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July 28, 1960

Am 5-7639

Mr. Frank Moore
Mr. Jack Hughes
6738 N. 11th Place
Phoenix, Arizona

Gentlemen:

Herewith, my report of your Silver Queen Project which is based on the result of a brief examination completed on July 20th and 27.

Objectives of the examination were to (1) evaluate what has been developed to date and (2) to determine what future potential may possibly exist within the confines of the property and (3) whether additional sums of money should be expended to develop such possible potentials.

The examination included a general inspection of the surface outcroppings, observation and detail geologic mapping of the underground development thus far completed as well as a limited amount of sampling for use in evaluation. A geologic map of the underground workings is included as part of this letter report.

Such details as accessibility, facilities, etc will not be discussed. The Silver Queen property consists of three claims in the Tiger Mining District in Sec. 16 and 17 of T. 9 N., R. 1 W.

CONCLUSIONS and RECOMMENDATIONS

The following conclusions and recommendations are a result of the writers personal examination of the property and his knowledge of the mining district enhancing the Silver Queen property.

(1)- Sufficient development as a surface pit and an 80 foot adit has been completed to suggest to the writer the type mineralization commpn to the property as well as the grade of such mineralization.

(2)- The mineralization encountered, or that to be encountered with future development, is not of sufficient

dollar value per ton, even with hand sorting, to return the cost of the development, much less, earn a profit for the operating unit.

(3)- To adequately develop a project which might be profitable on a large scale will require an estimated $80,000 or more exploration program and if such is successful, an additional $200,000 program of mill construction and mining equipment would be required.

(4)- Geologic evidence, sampling, prevailing economic conditions all contribute to the writers recommendation that no further work be done nor additional monies be spent except such expenditures necessary to remove all your equipment and supplies from the property.

GENERAL GEOLOGY and MINERALIZATION

The Silver Queen property hosts the Yavapai Schist which is common to the Bradshaw Mountains. Except where locally distorted, the schist trends N. 50° E and dips 60° NW. The general area is not without the usual pegmatic dikes, andesite dikes and shear zones.

Mode of mineralization at the Silver Queen prospect is not of the usual variety common to the NE, SW trending "Bradshaw" zone which more or less extends from Morristown to Jerome. The common type mineralization includes sulphides of copper, lead, and zinc with varying values of silver and gold, all hosted in a strong siliceous gangue.

Mineralization at the Silver Queen is lead sulphide (galena)(some oxidation) and erratic silver values which are all confined to a "shear" zone cutting the Schistose country rock almost at right angles (about 85°). Other mineralization within the "shear" zone is black magnetite and barite (barium sulphate), both of which exist as fracture filling material; the magnetite occuring principally as a narrow "fissure" zone favoring the footwall of the "shear" and paralleling same in strike and dip. Lead and silver values have sporadically impregnated this 1.5 foot average width iron-baritic zone and such dollar-wise values may range to $35.00 per ton. Isolated "hot" spots would occur, but will not be the rule. Observed evidence,in the adit,as irregular walls, rock fragments, etc, suggest the encountered ore shoot occupies an old water course.

A similar dollar-wise, 2-3 foot zone of lead-silver-barite mineralization favors the hanging wall of the iron-barite zone. Isolated "hot" spots will also occur in this zone and could be more numerous, however, not of sufficient frequency to greatly improve the dollar-wise value per ton to guarante a "dollar-swap" venture, much less a profitable venture.

Observation of the geologic evidence in the small surface cut, some 25 feet vertically above the adit, and the geologic evidence in the adit itself, suggests that such ore shoots encountered or to be encountered will be (1)-relatively narrow in width, (2) relatively short in strike length and (3) generally elliptical in shape, both horizontally and vertically. (See Geologic Map attached) Thus, great tonnages cannot be expected from any one single shoot. Upgrading by hand sorting or cobbing will further reduce the quanty of possible direct shipping ore.

"Hot spot" ore is characterized or recognizable by the greater abundance of lead sulphide (galena) but more so by the presence and abundance of the orange-yellowish brown amorphous material, no doubt containing oxidation compounds of iron, lead and silver. Barite appears to be in greater abundance in this type ore moreso than in the lesser value ore, thus, creating a more difficult hand sorting operation.

ECONOMIC EVALUATION

The Silver Queen project is so situated that any ore mined must bear, besides the normal mining and smelter charges, a heavy transportation charge to the nearest lead-silver smelter at El Paso, Texas. This charge alone for small lot (15 ton) truck shipments is about $28.00 per ton. Were truck haulage to Morristown and rail shipment from there to El Paso used, the charge would be reduced to about $19.00, still a pretty stiff charge against the ore.

Smelter charges, taxes, assaying, etc would average about $15.00 per ton--providing the barite content is less than 5%--greater than this amount would result in non-acceptance by the smelter. Maintaining a 5% or less barite content would in the writers opinion, require a very tedious, time consuming, costly hand sorting operation.

An over all operational cost should approach $30.00 per ton or more depending on the ore to waste ratio, the extent of the hand soring operation, waste removal, mining, etc. Thus, each ton of ore mined must have a dollar value of $50.00 as a minimum for a break-even venture if the cheaper truck-rail shipment were used.

Based on the above freight and general charges, the economic conditions surrounding the Silver Queen project are not in a favorable position for the production of a direct shipping product.

POTENTIAL of PROPERTY

The potential of the property must be considered both

geologically and metallurgically. It is very likely that additional "ore" shoots could be developed which are similar in character to that presently exposed in the existing workings. Same will contain "hot" spots, however, future "ore" shoots should not necessarily vary dollar-wise in value to any great extent. Thus, a limited tonnage potential exists that could be considered as a direct shipable ore. Moreover, because of the erratic geologic-mineralization conditions, much development expense would be incurred attempting to explore for possible existant "ore" shoots. Therefor, considerable financial reserve must be available to adequately promote the project.

The sampling evidence indicates the present "ore" shoot as well as perhaps future shoots would average dollar-wise approximately $20.00. Available potential tonnages in this value range are thus greater, but metallurgical processing would be required to obtain an acceptable, saleable clean product, in other words, milling by gravity and possibly flotation, to upgrade the crude ore to an excellent concentrate. Consideration of such a project necessitates that sufficient "ore" reserves have been indicated to carry the project for five years or more. Again, the requirement of a considerable financial reserve for development as well as the added expense for mill construction.

All in all, the writer feels the Silver Queen property singly can not provide the required potential in either the above considered instances.

SAMPLING

The writer took five samples of exposed mineralization in the present workings. Three samples (101-103) were taken in the adit and two samples (104,105) were taken in the surface cut above the adit. Samples 101 and 104 respectively represent the magnetite-barite zone exposed in both the cut and adit. Samples 102 and 105 respectively represent a zone on the hanging wall of the magnetite-barite zone. Samples 101 and 102 (adit) are vertically below samples 104 and 105. Samples 103 (adit) represents mineralization at a point of the ore shoot where the magnetite-barite zone has pinched to a mere 2 inch width.

Results of these samples are tabulated below:

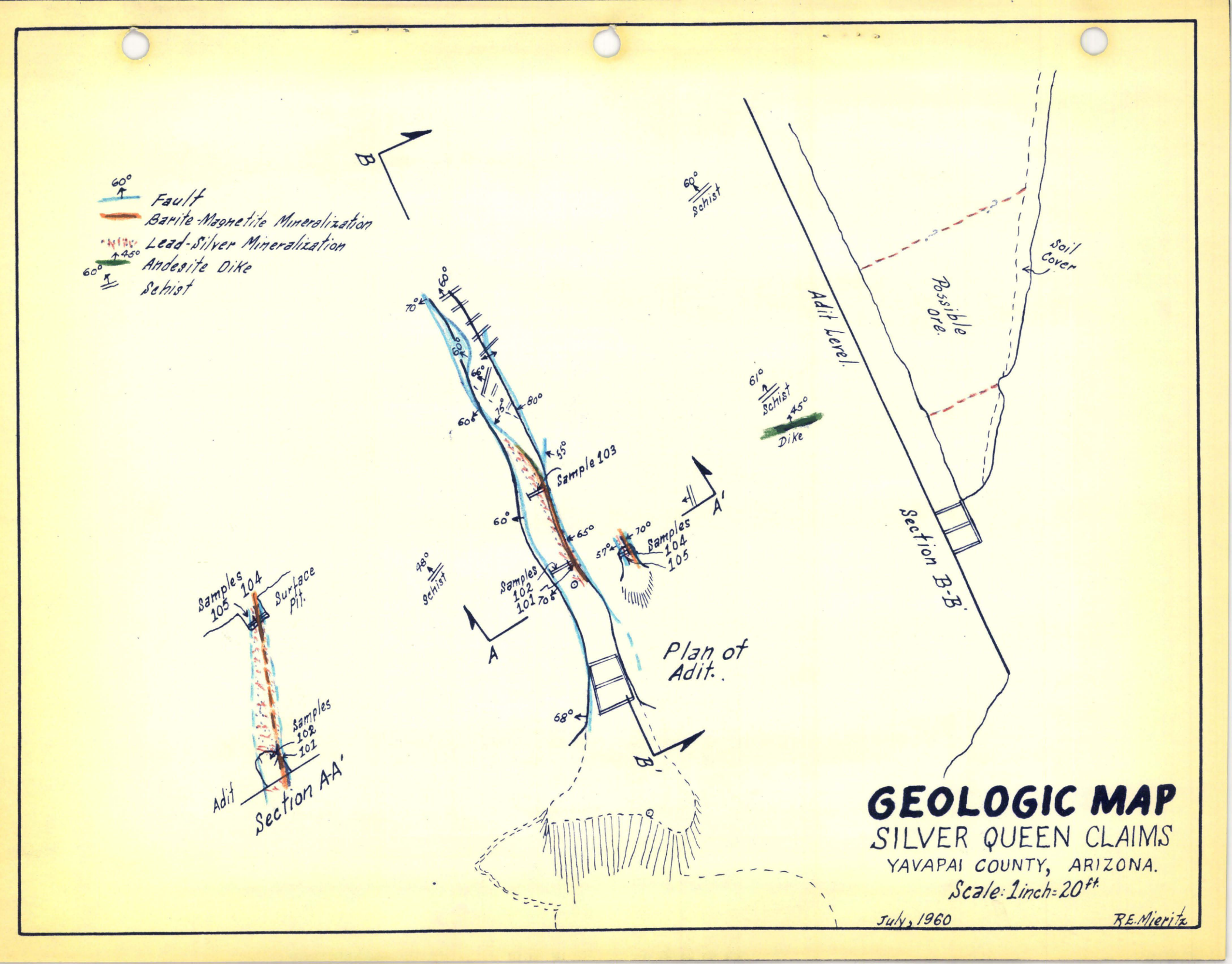
Sample	Width	Remarks	% Pb.	Oz. Ag
101	0.8ft.	27' in from portal, Magnetite-barite zone	1.0	0.98
104	2.0ft	Surf. cut. Mag-Bar.zone	4.1	8.59
102	4.5ft	27'in from portal, HW zone, back of adit	0.9	0.52
105	1.5ft	Surf. Cut, like 102	0.7	0.55
103	4.0ft	41' in from portal, across back	1.5	1.43

The assays were made by Hawley and Hawley of Douglas, Ariz.

All samples taken are character samples to provide clues as the guide to the value of the mineralization. Lead mineralization and an estimate of its content is quite easily determined visually, whereas silver content is extremely difficult to forcast. All samples were cut using a 1½ inch chisel cutting a channel approximately ½ in.in depth.

Respectfully submitted,

R. E. Mieritz, P. E.
Phoenix, Arizona



GEOLOGIC MAP

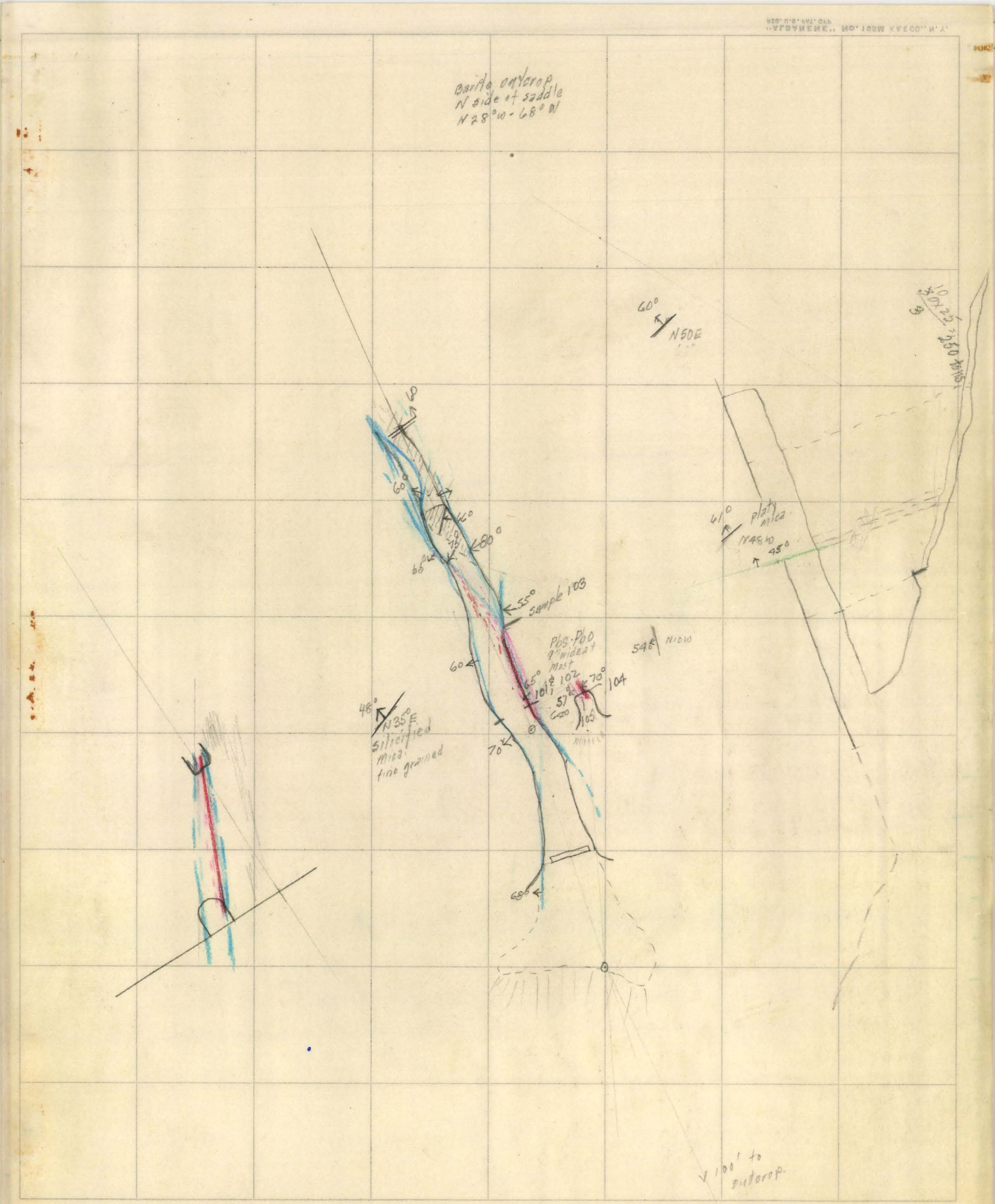
SILVER QUEEN CLAIMS

YAVAPAI COUNTY, ARIZONA.

Scale: 1 inch = 20 ft.

July, 1960

R.E. Mieritz



MINE_____ LOCATION_____ LEVEL_____

GEOLOGY BY_____ SURVEY_____ SCALE_____ DATE_____

W. E. HAWLEY. PRES.

TELE: EMPIRE 4-2741

HAWLEY & HAWLEY

ASSAYERS AND CHEMISTS, INC.
537 TWELFTH STREET
DOUGLAS. ARIZONA

BOX 1060
DOUGLAS. ARIZONA
BOX 4
EL PASO. TEXAS

IDENTIFICATION	GOLD OZS	SILVER OZS	LEAD %	COPPER %	ZINC %	INSOL. %	IRON %		
Sample # 101		0.98	1.0	Black adit					
102		0.52	0.9	H.W. Adit.					
103		1.43	1.5	Back - Adit.					
104		8.59	4.1	Surface Cut - FW	Black				
105		0.55	0.7	"	"	H.W.			

CC:
ADD:
CITY:
ADD:
CITY:

Mr. Frank Moore
6738 N. 11th Place
Phoenix, Arizona

REMARKS:

ANALYSIS CERT. BY Ester Jones

3.75 Preparation
26.25 Assaying

ACC: FRANK MOORE

DATE SPL. RECEIVED 7/25/60

DATE COMPL. 7/27/60

$30.00

308325

FORM B

36.5
+31.5

68.0 mi from PHX

Silver Queen - 3 claims - lease from - Palmer - (Rancher) 20 m.
Pb & Ag in Barite gangue. 1 mi east of Silver Mtn. (Tiger Dist - or Silver
3-Partners
Jack Hughes 3206 N. 20th St.
Frank Moore 6738 N. 11th Place
AM5-7639
T.9.N R1W - Sec 16-17
1½ mi SE Silver Mt. adjoins Pacific SW.
W. L. Palmer owner.

2 shallow pits on vein - adit

Mineral. - Platy barite argentiferous Galena
Chocolate limonite (oxidized sul)
Black him (Tetrahedrite) may indicate copper at depth
Schist - N 30 E 60-70 W.
2 shears one Q & 2 other barite
N-30W. 75° SW footwall 45-50
Traced 1000 from surface

4-5' on saddle = 9% Pb little Ag
now out - 2' $45.00 & 2½ feet $175.00
(4% lead 70 oz silver.

Shears are 45' apart

1- Pitz - Nil

2- Football - $3.00

3- Golf - Nil

July 21, 1960

Hawley & Hawley, Assayers
P. O. Box 1060
Douglas, Arizona

COPY

Gentlemen:

Under separate but simultaneous parcel post I am forwarding to you one package containing five samples of crude ore all of which are to be assayed for silver and lead.

Each sample is identified with a slip of paper on the inside of the paper bag as to sample number, what is to be assayed, as well as my name.

The cost of assaying these samples are to be charged to Mr. Frank Moore, 6738 North 11th Place, Phoenix, Arizona. Mr. Moore is writing you today.

Because of the nature of the type mineralization I would very much appreciate if you will crush the entire sample, DO NOT QUARTER before pulverizing, but pulverise the entire sample and then after pulverizing, roll the entire sample fifty times. Please make sure these instructions are followed.

Please send a copy of the assay results to me at the above address, the original can be sent to Mr. Moore.

Thanking you in advance, I remain,

Sincerely,

R. E. Mieritz, P. E.

Cc: Mr. Moore

AMERICAN SMELTING AND REFINING COMPANY
SOUTHWESTERN ORE PURCHASING DEPARTMENT
803 VALLEY NATIONAL BUILDING
TUCSON, ARIZONA

REED F. WELCH
MANAGER

July 18, 1960

Mr. R. E. Mieritz
526 West Roosevelt
Phoenix, Arizona

Dear Dick:

I have your letter of July 17 stating you expect to look at Mr. Hughes Silver Queen Mine in Yavapai County. When Mr. Hughes was in my office last week I advised him that ore containing very much barite must be avoided in the lead plant and I am interested to know the $BaSO_4$ content in the samples you cut.

Mr. Hughes reported he had ten to fifteen tons of cobbed ore which he identified as galena. If this has been properly sorted no doubt the barite has been eliminated. I shall appreciate your sampling the sorted ore so that I may know the value of that product.

I understand that Hawley & Hawley will be instructed to send me copy of assay certificates showing results of your sampling. When I have the assay information I shall be glad to advise regarding purchase terms and outcome.

Yours very truly,

Reed

REED F. WELCH

cc:Mr. Jack Hughes
c/o Mr. Frank Moore
6738 North 11th Place
Phoenix, Arizona

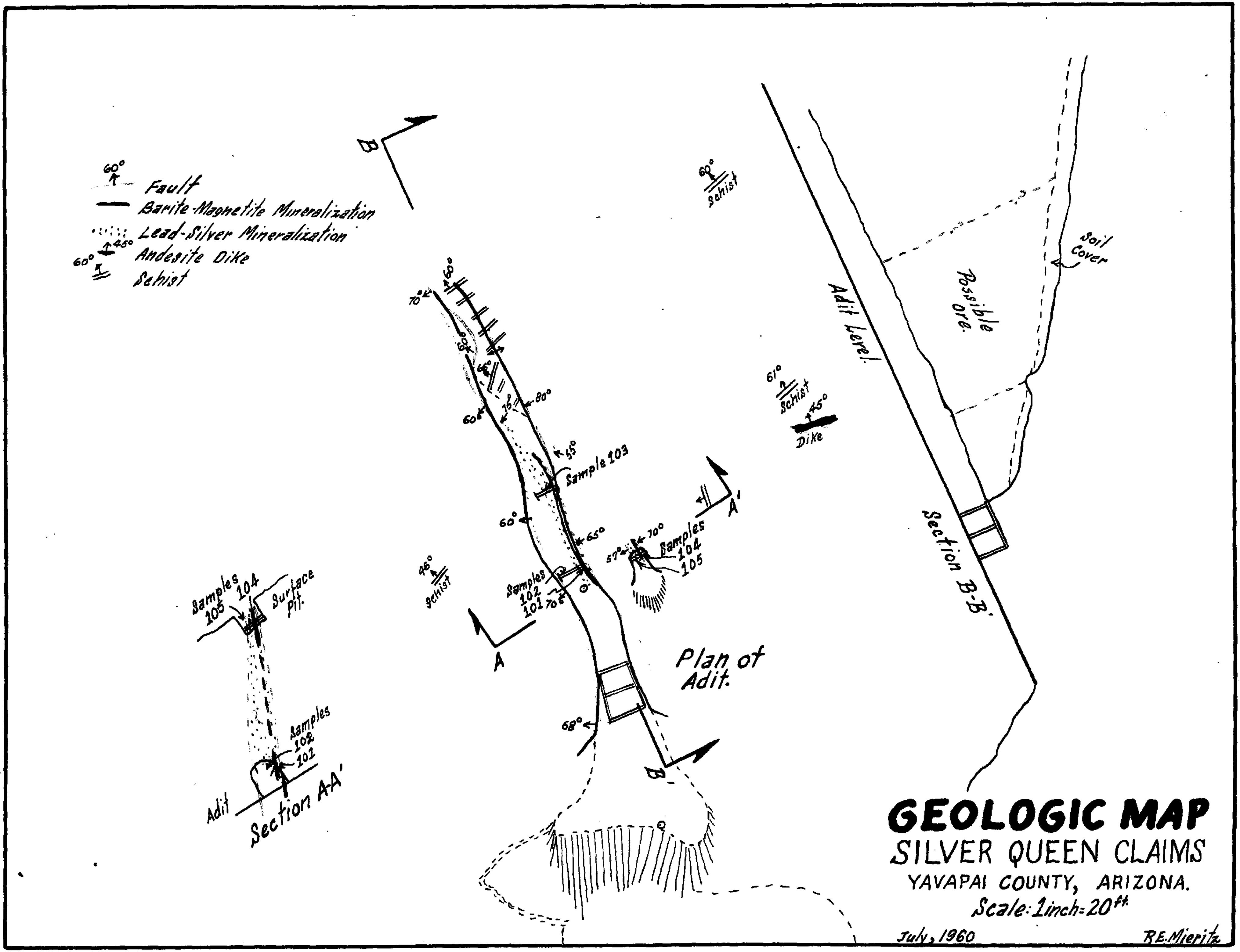
Research report of Property A

pacific mine. Crown King Arizona.
Bradshaw Quad. Silver Mountain District. Yavapai County Prescott Ariz. Eleven mines of Crown King. inc) 1907 = as pacific copper mining Co.
30 patented Claims 10 of them with Clear titles or Deeds to 203.35/100 acres. has shaft of 500 ft. tunels and Cross Cuts on 450 ft. level. of 3500 ft. Blocking out 7500 tons of ore, all of this reports in government records, ore on Dump estimated at aprox. 15000 tons. Will run from $12.00 to 23.00 per ton of 3 to 9 % Copper aprox. 90 oz. Silver, some Gold.
U.S.G.S. Report of property.
Pacific Mine.
Shows form blend phase of Yavapai Schist) Porphyry Dikes of 50 to 150 feet in width, Carying 3 = contacts Deposits, one 9 ft. 2 - 14 ft. no 2 of 25 ft. no 3 traced 3000 ft. with north-east strike) Gossans of 100 to 500 ft. width ore much leached. Carying honey Combed Hematite, Lamanite, with Copper Carbonate ores, malachite and azurite at and near surface, after 50 ft runs Sulphide Zone, Carying Chalcocite Barnite and Chalco pyrites ores.) run from 3 to 15 % Copper. some as high as 30 % and up to as high as 240 ounces of fine Silver and 0.2 % to 2 oz. of Gold per ton.

U.S.G.S. Report 1916 B.

Developed by 450 shaft - 40 ft., 60 and 40 ft. and tunnels of 25 cross cut and 100 ft. timed with 1500 of workings. 5000 tons of ore blocked out by underground crosscuts, 3500 tons blocked out for stoping, work in 1912 offset by gold vein known and recorded by John Pacillo to have produced $50,000.00 from 300 tons of mine run ore, a mine road leads to shaft of mine

Al-3-0072-

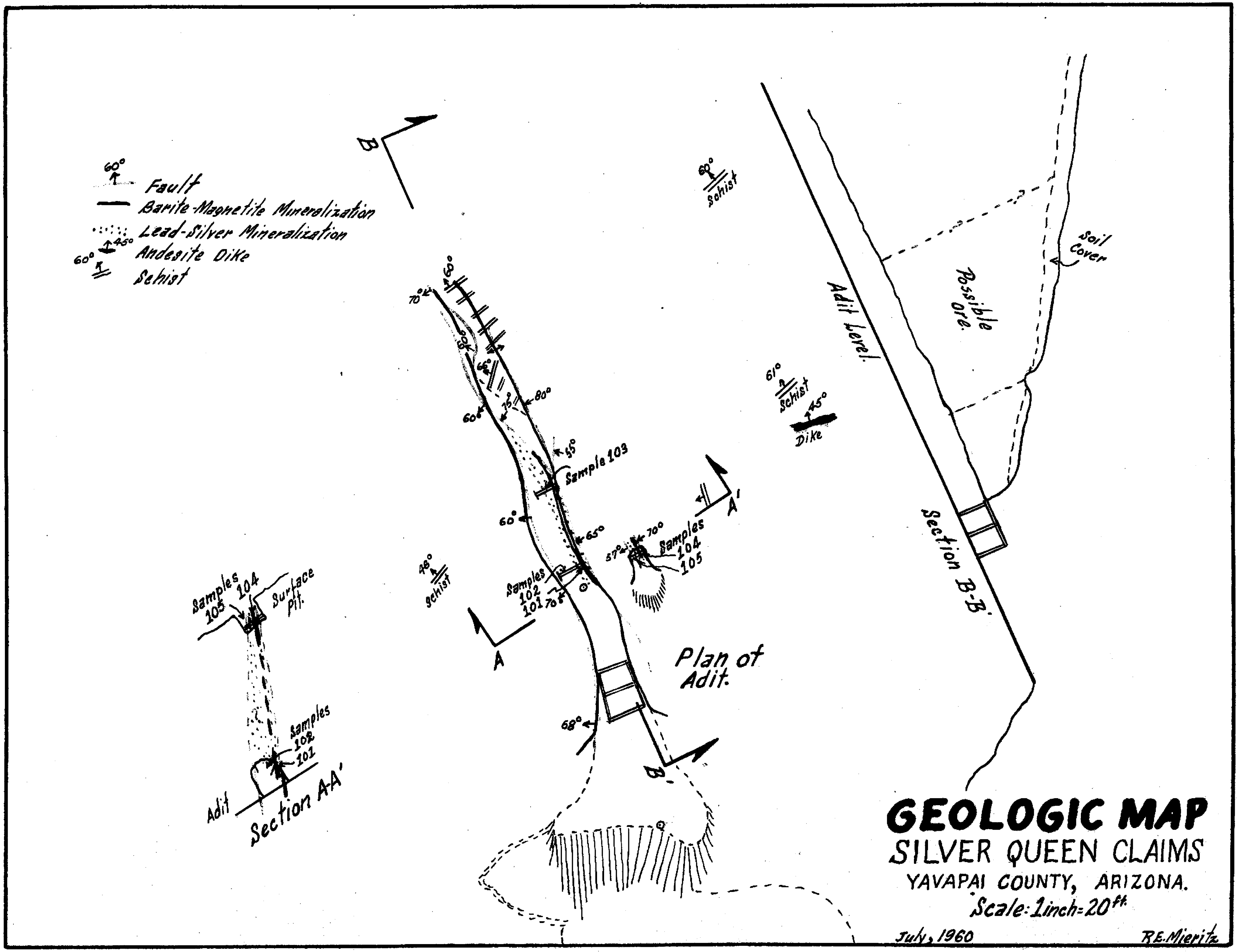


GEOLOGIC MAP
SILVER QUEEN CLAIMS
YAVAPAI COUNTY, ARIZONA.

Scale: 1inch=20 ft.

July, 1960

R.E. Mieritz



GEOLOGIC MAP
SILVER QUEEN CLAIMS
YAVAPAI COUNTY, ARIZONA.
Scale: 1inch=20ft.
July, 1960
R.E.Mieritz
Fault
Barite-Magnetite Mineralization
Lead-Silver Mineralization
Andesite Dike
Schist
Plan of Adit.
Sample 103
Samples 102 101
Samples 104 105
Section A-A'
Adit
Samples 105 104
Surface Pit.
Samples 102 101
Section B-B'
Adit Level.
Possible ore.
Soil Cover
Schist
Dike