the vein, and within a short distance, the winze was in country rock and thereafter abandoned.

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following the vein structure, attempting to extend this level to the surface. Newly imposed federal regulations requiring a secondary emergency exit for underground mining operations forced the company to abandon these efforts before reaching the surface. In February, 1980, a lower 9' x 9' trackless haulage crosscut tunnel level, 1,087 feet in length, was driven to tap the Golden Wonder vein system at depth, to serve as the main haulage level for production from the mine, and to provide the required second access to the mine workings. The portal of this 6th level was located at the same elevation and only a few feet distant from the Bigelow tunnel, a short crosscut which has been abandoned many years previous. In mid-August, 1980, this access level penetrated the Golden Wonder vein system, and after a limited amount of drifting along the vein structure, a production raise was driven upward to intersect the fourth level workings.

In December, 1982, LKA International, Inc., a privately held natural resource exploration company headquartered in Gig Harbor, Washington, entered into a joint venture agreement with Lake City Mines, Inc. Under the direction of LKA Minerals, Inc., a wholly owned subsidiary of LKA International, additional development work was accomplished, including extending the fifth level crosscut. As part of the joint venture agreement, the Golden Wonder mine was placed into production in 1984. The newly mined ore was transported to the nearby Ute-Ule mill for processing.

During this five month pilot production program in 1984, LKA Minerals Inc sold \$592,426 of gold concentrates from the Golden Wonder mine. Mill records indicate that the ore produced during this period averaged 0.96 ounces of gold per ton after deductions for tailing loss in the milling process.

During the period 1985 through 1992, the mine remained inactive, except for sporadic rehabilitation work done by LKA on the 6th level crosscut. In early 1993, the property was leased to Golden Wonder LLC of Kaysville, Utah, who worked the property for one year. This group shipped 517 tons of ore (631 ounces of contained gold) to various smelters, but failed to renew their lease upon its expiration.

From 1994 to 1997, the mine was leased to Golden Wonder Mining, Ltd, which group mined approximately 400 tons of ore from the property. This effort was undercapitalized and uneconomic.

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In August, 1997, the property was leased to Au Mining. This company continued to work the property until early 2007, at which time their lease was terminated by LKA. *During this interval of time approximately 8,350 tons of crude ore was shipped to ASARCO and Barrick (Goldstrike). These ore shipments contained nearly 134,000 ounces of gold at an average grade of 16.01 ounces of gold per ton.*

In July 2006 LKA receives a joint venture proposal from Cambior, Inc. (AMEX:CBJ) requiring Cambior to spend \$18 million in exploration and mine development to earn a fifty percent interest in the project. Later that year Cambior was acquired by IAM Gold (NYSE:IAG) and the JV was never finalized.

LKA filed a lawsuit in early 2007 against its former operator, Au Mining, involving certain lease and property rights to the Golden Wonder. This dispute was settled in August of the same year just prior to trial leaving LKA in full control of the property.

Late in 2007, LKA received a five-year, \$18 million 50/50 joint venture proposal from Richmond Mines (AMEX:RIC). After significant mine rehabilitation but only limited core drilling Richmond withdrew from the joint venture in late 2008 after spending approximately \$4.7 million. The initial phase of the exploration program was never completed and drilling results were inconclusive.

In early 2009, LKA hired a mining contractor to commence an exploration program designed to test for extensions to Golden Wonder's high-grade production zone.

Later in March of that year *LKA shipped its first bulk sample of mine-run material to Teck's smelter in Trail, B.C. The bulk sample consisted of 88 dry tons of ore containing 337 ounces of gold. The grade of the ore was 3.83 ounces per ton.* Since this initial ore shipment, LKA crews have conducted detailed evaluations of the mine (Levels 3-7) and made nine additional ore shipments to Kinross's Kettle River milling facility in Washington with two minor shipments to Jerritt Canyon (Yukon-Nevada) in Nevada.

To date, LKA's exploration program has delivered over 1,800 ounces of gold which has more than offset the cost of the Company's current exploration program.

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Recent events:

On November 1, 2011 LKA executed a letter of intent with Premier Gold Mines (TSX:PG) for the purpose of conducting a much broader scale exploration program involving those areas situated on LKA's claims sixty meters beyond LKA's current operations. Under the terms of the arrangement, Premier will design and manage a \$2 million, Phase I exploration program over a two years period. Upon completion of Phase I, Premier will be entitled to earn a 60% interest in the Golden Wonder by spending \$15 million in exploration and development over an additional six-year period including \$1.2 million in reimbursements to LKA.

The Premier exploration program will be designed to determine the size (strike & depth) of the Golden Wonder's vein system.

".....The Golden Wonder Mine mineralization could also be related to a bigger hydrothermal system potentially linked with the Eureka Graben fracture system which played an important role in the location of some other gold veins known to the W-SW of Lake City area (Sunnyside, Idarado).

Major Gold-Tellurides deposits are known elsewhere in the world (Cripple Creek in Colorado, 24 M oz district – Golden Sunlight & Zortman-Landusky in Montana, 4.1 M oz – Emperor in the Fiji, 10 M oz – and Porgera in Papouasie New-Guinea, 10 M oz). Golden Wonder area may not necessarily contain such a resource but the potential grades of that kind of structure and the fact that these mineralization types occur in complex systems of veins, breccias and disseminations gives a lot of exploration opportunities."

Marie France Bugnon, Geologist, M.Sc. Manager, Exploration-Cambior, Inc.

".....The Golden Wonder deposit is a member of the "telluride gold" class of ore deposits. Other members of the telluride gold class, such as Cripple Creek and Red Mountain in Colorado and Kalgoorlie in Australia, have produced multi-million ounce gold deposits with vertical extents of over 1500-2500 feet."

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