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James E. Gaylor

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July 4, 1975

Dear Grover,

I would appreciate it very much if you would evaluate the enclosed material and then buck it on up the line for a decision along with your recommendations. As you know, I am now offering 49 contiguous copper claims near Ray for \$2,500,000.

Since I am offering the property to other companies, as well, I am sure you will understand my desire to obtain the best deal. I am now 64 years of age and cannot afford to give any company a long free option; I must have some money in the immediate future to meet my obligations. I would appreciate very much receiving the best offer from one of your principals, and I suggest one of the following methods of payment for consideration:

1. \$2,500,000 cash, or best cash offer. Any reasonable necessary time would be allowed to raise the money.

2. \$2,500,000 with terms, as follows: For every dollar paid within this year (1975) I would knock off \$2 from the total price. For example, if \$100,000 were paid down it would leave a balance of only \$2,300,000, etc.

3. I realize that most companies wish to pay out the lowest possible minimum during several years of exploration; therefore I would accept a modest amount down when the contract is signed and modest annual or monthly payments beginning January 1976 for three years of exploration, after which time the balance could be paid in annual installments, in no more than 8 years. Any money paid during such exploration period would be deducted from the total.

I am planning a 1-month trip to Europe beginning Sept. 1st and would very much like to have a reply by the 1st of August, if at all possible. I will do whatever I can to expedite the drafting of a contract.

To further assist you in making a decision on my property I am enclosing the geological data on the nearby Ray Pit, along with the pertinent geological data from seven geologists and engineers who have spent the most time on my property, so that you can see the similarity between the Ray geology and mineralization and that of my property. Thanks for your early evaluation and decision. Call me any time you wish. I have a wealth of other data to show you when we can get together. You may duplicate whatever you may need.

Very sincerely yours,

James E. Gaylor
James E. Gaylor

ORE DEPOSITS and GENERAL GEOLOGY AT KENNECOTTS RAY OPEN PIT
As reported by H.R. Cornwall, N.G. Banks & C.H. Phillips
on the Geologic Map of the Sonora Quadrangle, 1971

"The disseminated copper deposit at Ray is the major mineral deposit in the quadrangle. The Ray deposit covers an area 2 miles long in an east-west direction, and 1-1/2 miles north-south, bounded on the east by the Broken Hill Fault and on the west by the West End Fault. From 1911 to (?) 1,500,000 tons of copper, 40,000 ounces of gold and 4,000,000 ounces of silver were recovered.

"The bulk of the copper thus far produced at Ray has come from secondary enriched chalcocite in an irregular flat blanket, a few feet to several hundred feet thick, mostly in Pinal Schist. The primary hypogene minerals are pyrite, chalcopyrite, minor bornite and molybdenite. Primary copper, occurring mainly as chalcopyrite, averages .1 to .2 percent in the Pinal Schist and Granite Mountain Porphyry and forms large bodies of ore (more than .4 percent Cu) in the diabase.

"Ore bodies in diabase sills underlie the eastern part of the Ray secondary chalcocite deposit and extend eastward from the Diabase Fault to the Broken Hill Fault. Mining in this area began recently by an eastward extension of the Pearl Handle (Ray) Pit. Schist or quartzite adjacent to ore-grade mineralized diabase is commonly poorly mineralized. Supergene enrichment in the diabase has been negligible, but in the shallower parts of the ore bodies the chalcopyrite has been oxidized to chrysocolla, azurite, and malachite.

"The hypogene mineralization was controlled by the permeability and type of host rock and by the arrangement of faults. Copper mineralization is greatest in highly fractured rocks. Diabase, the best host for copper, presumably reacted more strongly with the mineralizing fluids than did the more siliceous rocks.

"The zone of supergene copper enrichment is related to major structures, as well as to lithology and distribution of primary sulfides. Copper was leached most thoroughly from areas rich in pyrite, which formed sulfuric acid under oxidizing conditions and acted as a copper solvent. The copper solutions moved downward and laterally along structures in the schist and porphyry, but not in the diabase, which tended to react with and precipitate the copper. The copper precipitated at moderate depths as chalcocite replacing pyrite and chalcopyrite.

"In the Troy area a sizeable area....contains disseminations of azurite, malachite, chrysocolla, and copper sulfides."

The following quotations from various geologists and engineers shows the similarity between the Ray ore body geology and the geology on the Gaylor claims:

LEO VON ROSENBERG: Was on the property at various times from 1912 to 1916, studying its geology. He states the following:

"The geology of the area in which the property of the Troy Arizona Copper Company is situated is more or less complex. The rocks are granite, granodiorite, diabase, porphyry, limestone, quartzite, schist, and conglomerates. The diabase, granite, granodiorite and the porphyry occur as intrusions. The porphyry occurs mainly in the form of a very strong and persistent dikes, cutting through the granite, diabase, etc. Very probably the diabase was the first intrusion into the sedimentary rocks, when they were still in the horizontal position. The intrusion of the diabase was followed by the intrusion of the granite rocks, which caused the displacement of the diabase and further tilting of the sedimentary rocks. Then occurred the intrusion of the porphyry, followed by the ore deposition. It might be stated that the intrusions of the porphyry are closely related to the ore deposition although the diabase may also have been a mineralizing agency. At various times the whole area was subject to much faulting and shattering.

"The porphyry dikes are from a few feet to fifty feet in thickness, and in some cases are much thicker. The dip of most of the dykes is rather steep. The ore occurs along the fault fissures in the granite and diabase (usually along or near the porphyry dykes) and also in the fractures of the sedimentary rocks, and along the bedding planes of the same. The mineralogical character of the ore is virtually the same as that of the ores produced in the various mines at Globe, Cananea, Clifton, etc.

"The ores consist of carbonates of copper and of the various copper and iron oxides and sulphides. The predominating gangue is quartz. Generally stated, the ore bodies carrying oxides occur mainly on the contact of the different sedimentary rocks, also on the contact of the sedimentary rocks and porphyry and diabase. The sulphide ores will be found mainly in veins occurring in granite rocks, and in the porphyry and diabase. However, secondary copper ores may also be found in the veins associated with the intrusive rocks, especially in the upper portions of these veins.

"It is reasonable to expect that with the development recommended, a large copper mine will be opened up in Climax Hill (on Gaylor's claims). Altogether the future of the property is very bright. It must be borne in mind that the condition of a number of copper properties, which are now large producers, was at one time not at all as encouraging as is the present showing at the Troy mines. The property has every promise of becoming one of the great copper producers of Arizona."

LEO VON ROSENBERG:

Mr. Rosenberg reporting on the claims just to the northeast of the Gaylor claims states:

"According to the assays of a number of samples taken from the ore exposures, the ore carries from 2 to 9% copper. The returns of ore shipped in quantity several years ago to the Humboldt Smelter, near Prescott, show 3.55% copper. Thirty-two tons of sorted ore shipped as a test, in January 1914, to the smelter of the American Smelting and Refining Company at Hayden contained 5.22% copper. The gold and silver contents of the ore amount to about \$1.50 a ton (1914)." Today it would amount to 7 or 8 dollars per ton.

ROY G. MEAD: Was employed from 1912 to 1916 by Dept. of Interior as Mineral Examiner of the General Land Office. He passed upon the holdings of many of the important mining companies in Arizona and did much work in the Mineral Belt in which Troy is located.

"The geologic formation underlying the area embraced by the west end group is more or less complex owing to extensive faulting and displacement, caused by the numerous eruptive dikes which traverse the area. Briefly stated, the formation consists of a basal granite and diabase overlain by a sedimentary series consisting of quartzite, limestone, schist and conglomerates. The diabase occurred in the form in intrusions, and displaced the sedimentary beds. After the intrusion of the diabase the formation was subjected to movement and displacement by faults followed by later intrusions of porphyry in the form of strong persistent dikes cutting the granite, diabase and sedimentary beds. The ore disposition followed the intrusion of the porphyry dikes and its source is traceable to the primary mineralization which came up with the porphyry dikes.

"There are no less than twelve porphyry dikes traversing the group, all of which have had an important bearing on the mineralization of the area and with exploration at depth will be found to contain primary copper sulphides in sufficient quantity to be commercial ore under the present (1916) methods of mining.

"The dikes vary from fifty to one hundred feet in width, and in many cases are considerably wider. They are, with few exceptions, nearly vertical and traverse the property in a general NE and SW direction. The secondary surface ore bodies occur along the contact of the porphyry and limestone, and are known as contact ore bodies when occurring near the porphyry dikes, and replacements ore bodies when occurring in the limestone.

"The surface showings and conditions on the property are quite similar to those on some of the principal copper mines of Arizona, such as Magma Mine, Old Dominion and Copper Queen, where rich surface carbonate ores were found in limestone and other sedimentary rocks, the source of which was traceable to primary sulphide ores occurring at depth in porphyry and diabase dikes.

"The Alice vein traverses the Alice claims (Gaylor claims) and is a contact vein having a limestone hanging wall and a granite porphyry dike for a footwall. This vein has been explored to a depth of 350 feet by means of the Alice incline shaft and the Pratt Tunnel, and a large tonnage of carbonate ores extracted, which had a copper content in excess of 10%. The work done on this vein was for the purpose of extracting the carbonate ores, and not with the view of developing the primary ore bodies; therefore, sufficient depth has not been attained to reach the primary ores.

ROY G. MEAD (continued):

"In the Pratt tunnel, which reached a distance of 2300 feet sulphide ore in shattered quartzite was encountered at a distance of about 1600 feet from the portal and at a vertical depth of about 500 feet. The mineralization consists of fine particles of copper sulphide and native copper extending over 50 feet in width near the granite porphyry dike, the average copper content being 2.5%. (It should be noted that Mead made a positive statement "being 2.5%". An accurate average sampling was probably made when the tunnel was open and free from leaching and contamination).

Mead continues, "A map compiled by the writer several years ago when the ore body was exposed, is a geological section of the ore exposure of the shaft of the Alice Mine third and fourth levels. The ore exposed at that time was high grade and assayed from 6 to 12%.

"The fact that the mineralization near the surface in the limestone is so pronounced, together with the fact that there is a large area of mineralization in the quartzite, now commercial ore, (1916) exposed in the deeper workings, is conclusive evidence that the porphyry will be found to contain workable deposits of primary sulphide ores when developed below the leached zone. The surface showing, together with past developmental work, warrants systematic exploration, which in my opinion will lead to the development of a large copper producing mine.

"All of the previous development work on the property was done with the end in view of obtaining carbonate ores. This was a time when ore carrying less than 7% copper was considered unprofitable to extract, and before the time of working low grade primary sulphide ores. The history of the property is quite similar to numerous other properties in Arizona, all of which are on a steady producing basis, drawing their output from the primary sulphides encountered in the deep-seated eruptive dikes. With the favorable surface showing on this property and its similarity to the other prominent copper properties in Arizona, I feel justified in my opinion that proper development work will result in a large producing copper mine."

G.G. WALD: Was employed as engineer of the Ray Copper Co. and thoroughly understood the area when he examined the property.

"The country rocks are quartzite, limestone, diabase, porphyry and granite. The overlying sedimentary formations have been shattered, faulted, and tilted by the intrusion of the porphyry and later of the diabase. These eruptive rocks were intruded, in places, into the bedding places of the sedimentaries, and also followed up planes of weakness developed at angles to the bedding planes. These fissures and dikes strike generally in a NE to SW direction. There is one marked exception to this general rule, the Climax Fault, N10 degrees E, and dips 60-65 degrees to the NW, cutting the numerous NE-SW faults at angles varying from 45 to 60 degrees. The Climax Fault is a strong fissure; a width of 30 feet between well defined walls was measured. To the north the fault swings around into the northwest and widens out. The space between the walls is filled with crushed drag from the quartzite and lime beds it cuts, and both porphyry and diabase have been intruded into the fault. On the surface it is strongly iron stained, and at many places it shows stains and stringers of copper carbonate. (All of this Climax Fault is on Gaylor's claims. Gaylor picked up a five pound lump of chrysacolla that assayed 36% copper, on this fault.)

"The fissures and faulting of the sedimentary formations by the intrusion of the igneous rocks has created an ideal condition for the deposition of minerals from mineral bearing solutions. The values consist of carbonates and silicates of copper, and chalcopryrite and chalcocite, the sulphides of copper. This mineralization has been found to consist of replacement ore bodies in the sedimentary beds adjacent to faults of intrusive dikes and of contact ore bodies between igneous rocks or between an igneous rock and the sedimentary deposits. The ores were deposited from vapors and mineral bearing water accompanying and emanating from the igneous intrusions. In this section the porphyry and diabase are both mineral carriers and mineralizing agents. Note the Magma Mine, where the ore body is associated with porphyry dike intruded into a fault fissure cutting the sedimentary beds. The diabase is not as favorable for ore deposition, but at Globe and Ray sulphide and oxide ores have been found in the diabase, usually as a contact.

"On the Pratt tunnel dump a pure crystalline quartzite with disseminated values in chalcocite was found. The map shows that two beds of brecciated quartzite were crosscut near the end of the tunnel; the first, 30 feet wide, was drifted on for 120 feet, and the second, 260 feet wide, was drifted on for 80 feet. It is reported that this quartzite ran 2% copper; and the fact that the drifts were driven on the quartzite, and at no other part of the tunnel, indicates that encouraging values were encountered. However, at that time ore of 2% copper content had no commercial value. This quartzite ore could be cheaply milled, and as it will have a high ratio of concentration, would be pay ore today (1916?) A sample of this quartzite taken below the surface of the Pratt dump ran 5.1% copper."

JOHN C. DEVINE: In 1916 Devine voluntarily resigned as Asst. Superintendent at the Ray Mine in order to start mining the ore in the Pratt Tunnel. This was during WWI when copper price was high. Price took a nosedive right after war ended and before Devine could uncave the tunnel and reach the ore. He knew exactly what was in the Alice workings and the Pratt tunnel because he had worked there when they were operating earlier.

"The formation consists of limestone, quartzite, granite, diabase, and porphyry. The Climax Fault, an intrusion of porphyry 40 to 50 feet in width, carrying copper values in the oxidized zone in the form of carbonates, and evidencing a very much leached condition and indicating that when the primary zone is reached, high grade copper should be found in quantity. The prominent features of this fault are its strength and regularity, traceable on its surface as it is for a distance of more than 2,000 feet. Copper values are to be seen along the fault at several points where surface work has been done.

"Much ore has been mined from this part of the property, mostly high grade copper (8 to 16%). The Pratt tunnel which was driven a distance of about 2,000 feet some years ago, has opened up some ore in two different places. The elevation of this tunnel is about 250 feet deeper than the Climax or Alice shaft, and just brings the development to the primary zone where both primary and secondary sulphides are in evidence quite abundantly. This part of the property offers a better opportunity than any other for the opening up of a mine of large proportions.

"The work done on the east side of the Alice shaft on the lowest level cut a porphyry fault running somewhat across the general trend of formations, and it is this fault that produced some very high grade ore, and appeared to be making downward with increasing strength. It would require driving the Pratt tunnel five or six hundred feet east in order to cut this ore, and considering the pitch of the orebody, a stoping backing of about 400 feet would result.

"The property is so situated with relation to the railroad, highway, and river that transportation facilities should be ideal, all down grade. The proximity of several smelters is an economic factor of more than ordinary value.

"The limit or volume of ore that could be mined here once the property is properly opened up, should be very extensive, and judging from a comparison of the formations here with those of other large producers in the district, mining costs could be maintained at low or lower than those of any other property now producing on a large scale. Due to the possibility of considerable high grade ore running 10% or better being encountered on cross faults throughout the area, it can be stated beyond the adventure of a doubt, that commercially the property will average better than 5% on a very large scale of operation."

F. L. CROTEAU: Inspected and reported on the Gaylor claims Feb. 1971 for Shawnex Mines and Rimrock Mines of Canada who had an option on the property at that time.

"All claims are contiguous and are staked in accordance with the laws and regulations governing Mineral Rights in the State of Arizona.

"Comments made through various mining reports indicate that various engineers were conscious of the possibility of copper sulphide ore at depth in the area.

"The general area under consideration has been one where most developments or ore have originated as carbonate replacement bodies in the limestone and ultimately these have given way to potential sulphide ore bodies in the deeper seated intrusive bodies.

"Sedimentary rocks in evidence were quartzite, limestone, phyllitic schist and conglomerate. Intrusives present were diabase, dacite porphyry and granite which ranged to altered granodiorite in composition. The porphyry and diabase occur from reasonable sized dykes to more broad intrusions (diabase) in form. Brecciation is not an uncommon characteristic of the rock formations.

"There is considerable evidence of alteration both in the sediments and in the intrusives and can be attributed to the metamorphic and hydrothermal action associated with the intrusive rock formations. The most important alteration effect, associated with the development of ore bodies, is the lime-silicate alteration sequence.

"The main copper bearing areas of Arizona have been subjected to considerable faulting and fissuring which originated from broad tectonic movements and from the more local intrusions of igneous rock. The faults and fissures thus created have proven to be excellent sources for ore deposition within the sedimentary rock sequence. The intrusive diabase and porphyry bodies were the likely carriers of primary sulphide material from the main igneous mass and should act as focal points for copper ore concentration. The Troy area shows pronounced faulting to occur in a NE-SW trending direction and this together with the resultant fissuring has proved to be the locus for the ore bodies that occurred in the Alice Mine. A pronounced north-southerly fault occurs in the more westerly portion of the claim block and creates a sharp demarkation line between the limestone and quartzite bodies and gives definite indication that the quartzite body to the west formed the up-thrown side of the fault.

"Previous geological work reported from the Alice Mine-Pratt Tunnel indicate a descending series comprised as follows: Martin Limestone (Devonian), Troy Quartzite (Cambrian), Diabase Sill (Mesozoic), Troy Quartzite (Cambrian), with the entire series intruded intermittently and irregularly by Quartz Monzonite Porphyry (possibly Tertiary) occurring both fairly massively and as definite dykes.

Continued

F. L. CROTEAU Continued

"A local zone approximating a phyllitic schist occurs on surface at the approximate position where the vertically upward extension of the Pratt Tunnel would intersect the main N-S fault separating the limestone and quartzite bodies. This may be an occurrence of Pinal Schist (PreCambrian).

CONCLUSIONS

"The subject area has a record of production from oxide ore bodies and old reports indicate that primary sulphides were encountered during extraction of the oxide ores.

"Structural conditions on the property are favorable for the accumulation of ore bodies.

"The broad sedimentary cover on the property has been subject to fault activity and to substantial igneous intrusion.

"The igneous intrusives are essentially diabase, which appears to occur as a sill or flatly bedded deposit, and Quartz Monzonite Porphyry which occurs as small mass and more particularly as dykes ranging from a few feet thickness to around 200 feet.

"Ore occurrences appear to be a function of fault action. The fault areas having opened the channels along which igneous intrusion took place carrying the copper sulphides into areas where ultimate near surface oxidation took place.

"As a consequence of the above the main areas of exploratory concentration should be those embracing faults and intrusive rock formation. Recorded information shows that minor copper oxide occurrences will commonly lead to major bodies both in the horizontal and vertical planes, and that oxidation is not merely a near surface phenomenon. The substantiation of primary sulphide bodies on the claim group is a feature that requires deep seated geological techniques."

Mr. Croteau went on to recommend geophysical work and drilling.

GEORGE A. CHECKLIN, B. Sc., P. Eng. Carried out geological work on the Gaylor claims between May 27, 1972 and Nov. 26, 1972 and was the geologist working on the two drill holes for Rimrock Mining Corp. and Shawnex Mines of Canada but had no financial interest, either direct or indirect in the lands or securities of those two firms who had the property optioned at that time.

"Below the upper weathered section in both holes iron and other metallic sulphides and oxides proved to be widespread vertically. The sulphides are evidently of primary origin.

"Silver, zinc and copper mineralization is present through much of the drill core, as well as molybdenite more locally. The quartz monzonite porphyry intrusives are potential mineralizers of adjoining silica-rich rocks, and may themselves be mineralized. Among the sediments the Troy Quartzite in particular is susceptible to mineralization. Other bodies of quartz monzonite porphyry, besides those encountered in the drill holes, outcrop on the property. Exploration of this property should continue. More geological mapping and another program of diamond drilling are recommended. Drilling was terminated by the drilling contractors, Metler Bros. Drilling Corp. before the drill program was completed and not by Rimrock Mining Corp.

"The Alice and the Buckeye Mines were important workings (1900-1907) and the Alice Mine in particular produced much high-grade carbonate ore. Excerpts from old reports speak of good copper values in the northern end of the Pratt Tunnel. The claims lay idle until they were acquired by James E. Gaylor in 1941. An induced polarization survey was carried out by Scintrex Mineral Surveys in June 1971. This survey encountered difficult ground contact problems (dryness, rock outcrop, etc.) and severe telluric current noise and coverage was rather incomplete. However, one complete anomaly was outlined to the east of the Alice Shaft and part of another anomaly was outlined in the Buckeye Shaft area.

"The normal sequence of the sedimentary rocks in this area, as illustrated by Lacy's map and sections, is as follows: Mescal beds below are overlain by the Troy Quartzite, which is intruded by a thick diabase sill. The Troy Quartzite in turn is followed by the Martin series upwards. Here, as in the Ray area, there are volcanics between these sediments and the Troy Quartzite.

"As mentioned above, this formation has been intruded by a diabase sill, which may extend a long way, since it was encountered in the Pratt Tunnel, and may be the one which outcrops in the Buckeye Shaft area. The top part of the limestone series encountered in DDH 72-81 may be Escabrosa Limestone, which succeeds the Martin Limestone upwards in the Ray area. Some gypsum was noted in the Martin series.

"Much of the quartz monzonite porphyry proves to have been altered in the classic manner associated with "porphyry coppers and has been bleached and sericitized.

GEORGE A CHECKLIN Continued:

"In general, the sedimentary rocks encountered during drilling follow the above sequence, especially in DDH 72-81, which went down into a relatively stable area. The Mescal beds were not reached, since this hole was not completed. DDH 72-61, however was evidently drilled into an unstable area. The hole passed through several slips and faults, and these included a wide fault zone near the bottom. In addition, there was over 500 feet of intruded quartz monzonite porphyry in this hole, probably in part as sills as well as dikes.

"Several faults are known to cut across the property. The central part of the property is underlain by a block, capped by limestone, which has been down-thrust relative to the quartzite masses to the east and west. The movement occurred along two major faults running approximately north-south. The fault into which the Alice Vein porphyry dike was intruded (in the Alice Mine area) has a NE-SW direction, and this is also the same general direction of several deep drainage channels which cross the area.

"Except for the weathered part of the limestone capping, where it has been replaced by iron oxides, pyrite is found in all the rocks. Locally it is sparse or even rare, but in other sections it is an important constituent. It is both disseminated and in fractures. Pyrite is particularly important in the quartz monzonite porphyry and the Troy Quartzite. The Troy Quartzite also carries some dark-gray sphalerite, disseminated and in fractures, and normally occurs in close association with pyrite. The Troy Quartzite seems to be fairly susceptible to the deposition of sulphides, since this type of mineralization occurred in much of the drill core from this formation in both holes. The supposed Mescal sediments also seem to be somewhat susceptible to mineralization. A band of such sediments sandwiched between two of four thin fine-grained porphyry intrusives in a strong fault zone carried marked chalcopryrite, cuprite, and native copper. The chalcopryrite was often associated with veins or patches of green lime-silicated, while the native copper was in fractures.

"The porphyry in DDH 72-61 carried some disseminated chalcopryrite locally in short sections, again often associated with lime-silicates, while some other sections carried a little disseminated molybdenite. Apparently more important, however, were sections of porphyry which carried a red or reddish brown mineral with an adamantine lustre and a bright orange-red streak. Although tentatively identified at first as suprite, this is more likely to be ruby silver. Other mineralization included native copper in a few fractures, and a little yellow-brown sphalerite. The latter was generally surrounded by dark sulphide. In other rocks besides the quartz monzonite porphyry chalcopryrite occurred in a number of places. The diabase and the volcanics contained some very fine-grained chalcopryrite. Some malachite was present in the top part of the Troy Quartzite and locally further down. A little gold is present locally. In summary, silver, zinc, and copper minerals are present through much of the Troy Quartzite and the quartz monzonite porphyry in the two holes drilled, and molybdenite is present locally.

GEORGE A CHECKLIN Continued:

"The level of mineralization in the Troy Quartzite was somewhat better in DDH 72-81 than in DDH 72-61, and because of less faulting, etc., there was more Troy Quartzite present. There also appeared to be more black and blue-black sulphide with the sphalerite in DDH 72-81.

"DDH 72-61 went into the footwall of the northerly-dipping fault and any accompanying dike. As it was deepened it therefore progressed further away from the potential source of mineralization.

"It is interesting that in DDH 72-61 there was some mineralization several hundred feet away from the fault, and as low down as the Mescal beds. The malachite found mainly near the top of the Troy Quartzite was probably produced when carbonate solutions from the limestone above came into contact with copper released during the partial breakdown of the sulphides in the upper part of the quartzite.

"The sulphides seen in both drill holes are evidently all primary sulphides. In the two holes so far drilled the widespread occurrence of iron, silver, zinc, and copper sulphides, as well as more local molybdenite, indicates that the general area is a good one for further exploration for minerals. Drill cores show that the Troy Quartzite in particular, but also the quartzitic Mescal sediments, are amenable to sulphide mineralization given a source of mineralizing solutions.

"Troy Quartzite, either exposed or beneath the Martin limestone series, underlies most of the property, and these and the lower sediments are intruded by numerous porphyry bodies. The thickness of the Troy Quartzite and the Mescal sediments underlying the property are not yet known, since intrusion and faulting have obscured the picture. Dr. Lacy indicates that the Troy Quartzite, including the diabase sill within it, is slightly more than 550 feet thick.

The stratigraphical section of formations in the Ray area indicates that there the Troy Quartzite, together with the much thinner Abrigo beds lying between it and the Martin limestone have a total thickness of about 1150 feet. In any case there is a large volume of Troy Quartzite which carries the potential for metallic mineralization underlying the claims. We know very little about the Mescal beds underlying the property, but evidently parts of them carry similar potential for metallic mineralization. In the Ray area the Mescal beds are about 270 feet thick, and the volcanics above are about 180 feet thick.

"The widespread silver-zinc mineralization raises the possibility that large low-grade silver deposits, as well as copper deposits, may exist within the area of the claims.

GEORGE A CHECKLIN Continued:

"The intrusive diabase, which is exposed in some large bodies on the surface as well as occurring in the drill holes, cannot be ruled out as a possible source of mineralizing agents. The porphyry intrusives in this region may not all be of the same age, nor carry similar types of mineralization. In the Alice Mine area there is a porphyry dike, intruded into a fault, but the early information indicates that the high-grade carbonate ore lay in the hanging wall of the structure. A considerable quantity of original primary copper sulphides would have been necessary to give rise by oxidation and redeposition to these copper carbonates. Although there is sulphide mineralization found in the Alice Vein porphyry dike at depth, where intersected by DDH 72-81, it is not of the same type as that which must have been present at or near the surface.

"There is a strong fault a few hundred feet west of the Alice Mine and the Pratt Tunnel, as mentioned earlier. There is some indication that porphyry intrusion has taken place along it, and it may have been important also as a conduit for hydrothermal solutions. At the top of the diabase sill in DDH 72-81 there was some native copper in fractures. The contacts of the diabase and the fractures in it may have acted as channels for mineralizing solutions. In the Ray district, of course, diabase is an important host for copper mineralization..

"The main base-metal sulphide appearing in the two drill holes is dark-grey sphalerite, with which the silver minerals are probably closely associated. Galena was not seen in the core. In a number of cases (as in Bingham, Utah; Butte, Montana) copper deposits lie closer to the parent intrusion, while silver, lead and zinc deposits are further out. Silver, zinc, and lead occurring together suggest fringe areas of copper mineralization. The lead will be found further out than the zinc.

"Silver deposits were being mined early in the history of Globe, Arizona. The Silver King mine at Superior was an important producer of silver and the Magma mine has been a producer of both lead and zinc. Both areas, not so far from the Troy claims are now known mainly for their important copper production. The Ray copper desposits, like other "porphyry coppers", produce silver-bearing ores.

"Apart from the Alice Vein porphyry dike there are numerous other porphyry bodies to be seen on the property. There is a large body of quartz monzonite porphyry about 700 feet SW of the Alice Shaft. Several zones of alteration within this body are seen on the surface, and malachite was found in one of them. Dr. Lacy shows a faulted contact on the NE side into which two short adits have been excavated at some unknown date. This body is more extensive than is shown on Lacy's map, and a width of at least 350 feet is indicated. In the region of the Pratt Tunnel portal

GEORGE A CHECKLIN Continued:

there are some large masses of porphyry which appear to be interconnected except where cut by the main N-S fault. East of the Alice Shaft there is a proliferation of porphyry dikes, some of which apparently stem from the Alice Vein porphyry itself. At the east end of the property a large body of quartz monzonite porphyry parallels a diabase body, and both of these intrusives lie within an area of Troy Quartzite. They are probably sills.

"Since the Troy Quartzite can carry sulphide mineralization there is a possibility of a zone of enrichment at some depth below the surface. Some drilling through exposed Troy Quartzite is needed to probe for information. On the expanded Troy group of claims there are numerous drill targets, mainly the Troy Quartzite beds updip from and on the hanging wall sides of porphyry dikes, and the porphyry bodies themselves. Deep holes of more than 1,000 feet would normally be necessary to reach a quartz monzonite porphyry basement. It seems very important to check the levels of mineralization in the Quartzites cut in the north end of the Pratt Tunnel. Therefore a drill hole should go down as close as possible to the surface trace of the tunnel in that region. It should be collared slightly West of the tunnel line, both to miss the tunnel workings and in case there is faulting between the tunnel and DDH 72-81. It should be a vertical hole. This hole should reach the level of the tunnel at between 600 feet and 700 feet down, but should of course go deeper if still in mineralization. If this hole is successful in corroborating the good copper values given in earlier reports, the next holes in the program should be drilled at successive 200-foot intervals towards the SW to follow the mineralization.

"There is an extensive area of porphyry which outcrops about 700 to 1050 feet SW of the Alice Shaft. There are several rusty and altered zones through this, at least one of which carried malachite near the surface. The larger quartz monzonite porphyry bodies should all be checked for mineralization at depth. This one in particular, because of its proximity to the Alice Vein fault should be drilled. Two areas of exposed Troy Quartzite, one around the Pratt Tunnel portal and one to the south of it, would make good drill targets. They are near the main N-S fault, are lower in elevation than most of the other areas of the property, and are in a region of much porphyry and diabase intrusion. Although DDH 72-81 was not completed, much useful information has already been gained from this hole. In deepening this hole the drill, if continuing in porphyry from the present bottom of the hole at 1,000 feet, it should go at least 200 feet into the porphyry.

"The two holes drilled during the 1972 program indicate that the area to the north of the Alice Mine is underlain by rocks carrying widespread sulphide mineralization. All other quartz monzonite porphyry bodies in the area were potential mineralizing agents and may carry metallic minerals themselves."

EXCERPTS FROM COPPER HANDBOOKS

1902: "Oxide and sulfide ores are found in a vein 3' to 11' wide, of unknown length and depth, and averaging 12% copper. About 3,000 tons of ore stocked at mine. Production for 1901 was 120,000 lbs. secured from a 500 ton shipment (12% cu) made to smelter for purpose of securing thorough reduction test. Company estimates output of 1902 at 3,600,000 pounds. 90-ton matting furnace and electric plant planned."

1903: "Principal development of Troy property includes Alice, Climax, and Buckeye Mines. Ores are oxides and sulphides with estimated average of .12% copper. Smelter returns for 1902 gave an average of 10% copper. Vein is 11 feet wide and gaining in width at bottom of Alice shaft. The smelter has a 60 ton furnace; capacity is to be increased to 250 tons in 1903. The furnace turns out high grade black copper, and was in operation during 1901 and 1902 but was closed down Sept. 1902 due to the shortage of coke and water. The expensive wagon haul of 75 miles has been a serious drawback in past operations, but a railroad is to be completed in 1903." (Railroad only one mile from Gaylor's claims--also good highway.)

1904: "The main working tunnel of the Alice Mine is about 1700 feet long and will intersect the lode at a depth of nearly 800 feet. Ores of the Alice are oxides and sulphides from 8% to 16% copper. The company has expended \$500,000 in development and equipment and the property is regarded as valuable if given the railroad facilities absolutely necessary for its profitable operation."

1905: "The Buckeye winze is said to show a 25 foot vein of malachite, giving smelter returns of 6 to 10% copper. The old 60 ton smelter at Riverside closed down in Aug. 1904. The new smelter was blown in Jan. 1905, but closed down after 10 days owing to washouts which prevented receipt of coke and petroleum."

1906: "The Manhattan group (northeast of Gaylor's claims) is claimed to show 500,000 tons of 6% sulphide ore."

1907: "Company planned to ship ore from Arizona to Colorado for reduction. Suspended operation October 1907."

1911: "The Alice tunnel (Pratt) is about 1700 feet long with back of about 800 feet. Has 4 shafts, including a 500 foot two-compartment main working shaft. Ores in upper workings are slightly auriferous and argentiferous oxides, succeeded by sulphide ores claimed to range from 8% to 16% copper, with small gold and silver values. Vein is 3 feet to 11 feet in width and widest in the bottom working, where it is very soft, requiring spiling. The 375 foot I compartment Buckeye shaft has a 5 foot ore body with a 2 foot pay streak carrying 9% copper and the Buckeye winze is claimed to show a 25 foot vein of malachite, giving returns of 6 to 10% copper."

EXCERPTS TAKEN FROM OLD NEWSPAPER CLIPPINGS FOUND IN
THE DEAN'S OFFICE AT THE UNIVERSITY OF ARIZONA

June 24, 1916, Gila County: "Twenty-five miles south of Globe steady development is under way at the Troy copper claims, owned by the Troy Arizona Copper Co. of Boston and New York. R. G. Mead is supervising exploration. Prospects are fairly good. The same people have bonded the Cane Springs gold claims, two miles south."

June 1916, Troy: "Eventually, however, the main Troy workings will be on the west end of the group of claims. The Buckeye shaft, in that area, is down 500 feet and a crosscut will be run from the bottom to tap the climax Fault, 1,000 feet distant, which has an excellent copper showing on the surface. The Alice shaft is down 400 feet and passes through 50 feet of 4% sulphide ore, too low in grade to be handled profitably at the time it was opened. This ore will be developed through what is known as the Pratt Tunnel."

Nov. 30, 1918, Ray: "Three shifts of men are now at work opening up the old Pratt Tunnel at Troy in order to reach some large ore bodies of low grade concentrating ores that are known to exist in this portion of the property. In Devine's opinion a commercial proposition of considerable size will be open up through the Pratt Tunnel. Sulphide ores that will run 10% or better in the red metal have been encountered on the Rattler vein at Troy-Arizona, where development operations are going forward apace."

John Devine voluntarily resigned from his job as Asst. Superintendant of the Ray Mine in 1918 (during WWI) in order to go after the ore in the Pratt Tunnel which was caved in. Devine had worked in the Alice Mine and the Pratt Tunnel from about 1902 and had full knowledge that the ore in the tunnel was then of commercial grade and began to uncave it in 1918. The faults gave him more trouble than he had anticipated, requiring almost a year of work, and he was still only 1100 feet from the portal, while the first ore began at 1600 feet from the portal. Apparently the war ended, and copper prices plunged 33%, and he probably was running out of money as well, and he discontinued the work.

Gaylor opened the full 2230 feet length of the Pratt Tunnel, requiring 4 years of work at a cost of over \$50,000, only to have it cave in again at 700 feet from the portal.

approx.
Footage

Hole 72-61
Only 26 samples analyzed

Porphyry 559 feet
Diabase 97 "
Quartzite 206 "

185
201
209
256
287
289
295
340
395
488
491
491-628
632-764
764-766
786-789
789-814
822-875
875-928
928-941
941-1088
1088-1098
1098-1148
1154-1200

pyrite
pyrite, zinc
pyrite
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" , zinc, cuprite
" " "
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" cuprite
" zinc " Malachite
" " "
" " "
" "

Malachite
" native
" copper

approx.
Footage

Hole 72-51

Porphyry 5.5 feet
Diabase 11.8 "
Quartzite 290 "

only 23 samples analyzed

The first half of this 1,000' hole was limestone cap.

337	Pyrite				
418-480	"				
540-565	"				
557-579	"				
579-680	"	Cuprite	chalcopyrite	malachite	zinc
680-684	"	native			
684-802	"	Copper			
706-798	"				
798-802	"				
802-905	"				" molyb-
905-941	"	"	"	"	"
941-978	"	also translucent blue	Troy Quartzite		
978-980	"	"	Indochite		
980-984	"				
984-985	"	"	Bornite		
985-990	"				

Gold: Trace to .01 oz. was found from 632-978

Silver:

- .26 oz. from 632-680 (48')
- Trace from 803-853 (50')
- .9 oz. from 853-905 (52')
- .54 oz. from 905-941 (36')
- .32 oz. from 941-978 (37')

Total. 223 feet

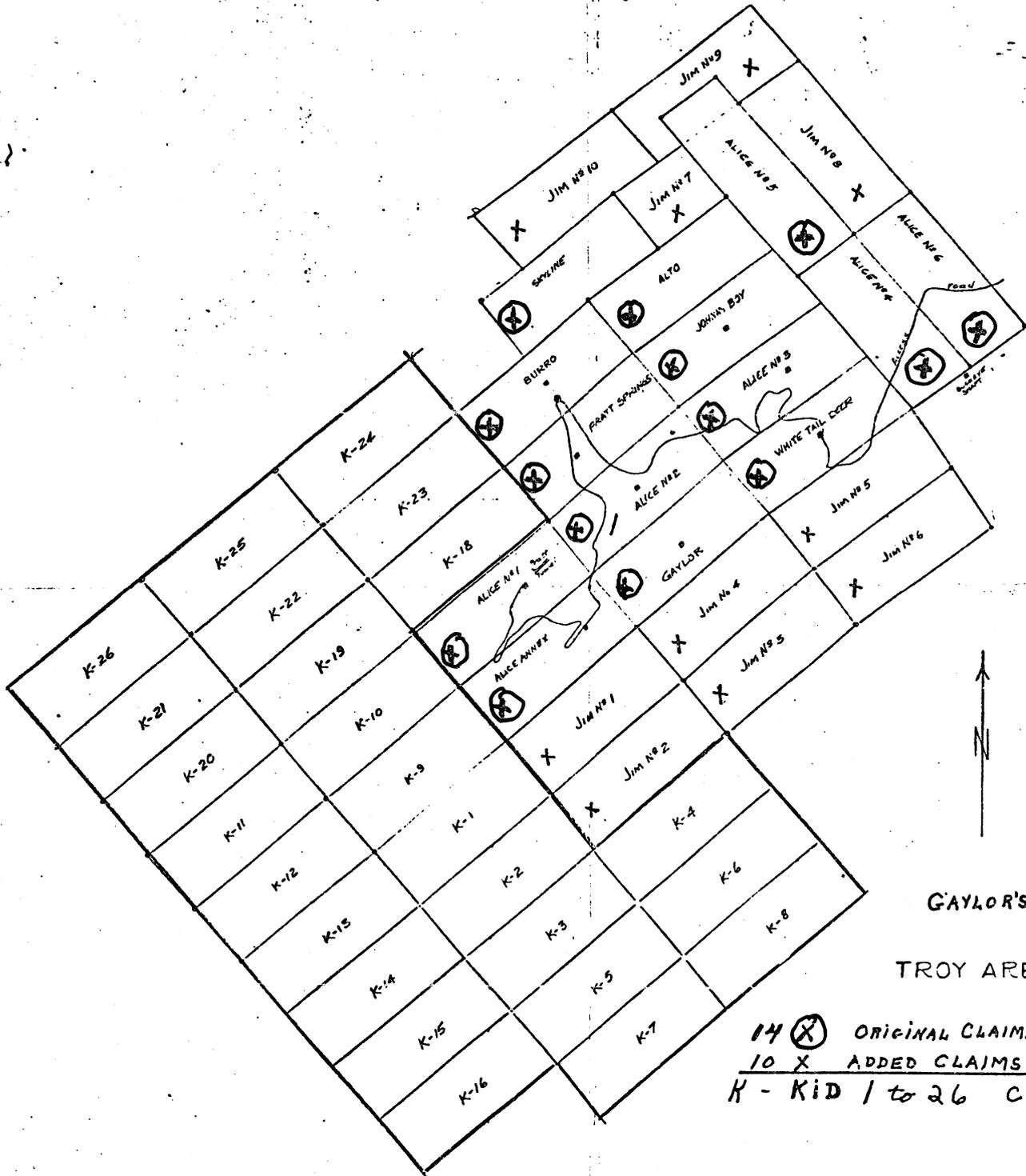
Copper:

- .22% from 652-662 10 feet
- .13 " 662-672 10 "
- .28 " 672-680 8 "

*James E. Gaylor*6742-D E. CALLE LA PAZ
TUCSON, ARIZONA 85715

602-886-9663

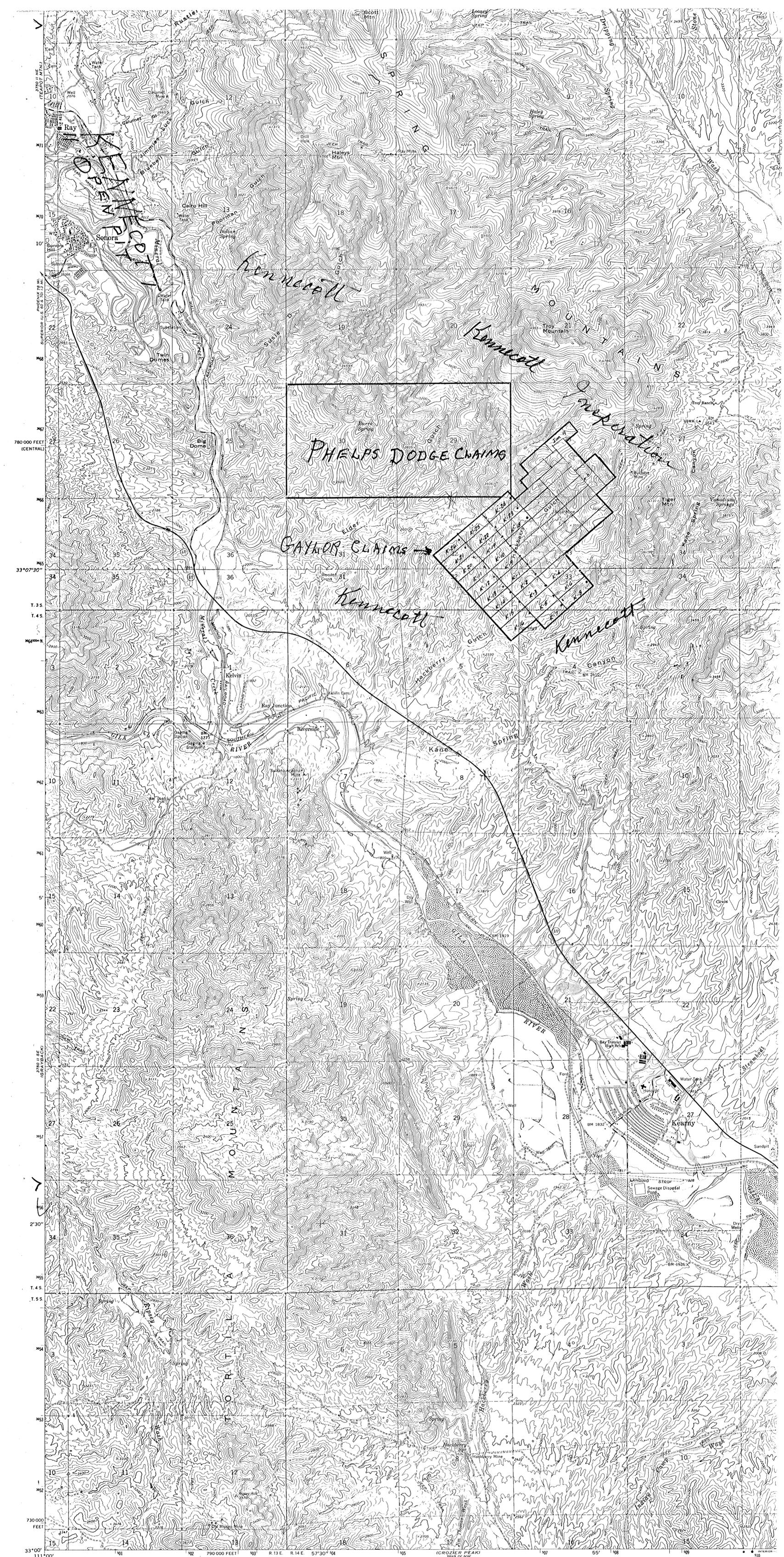
*June 27, 74**Dear Groux,**I am now offering 49 claims**for \$2,500,000.**Reply me promptly if interested.**Very sincerely**Jim Gaylor*



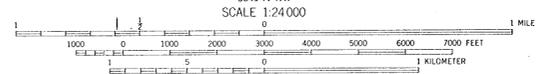
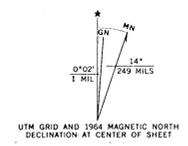
SCALE
 1" = 660'
 49
 GAYLOR'S CLAIMS

TROY AREA CLAIMS

14 (X) ORIGINAL CLAIMS -- IN RED (X)
 10 X ADDED CLAIMS -- JUNE 1972
 K - KID 1 to 26 CLAIMS NOV. 72



Mapped, edited, and published by the Geological Survey
 Control by USGS and USC&GS
 Topography by photogrammetric methods from aerial
 photographs taken 1962. Field checked 1964
 Polyconic projection. 1927 North American datum.
 10,000-foot grid based on Arizona coordinate system, central zone
 1000-meter Universal Transverse Mercator grid ticks,
 zone 12, shown in blue
 Fine red dashed lines indicate selected fence lines



CONTOUR INTERVAL 40 FEET
 DOTTED LINES REPRESENT 20-FOOT CONTOURS
 DATUM IS MEAN SEA LEVEL



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