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May 17, 1928.

Mr. Daniel Moreau Barringer,
1242 Real Estate Trust Bldg.,
Philadelphia, Pa.

Dear Mr. Barringer:

For the first time in the last two weeks I have a few moments to spare from rather pressing matters, largely in connection with the Crater work, and will write you my promised letter in reference to the Jack White, or Eyrick, Gold Mine, presented to you by Barnes.

I am enclosing a printed copy of a report on this property by Mr. James, who is reputed to be a careful engineer, and who examined the property, as you will note, in 1919. Since the date of James' examination, some additional work has been done, and the 300 foot level has been opened up and the sampling of same by Barnes is shown on the attached blue print. Also the 330 foot level was run out a short distance, and 4 samples were taken, two of which look very good.

From my casual examination of the property I cannot attempt to give you any estimate of tonnage or values, particularly since the vein is very varying in width, and also the sampling indicates equal variation in values. None of the assay maps which have been shown me are quite complete, for James sampled certain portions of the mine, Barnes has sampled certain other portions, and the sampling by Lewis Douglas shows much higher values than either one of the others. Probably the gold is coarse and spotty, which makes any accurate sampling particularly difficult.

Mr. Barringer, - 2.

May 17, 1928.

Barnes has estimated that there is now approximately 5,000 tons of ore blocked out, with an average value of about \$11.00 per ton, and this figure seems reasonable. They have a very good 10-stamp mill, but only 60/65% of the values can be recovered by amalgamation, and accordingly it will be necessary to add a cyanide plant, which, in my opinion, with complete accessory equipment, would cost about \$5,000, unless one is able to pick up such a plant second hand on advantageous terms. *W. L.*

With the cyanide plant installed the margin of profit on the ore developed should be about \$3.00 per ton, or say \$15,000 for the present ore reserves, and in addition there are about 600 tons of tailings, which Barnes tells me will average a little better than \$3.00 a ton and on which there might be \$1.00 or so per ton profit.

The camp buildings and mine equipment are all very good of their kind, and as a development proposition I think the outlook is favorable, although the property is located in a district which bears a very poor reputation and where there have been many mining losses sustained, and so far as I can learn not a single property or prospect has ever yielded a real profit to the investors after repaying the capital expenditures.

If the sampling of the mine should check Barnes' figures I believe it would be advisable to put up enough money for some additional development, particularly below the 300 level, and to open up at least one more level, which should be down below the water level (which Barnes figures comes in at 330 feet) and would

Mr. Barringer, - 3.

May 17, 1928.

probably serve to indicate the value of the sulphide ore. If such development was satisfactory, the cyanide plant would no doubt be justified and a reasonably small profit would be assured if the new money would come in on advantageous terms.

In regard to terms, Barnes is certainly very reasonable, but I am not sure that his associates would altogether agree to his proposition. Barnes tells me that there are now outstanding 27,000 shares, which were purchased at \$1.00 per share, and that 23,000 additional shares have been authorized for issue. He plans to work out an agreement whereby parties agreeing to finance the development and the construction of the cyanide plant would obtain an option on the controlling interest of the Company, and, if I understand rightly, might acquire this interest for a total of some \$20/25,000, which should be ample to cover the cost of considerable development as well as the cyanide plant.

Since the profit which can be figured at the present time, even with the cyanide mill erected, is only about \$15,600, and since the new capital would only get 50% of this profit, it is very obvious that the investment as it stands today is not an attractive one, and the whole future hinges on the results of the development work which would have to prove up at least another 20,000 tons of similar grade to the present ore reserves in order to give the investors back their money.

In such a narrow vein and with limited ore shoots I doubt very much if this additional tonnage is likely to be developed without going down three or four levels, and so it appears

Mr. Barringer, - 4.

May 17, 1928.

to me that the chances of success ultimately depends on either the vein widening or, as seems more probable, on the values increasing after one reaches the water level and the sulphide ores.

As a cold-blooded mining proposition, the property is not attractive, but as a speculation it has good possibilities, and gambling a small amount of money, say \$5/10,000 would probably give a lot more information as to the grade of the ore in the lower levels, and the probabilities of the mine probe^{ving} really worth while.

In regard to the sampling of the property, I have written to Don Reed, who was my field engineer at Humboldt in '26, and who would, I think, be glad to undertake this work on terms which would be well within the figure mentioned in my previous letter. If Reed is not available I can probably secure somebody else, or Harbauer might be able to do the work after he completes supervising the erection of the machinery at the Crater, which should be around the middle of June.

Personally I am taking all the gamble that I care to in the Meteor Crater venture, but if you should decide to go ahead with this Barnes property I have some friends in California who might be willing to join you, provided always the sampling gave satisfactory results, and I will be glad to follow the matter up as you may desire, and as time and other work permit.

I will just mention in this letter receipt of yours of May 8th and note that you believe there is a good chance of interesting the Mystic Iron Company in the Juncos Iron property. I certainly hope that something will come of these negotiations.

Mr. Barringer, - 5.

May 17, 1928.

I might also mention that although I do not believe there is any good reason for me to come East in connection with the Crater affairs at the present time, yet if there should develop any substantial difference of opinion among the directors regarding the contracting of the shaft sinking, I might be able to come on and spend a day or two explaining the situation fully and giving them the benefit of such opinions as I hold on the subject. I had made a definite engagement to be in California and thereabouts around the 12th of June, but it is possible that the work which I had planned to do may be postponed, and in that event I could slip East the early part of June and be back here about the middle of the month, by which date I believe our plant and equipment will be completely erected and am hoping that we can have the shaft sinking crew right on the job.

With personal regards,

Sincerely,

GMC-s

May 28, 1928.

Mr. Daniel Moreau Barringer,
1242 Real Estate Trust Bldg.,
Philadelphia, Pa.

Dear Mr. Barringer:

This will acknowledge yours of May 22nd. I was at the Crater Friday and Saturday and will write a report to Mr. Shaw tomorrow. I had earnestly hoped to be able to get off the complete report on the shaft sinking proposals, together with recommendation, tomorrow also, but I have had to do considerable extra correspondence with some of the contractors and cannot hope to mail the said report before Wednesday. Will surely make every effort to get it off then.

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In reference to the Jack White Gold Mine, by all means copy as much as you care to of my letters in corresponding with Barnes. I really do not see any great resemblance between the geology of the Congress district and the geology of the Jack White and adjoining properties. It is true that some of the same types of rocks are found, but the Congress was a large and well defined vein which could be traced a long distance, and which went down to a very considerable depth on a flat ~~ph~~line, and while I do not recall many details concerning the theory of the ore deposition it seems to me that it was quite dissimilar from the little narrow vein found just north of Phoenix.

None the less it seems to me that for those who are willing and able to take a gambler's chance, a few hundred dollars would be

Mr. Barringer, - 2.

May 28, 1928.

well spent in going down below the water level of the Jack White Mine to see whether or not the size and value in the vein really improved after the water level and sulphide ore is reached.

Barnes is of the opinion that the sulphide ore will show much better values, which, as you state, is contrary to general experience, but it is quite possible that copper or other mineral may come in and the few samples which he showed me of sulphide ore certainly looked very attractive. From such an examination as I could make and from the maps which were shown me, I do not feel that there is any particular tendency of the ore shoots to narrow as depth is gained. They appear to pinch at intervals and in an entirely irregular manner, and very likely there are some fairly wide pockets or bulges in which good values might be found at almost any point.

I have a letter from Reed, who has recently been sick, but expects to have a permanent employment in the course of the next few weeks, but, none-the-less, believes he would be able to obtain a week or ten days leave of absence in order to sample the property if you should desire to have him do so, but if there is no particular hurry about the work, Harbauer would probably be available soon after the first of July.

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I note all that you say in reference to the Mystic Iron Company and should be interested to learn if they care to follow up investigation of the Junction Mine, which no doubt may be set

Mr. Barringer, - 3.

May 28, 1928.

aside for the time being if they are really involved in such a deal as indicated in your letter.

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To return to the Crater situation, and particularly in regard to the shaft. I have given very careful consideration to the type and size of shaft and have discussed this matter at considerable length with a number of the most experienced mining men in the State, as well as shaft contractors and others. If we had \$500,000, instead of half that amount available for exploration, I should have preferred to sink a three-compartment shaft, but inevitably this would have involved more expenditure and also more expensive mining equipment. Fitch's estimated the labor alone on a three-compartment shaft to be 10/20% more than the two-compartments, and Cole's figure was somewhat higher. Of course the extra timber is some 30% and one has to break just that much more rock, involving the extra powder and mucking out the larger quantity of rock which is broken. It is quite true that the hoisting is cheaper per ton, since a double drum hoist works in balance, but while this item is important in mining operations where large tonnages are handled daily, it represents only a small expenditure in the case of actually sinking the shaft.

Noting the sketch of the shaft which you sent me, I would say that I do not think it is well proportioned, since the hoisting compartments are somewhat too small and the manway is much too small considering that ventilation is going to be required as well as the standard piping and electric wiring. I had quite a long and in-

Mr. Barringer, - 4.

May 28, 1928.

teresting talk with Cole of the Longyear regarding the advantages and disadvantages of various size shafts, and he was strongly of the opinion that our present dimensions were most favorable for our purpose. Practically all of the shaft contractors have concurred in this opinion, and several of my mining friends have also expressed approval. We shall have several advantages through having one large hoisting compartment 5 x 5 in the clear, and when we have our shaft sunk I intend to put in a cage and cage the muck cars from the drift as we proceed toward the meteoric material. Of course we cannot expect to use this shaft indefinitely, nor to handle any great amount of ore with this equipment, but I can assure you that it will serve our purpose very well and I can also assure you that we would be taking a serious chance of running short of funds if the directors should change their minds and insist on a three-compartment shaft, which in my opinion would cost not less than 20% more than our present shaft, and might very well run up to 30% increase.

I wrote Mr. Shaw a little preliminary letter regarding the shaft bids and sent you carbon copy, and I hope that at least you will feel reassured in regard to our finances. Of course we may run into conditions which cannot be foreseen, and which will make it impossible for us to complete our program with the funds available, but under any reasonably expected conditions this should not be the case, and I am still of the opinion, as I was last December, that the total cost of the shaft proper will not exceed \$120,000. I find that the drift is going to cost more than anticipated by reason of the overhead and regular operating costs running against

Mr. Barringer, -5.

May 28, 1928.

it, but I think that \$30,000 will amply cover expenditure for that account, and we should have a safe margin of surplus which should take care of the ordinary difficulties which we are sure to encounter from time to time, and should tide us over everything but a most unforeseen and almost unprecedented condition.

Best regards,

Sincerely,

GMC-s

May 29, 1928.

P.S.

I am this morning in receipt of your letter of May 24th and I believe we now understand each other fully regarding the dimensions of the Crater shaft. You can assure Mr. Scott and others that the real reason why we have decided on two compartments instead of three is to conserve our resources, and we believe that our present shaft will fulfill all our requirements as well as a larger one would and cost us a total of 20/30% less money.

In regard to the speed of sinking, we expect to use two buckets, one of which will be filled while the other is being hoisted, and Mr. Huston suggested, and he evidently did not realize that this could be done quite as well in a two compartment as in a three compartment shaft since the bucket at the bottom will be detached from the cable while the other is being hoisted.

I am sincerely hoping to mail the complete report on the shaft sinking tomorrow.

GMC.

February 12, 1934

Mr. Jack White
1239 North Laurel Avenue
Phoenix, Arizona

Dear Sir:

I have a client who claims to be anxious to secure a small gold mine in Arizona and it has occurred to me that he might be interested in your property, the Jack White Gold Mine, provided satisfactory terms could be arranged.

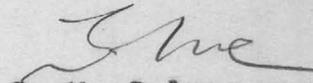
I visited your property yesterday and saw your son who gave me your address and suggested that I should communicate with you direct.

It happens that I examined your property some years ago in company with Mr. Barnes and while it seemed to me that the average grade of your ore would not be likely to leave a wide margin of profit at that time the situation has now changed very substantially with gold selling at \$25.00 an ounce.

I understand that the mine and mill equipment belongs to Mr. Hartman and that he has some interest in same and this might complicate the situation.

I believe that you are down in this part of the city frequently and suggest that you might care to stop into my office sometime in the near future when we could discuss matters in detail. I wish that you would bring in any recent reports that you may have concerning your property and the record of the last mining and milling operations.

Yours very truly,


G. M. Colvocoresses

GMC:S

DANIEL MOREAU BARRINGER
1242 REAL ESTATE TRUST BUILDING
PHILADELPHIA

A 5/28/25

May 22, 1928

Mr. G. M. Colvocoresses
Humboldt, Arizona

Dear Mr. Colvocoresses:

I have your letter of May 17th in reference to the Jack White gold mine. May I congratulate you upon the excellent presentation of the matter.

May I have your permission to copy that portion of the letter which relates to this little gold mine and send it to Barnes for his comments? As you know, I have the greatest confidence in his not only probability but in his conservative mining judgment. He has never claimed that it is much of a mine but since the geology is so similar to that of the old Congress mine he thinks it is possible, and even probable, that pay ore will go to the deep and very good values will be found here and there. Quaere - will the expenditure of \$10,000, or, at the most, \$20,000, in the way of further development work put 20,000 tons of additional ore, averaging \$11 per ton, in sight? This seems to me to be almost anybody's guess. I note that you estimate only \$3.00 a ton profit.

You point out one thing which I had thought of. I have never known a paying mine to be found within 50 miles of Phoenix. I ^{have} personally examined a great many. Were it not for the analogy of the Congress vein (also in granite) and were it not for my confidence in Barnes I would not give the matter more than a passing thought. However, since you say that you can either get Don Reed or Harbauer to sample the property and make a new assay map of all the workings for not to exceed \$300, or possibly \$400, it may be that a few of us here will put in a hundred dollars a piece on the chance that this sampling may justify me in going to these and other

friends and raising say \$10,000 for further exploration work with the understanding that if the results obtained by the expenditure of this \$10,000 are encouraging an additional \$10,000 or \$15,000 will be put into the mine for further development work and the building of the cyanide plant. The latter seems to be absolutely essential.

Another possible objection to the mine is that as a rule unaltered or primary sulphide ores in the mines of that district are of lower grade than the upper or more or less oxidized ores. Barnes tells me that the ore is partly sulphide at the present time, but there is always a chance of even sulphide ore in the upper portion of the vein being made richer by downward percolation of gold or silver or copper in solution. We all know that gold goes in solution when associated with iron sulphide. The gold placers of the world furnish abundant proof of this, but just what the chemical process is which causes the gold to go in solution during the process of the oxidation of the iron sulphide I do not know, but I think it has been worked out. For this reason there is a chance that the upper 300 or 400 feet of this vein, and all similar veins in that district, may be richer than the lower portion of the vein.

I would also like to know from an assay map whether the three ore shoots show a tendency to come to a point, that is, become narrower as they go down. This would seem to suggest superficial enrichment if true.

Many thanks for your very illuminating letter.

I have not heard further from the Mystic Iron Co. Brandon tells me that rumor has it that the Mellons are about to take over this Company along with the Massachusetts Gas Co. This may prevent John Kennedy, the President, from coming to Philadelphia at the present time, for my friend Marshall told me over the telephone the other day that he would bring him and Hart, President of the Delaware River Furnace, in to see me the first

time Kennedy comes to Philadelphia, Marshall perfectly understands the situation, and I think that Hart does also, and states it in a nutshell that if the outcrops have considerable downward continuation the property is one which is worth more thorough exploration. If they have not, it would be no good to them or anybody else. He seems to fear that the geology will be more or less similar to that of the Cuban deposits, because, as you know, Cuba, Santo Domingo, and Porto Rico apparently are parts of the same chain of "mountains", or an uplifted land area, these three and a number of smaller islands to the east of Porto Rico being the only portions of which are above the surface of the sea. The argument is not a bad one. As we all know, the geology of the Allegheny ore deposits from northern Pennsylvania down to Georgia and Alabama is much the same. However, I have made it very clear to them that in my judgment the outcrops are so promising that a certain amount of dip needle work (in which I personally would not have much confidence) and diamond drill work is justified. If this diamond drill work should show that the outcrops have a downward continuation more and more such work, together with shafting and drifting would be justified.

This property should make a greater appeal to these two furnaces than any others in the United States because they are literally the only two furnaces so close to tidewater that the ships can unload directly on the ore pile of the furnace, thereby saving some sixty cents and upwards to inland furnaces, such as the Valley furnaces in Pennsylvania, etc. This saving would mean quite a profit in itself.

Be assured that I shall follow the matter up vigorously, but naturally I cannot hurry these people. If they are not interested I shall bring the matter to the attention of some Birmingham friends.

I do not think it will be necessary for you to come East, but I hope that you will write so fully about each bid that none of us here will be under a misapprehension. Frankly, I cannot yet understand the real reason for the great difference between the Longyear bid and the Fitch bid. I fear that we do not fully understand the latter. I enclose a copy of the telegram which I sent you last night, also the photostat of the plan of the shaft suggested by Huston and Reau. As I remember, Mr. Shaw told us that your shaft would be 11' x 5', two feet shorter and four inches wider than the three compartment shaft. As I figure it, this means only $5\frac{3}{4}$ square feet more excavation to be done on say roughly $2\frac{1}{2}' \times 2\frac{1}{2}'$. Of course more timber would have to be used. As against this, it would have the great advantages of the three compartment shaft - more room for the men to work in; two bucket compartments instead of one, which would make for much more rapid removal of the muck; a much better shaft in case we intend to do any mining, etc. I failed to mention the certainty, in Huston's mind, that such a three compartment shaft could be sunk much more rapidly, at least through the white sandstone, than a two compartment shaft. Under the Fitch offer, as we understand it, this fact would mean a great reduction in the cost of the shaft to us. But, as I have said in my telegram, I fear that we haven't enough money to spare on any luxuries. Shaw seemed to think that such a shaft would cost at least \$15,000 more than the two compartment shaft. As you know, I am very ignorant about matters of this sort and would greatly like to have your opinion. I suppose it would be very easy for the shaft contractors to alter their bids in case it should be finally decided to sink a three compartment rather than a two compartment shaft.

You may be sure that we shall await with keen interest your letter on the all-important subject of the bids, now that the location for the shaft has been finally agreed upon. Personally, it seems to me to be all

G.M.C. 5 - 5.22.28

right.

With kind regards,

Yours sincerely,

Samuel Morau Barringer

Enclosures: Confirmation

Sketch of shaft

JACK WHITE MINE

2/12/34

Near Cave Creek

Visited February 11th, 1934 and looked over surface and plant, met Jack White's son who is acting as caretaker since mine was closed down as unsafe by the State Mine Inspector in October 1933.

Shaft is now down below 500' level on which some work has been done and water is being kept down by bailing so that all workings are accessible.

There is a very good surface plant composing a gas-engine single drum hoist, an I. R. portable gas engine compressor, a three cylinder Pacific Diesel Engine with belt drive to a 76 K.W., Westinghouse Generator, blacksmith shop, etc. The mill machinery is all electric driven. Ore is trammed to a bin from which it goes on a belt conveyor to a grizzly and crusher, then to storage bin and to a 6' ball mill in closed circuit with a classifier and the pulp to a small Grooch flotation machine from which the tailings are treated on a table.

Concentrates go to a small filter and are run up in a car to loading platform. Were shipped to El Paso. There is a dewatering cone for the tailings and water was recovered in a tank and pumped back into the circuit. There are no plates or amalgamators (which should be useful) and cyanide was not used. The mill was built and operated by Brough who is said to have gotten good results but subsequent mill operators did not do so well.

Mine equipment and mill machinery are the property of W. W. Hartman, 1230 East 109th St. Los Angeles, California, who last worked the mine under bond and lease and apparently made a mess of it.

Young White states that they did not keep up their underground development and could not get out ore fast enough for the mill (which might handle about 50 ton per day) and so they mixed in a lot of waste

Jack White Mine - #2

which was in evidence in the mill bin and lowered the grade of the mill heads until they were non commercial.

The ore which I saw treated by the Ballas Machine in Dec. 1932 and January, 1933 was said to be of average grade and ran over \$8.00 per ton, equal to \$14.00 at present price. Mining cost (including development) would probably be about \$4.00 per ton, milling say \$2.00 per ton and overhead, treatment of concentrates, royalty, etc, say \$3.00 per ton. Total costs, say \$9.00 and profit \$5.00 per ton.

To resume operation it would be necessary to fix up the mine to meet the legal requirements, do some development work and probably add plates or amalgamators in the mill.

Total preliminary expense might be \$10,000 but more accurate estimates can be made after further investigation.

JACK WHITE MINE

February 15, 1934

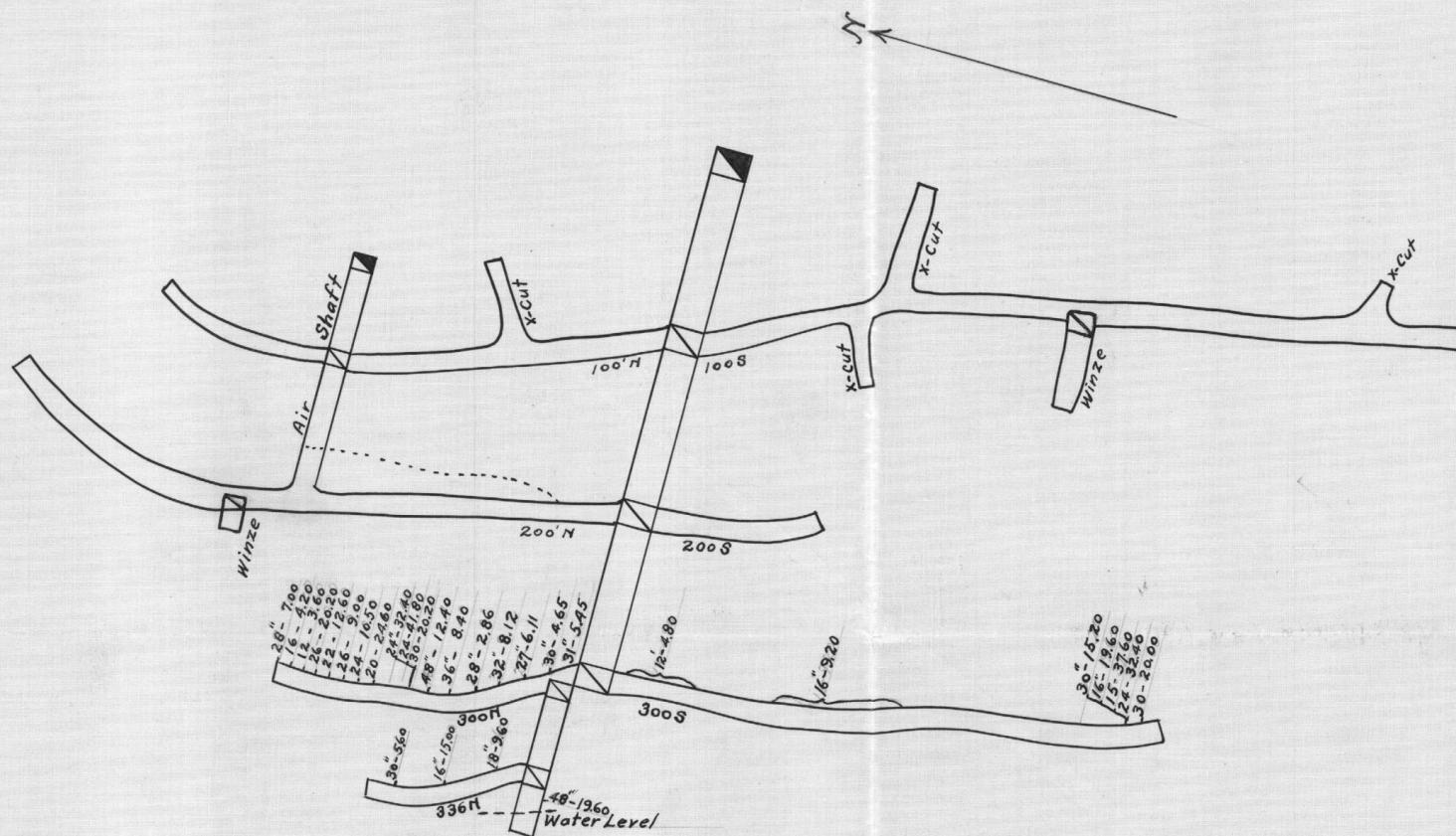
Talk with Cooper.

Cooper says that the mill was poorly built largely by Hartman himself and that the Siesel Engine is not much good.

Mill and mine were run by Paris Brough who is a good mill Supt. but no miner.

A recovery of over 90% of the gold was made by flotation, altho cyanide treatment would have been more suitable but Brough claimed that there was no ore in the mine.

It may have been that the ore was not properly developed to permit keeping the mill in operation, but the essential point will be to sample and measure the ore reserves.



JACK WHITE GOLD MINE
 Maricopa Co., Arizona
 Scale - 1" = 40'