DISTRICT	Silver Peak
DIST_NO	4390
COUNTY If different from written on document	Esmeraldy
	C M 112 - M M
TITLE If not obvious	Group No. 43 - Mary Mine
AUTHOR	Saunders, F; Taylor P; Reeve P; Robinson W. Miller B; Fillerup, F; Dragan, D
DATE OF DOC(S)	1975-1977
MULTI_DIST Y / N2 Additional Dist_Nos:	
QUAD_NAME	Silver Peak 72
P_M_C_NAME (mine, claim & company names)	Summa Corp., Mury Mine
COMMODITY If not obvious	Gold
NOTES	Correspondence; geology; assays; production
	7p.
Keep docs at about 250 pages (for every 1 oversized page (>1 the amount of pages by ~25)	
Revised: 1/22/08	SCANNED: MT (6/2+/Q) Initials Date

GROUP NO. 43

Mary Mine Lease (50 year lease - \$3,000 per month) starting in 1975.

This lease has 45 patented claims and 45 unpatented claims.

Total taxes are \$1,259.70 - total assessment is \$4,500 per year.

The claims are located in Esmeralda County, Silver Peak Mining District, near Silver Peak, Nevada.



MEMORANDUM

April 26, 1977

TO:

Paul Taylor

FROM:

Fred Saunders

SUBJECT: Review of Mary Mine Reports

I have reviewed the three(3) main reports on the Mary Mine, trying to ascertain as much pertinent data from each, so that you may obtain a generalized picture of the geology and ore deposits at the Mary Mine.

The Barry (1939) report is the better of the reports in that it was written for the Nevada Development Company during the time in which they were operating the mine. It gives a very good account of the anticlinal structure and its relationship fo the ore deposits. Barry relates the significance of the "Mary Limestone" to the ore deposits and its use as a key in exploration. He seems to be aware of the downdip potential for ore deposits along favorable structures as the future potential for the property.

His interpretation of the geological history is too textbook orientated and has been refuted by Bailly in his 1951, PhD dissertation.

Bailly's PhD dissertation is a good descriptive interpretation of the rock types, their ages, and petrographic analysis. The section on ore deposits is very conclusive and supports his conclusion of replacement type deposits rather well. He does not describe the size, grade, or distribution of the ore zones and has no economic evaluation.

Lutz (1974) examination report was written after a brief preliminary examination and sampling program was carried out at the Mary Mine. The report gives short review on the geology, history and location of the property. The major emphasis of the report is on the work done by Lutz and myself. The section on open pit potentials is too promotional and is not substantiated by any data.

Bruce Miller, Counsulting Geologist, Reno, Nevada was hired to do a field mapping program at the Mary Mine, unfortunately Summa ran out of funds before the program was completed. Bruce's unfinished map is available in Reno. Enclosed is a memo from Bruce to Paul Reeve stating the progress of the project.

Fred T. Saunders Geologist

FTS:djs Enclosure



Internal Communication

Date: July 27, 1976

To: W. J. Robinson

From: Paul G. Reeve

Subject: Bruce Miller's Comments re: Mary (Group 43)

Enclosed is a copy of Bruce Miller's letter of July 20, 1976, which provides additional details on the work which he and Danny Dragan performed at the Mary mine property during June and July of 1976.

As you and I have recently discussed, it would be well if we could go ahead with our own geologists to check the work done to date. With regard to the underground potential for the Mary mine property, we need to give some additional thought as to how best to carry out that work. Please note Miller's suggestions in the next to the last paragraph of his letter in which he outlines the need to establish some rough approximation of the minimum tonnage and grade that would provide a minimum attractive return on investment. Your thoughts in this connection would be much appreciated.

PGR:In

xc: Francis Fillerup, w/Enclosure

Enclosure

July 20, 1976

P. O. Box 13062 University Station Reno, Nevada 89507

RECEIVED
SUMMA CORPORATION
MINING DIVISION

Mr. Paul Reeve, Manager Land Exploration and Mining Division Summa Corporation 3421 Las Vegas Boulevard South Las Vegas, Nevada 89109

JUL 2 6 1976

Dear Mr. Reeve:

I have enclosed invoices number 4 and 5 covering the last portion of my field work on the Group 43, Mary mine property. Total costs including fees and expenses for my field work are \$3,613.05. This money was expended during June and three days in July of this year. Salary and expenses expended on the project by Mr. Dragan, estimated at \$40 and \$20 respectively per worked day total \$1,260 for 21 worked days during June. Thus, expenditures in fees, salaries and expenses on the geologic investigation of the patented and unpatented claims of the Group 43 property total close to \$4,873.05. This is slightly in excess of the \$4,500 expenditure quoted to me to be needed to meet annual assessment work requirements.

Although time was not available to map and sample important underground workings and therby test ideas generated by our detailed surface mapping, I estimate that a resonable size potential for open pit minable tonnages grading approximately 0.10 oz. of gold per ton, can be cast in the order of less than 1 million tons to possibly as great as 3 million tons. Tonnages on the lower end of this estimate are very much more likely than those on the upper end. This is an estimation of what might be developed by a detailed exploration campaign and is not a measure of proven reserves of the mine. It is important to point out that this estimate of size potential is approximately one tenth the potential suggested in an earlier report by Summa staff geologists (Lutz, November 24, 1974). I assume this downward revision of ultimate size will drastically alter the attractiveness of the property.

I have conveyed verbally this and other information concerning the Mary mine to Mr. Robinson during a recent tour of the area. I believe this data will help him determine what priority, if any, further development of the open pit potential at the Mary may have for Summa.

The indicated potential tonnage and grade estimate is based on our surface geologic mapping of the entire property, reconnaissance of underground workings, and review of available results of previous diamond drilling. Briefly, our mapping indicated that the Mary mine zone of gold bearing quartz lenses could be traced for slightly more than 6,000 feet across the Group 43 property. It strikes northwest and dips about 45 degrees northerly. This zone has been extensively mined over much of its strike length with mined areas averaging about 20 feet in thickness. Previous mined grades probably averaged between 0.20 and 0.30 oz. of gold per ton. Past production was on the order of 2 million tons or more. Results of previous drilling and our mapping suggest that gold mineralization is strongly localized in quartz lenses and that rocks surrounding these lenses do not commonly contain significant widths of lower but interesting amounts of gold. If one assumes for gross size potential estimation, that gold bearing rock in Mary mine zone could be mined by open pit methods over 5,000 feet of strike length and that the zone would average 50 feet in width and contain 0.10 oz. of gold per ton and that this zone could be mined 300 feet down dip, approximately 3,125,000 tons of "ore" would be available assuming half of the zoned has been mined by previous operations. In reality, I strongly suspect that due to probable thiner zones of 0.10 oz. material combined with locally prohibitively thick cover, considerably less tonnages are available for open pit mining.

This significantly downward revised ultimate size potential estimate may be easily and cheaply tested by about two weeks of hand chip sampling and mapping in about ten carefully selected cross-cut mine workings at widely spaced intervals along the length of the Mary mine zone. This data, combined with the results of previous drilling will provide a adequate test of my appraisal. I was most frustrated not to be able to complete this sampling within the budgeted time, but I believe that this work could be rapidly completed by your staff.

The potential for significant tonnages of economic grades of gold ore as down dip extensions below existing mine workings represents a second target of interest at the Mary mine. Speaking as a geologist, I would quess that inorder to have an attractive return on investment, on the order of 1 million tons grading very close to 0.30 oz. gold per ton would be required for an underground operation at Mary. This may not be an unreasonable potential for the Mary, but because our recent work was directed at fixing the potential for an open pit operation, I am not in a position, at least at present, to give you what I feel is a good estimate of underground size potential. In considering underground mining posibilities at the Mary, the management and engineering staff should determine a rough approximation of minimum tonnage and grade that would result in a minimum attactive return on investment and then charge the geologist with the responsibility of

carefully determining the reasonableness of this target goal. Furthermore, it would be well advised that the geologist be encouraged to exhaust all the inexpensive methods of arriving at this estimate, including mapping, chip sampling, and careful analysis of existing data, prior to making a decision to drill.

I assume that you will be able to pursue any additional geologic work at the Mary mine with your own staff. I will be glad to discuss any questions you might have concerning geologic problems at the mine or aid in any further evaluation. In the meantime, I will complete preparation of our mapping results and write a very brief summary of our work. Up to the present I have been significantly delayed in completing this work by my recent move in Reno.

Best Regards,

Bruce W Miller

Bruce W. Miller Consulting Mining Geologist--