

**Trenching, Economic Evaluation, and**  
**Recommendations for**  
**Vein F-7, Central West Border of**  
**Fortune Ranch, Huerfano County, Colorado**

15 April 2007

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**Table of Contents**

	Page
I. Executive Summary	ii.
II. Introduction	1.
III. Previous Work	1.
Significance of jasper	2.
IV. Evaluation of F7 Vein	3.
A. Location	3.
B. Trenches	3.
C. Sampling	5.
Trench Photographs	6. to 17.
V. F7 Vein Data	18.
A. Trench Descriptions	18.
B. Other Mineralization on Hill 9641	19.
Photographs	20. to 23.
C. Trench Samples	24.
D. Sample Analyses	24.
VI. Economic Discussion of F7 Vein	24.
A. Favorable Jasperoid Trace Elements, (USGS)	25.
B. Additional Favorable Trace Elements (HENDCO)	26.
C. Other Elements Analyzed	26.
D. Significance of GV- and RH-1 Samples	27.
VII Proposed F7 Vein Magnetic Survey and Drilling Program Drilling	27.
A. Recommendation 1. Hill 9641 Mapping	28.
B. Recommendation 2. Surface Magnetic Survey	28.
C. Recommendation 3. Proposed Three Hole Core Drilling Program	29.
VIII. References	31.

## I. Executive Summary

On May 17, 2006, the F7 Vein on the western edge of the Fortune Ranch was trenched and sampled as recommended after the initial sampling of the discovery pit in October 2005. Six 25' to 50' long and 6' to 10' deep trenches exposed about 600' of a continuous siliceous jasper-chalcedony-quartz vein averaging 11' (3.5 m) in width, striking N30°-50°W, and dipping 65° NE, partially beneath Hill 9641 in Section 9 on the north fork of Aspen Creek. The vein widens to the SSE where the outcrop disappears beneath the alluvium between T3S and T4S. Extensive float at T24 indicates the vein may continue below the alluvial surface for some distance south of T4S and should be explored.

The F7 Vein is generally composed of weathered siliceous jasper-chalcedony-quartz with lesser amounts of carbonates: calcite and siderite. The assays did not indicate any economic concentrations of precious or base metals, but did indicate "favorable" trace amounts for jasperoids of As, Cu, Fe, Mo, Pb, and Zn (Lovering, 1972). These trace elements are considered "favorable" by the USGS for jasperoids above economic precious and base metal mineralization at depth. Additional trace amounts of also favorable Ag, Au, Cd, Co, Hg, Mn and Ni were observed. If present, the mineralization would occur with the hydrothermal alteration of the wall rock andesite at depth. The alteration is the source of the silica exposed as the surface F7 Vein. This is the drilling target to be tested.

Two additional mineral outcrops occur on Hill 9641 just off of Fortune Ranch land in the hanging wall andesite projected above the F7 Vein. This mineralization included trace Au, Ag, and sub-ore 0.25% Pb, and may indicate similar mineralization down dip along the F7 Vein.

To further explore the F7 Vein and the hanging wall, a three phase program with approximate costs of \$45,000-\$55,000 is recommended:

1. Surface mapping of Hill 9641 to determine the source of siliceous float found in the hanging wall andesite above the F7 Vein. (~ \$2,000)
2. A four traverse, surface magnetic survey across the F7 Vein outcrop and to the east to outline the non magnetic altered andesite target along the F7 Vein at depth. (~ \$2,000)
3. A three hole core drilling program to test alteration and mineralization along the F7 Vein at depth including geological logging and analyzes. (\$ 40,000 - \$50,000).

A purely speculative calculation of the economic potential of the F7 Vein yields values of \$19 to \$ 75 Million; a value to drilling ratio of 380 to 1,500 which can only be tested by drilling. ii.

## II. Introduction

On 6 October 2005, Hendco Services subcontracted with Seeling and Associates to conduct a brief mineral resource evaluation of the western portions of the Fortune Ranch, in Huerfano County, Colorado. This evaluation was delivered to Mr. Buster Cogswell, an principal of the Fortune Ranch (previously called the McAlpine Ranch), in a report entitled "A Brief Mineral Resource Evaluation. McAlpine Ranch, Huerfano County, Colorado", of 6 October 2005. In this field evaluation, several locations of potential economic mineral interests were visited and sampled. Of these, a vein outcrop named the F7 Vein was deemed of the greatest short term interest for further economic evaluation.

The mineral assessment and analyses of the F7 Vein samples did not indicate any significant economic values in themselves. Rather, the F7 location was a pit that exposed a NW dipping vein consisting of calcite-chalcedony-ochre brown jasper-quartz, presumably occurring in volcanic andesite which outcrops immediately to the East. While not exposing any economic mineralization in the pit, it was interpreted as being permissive of economic precious and/or base metal mineralization at depth. Upon receiving the analyses of F7 Vein mineralization, it was recommended that the Fortune Ranch consider further evaluation of the F7 Vein including diamond core drilling.

Pursuant to reviewing the above report, Mr. Cogswell contracted with HENDCO SERVICES to further explore the F7 Vein with cross vein trenching to evaluate its width and NW-SE extent and to sample the trench material for further chemical analysis. This work was recommended to be accomplished prior to possible diamond core drilling. This report summarizes the trenching work and sample analyses with recommendation for future work and drilling.

## III. Previous work

Prior to receiving the report cited above, Cogswell directed that the various samples taken in October 2005 be analyzed. The samples were prepared and sent for analysis by ALS Chemex in Sparks, Nevada. A final report with assays was submitted Cogswell on 8 January 2006.

As described in the above 2006 report, the small prospect pit at F7 is located at (Seeling, a046) near the north fork of Aspen Creek. (See map, Fig. 1). Two F7 samples were submitted. The pit exposes a NE dipping vein composed of ocherous brown jasper with white chalcedony and calcite-siderite veinlets (Sample F7-1). Some veinlets consisted of banded calcite-chalcedony containing black manganese oxides and possibly metal sulfides. The samples were analyzed primarily for gold, silver, and manganese along with 33 other elements.

The results of the analyses for the jasper (F7-1) indicated above average (for all samples) arsenic and vanadium with high iron, while the calcite- chalcedony-manganese oxide veinlets (F7-1) indicated above average manganese (Mn, 1.3%) with trace amounts of cobalt, molybdenum and mercury. The analyses also indicated high barium and scandium commensurate with hydrothermal calcite.

The results did not indicate the presence of gold, silver or base metal sulfides. However, the presence of arsenic, mercury and iron jasper support the interpretation that this siliceous outcropping may represent hydrothermal alteration of andesitic volcanic rock along possible economic gold, silver and sulfide base metal mineralization at depth.

It was recommended that the next step would be to open up the vein by cross trenching to delineate its width, its lateral extent, and its structural relation to surrounding andesitic rocks. These trenches should be thoroughly sampled and analyzed. Depending on these new results, a drilling program to intersect the vein and test the subsurface alteration and mineralization model target should be considered.

#### Significance of Jasper

The F-7 outcrop is predominated by medium to dark ocherous brown jasper that is veined by later chalcedony, quartz, calcite, siderite and some black manganese oxides. Hand-lens examination of the jasper shows a uniform matrix of medium to dark brown, aphanitic jasper containing a mixture of lighter yellow-brown patches or breccia fragments of (earlier - ?) jasper.

In many mining district, silica bearing jasper, quartz and chalcedony are the end products of the alteration of feldspars and ferromagnesian minerals common to intrusive igneous, volcanic rocks and metamorphic rocks. This alteration is often associated with precious and base metal mineralization that may or may not occur closer to the mineralizing solution source at depth.

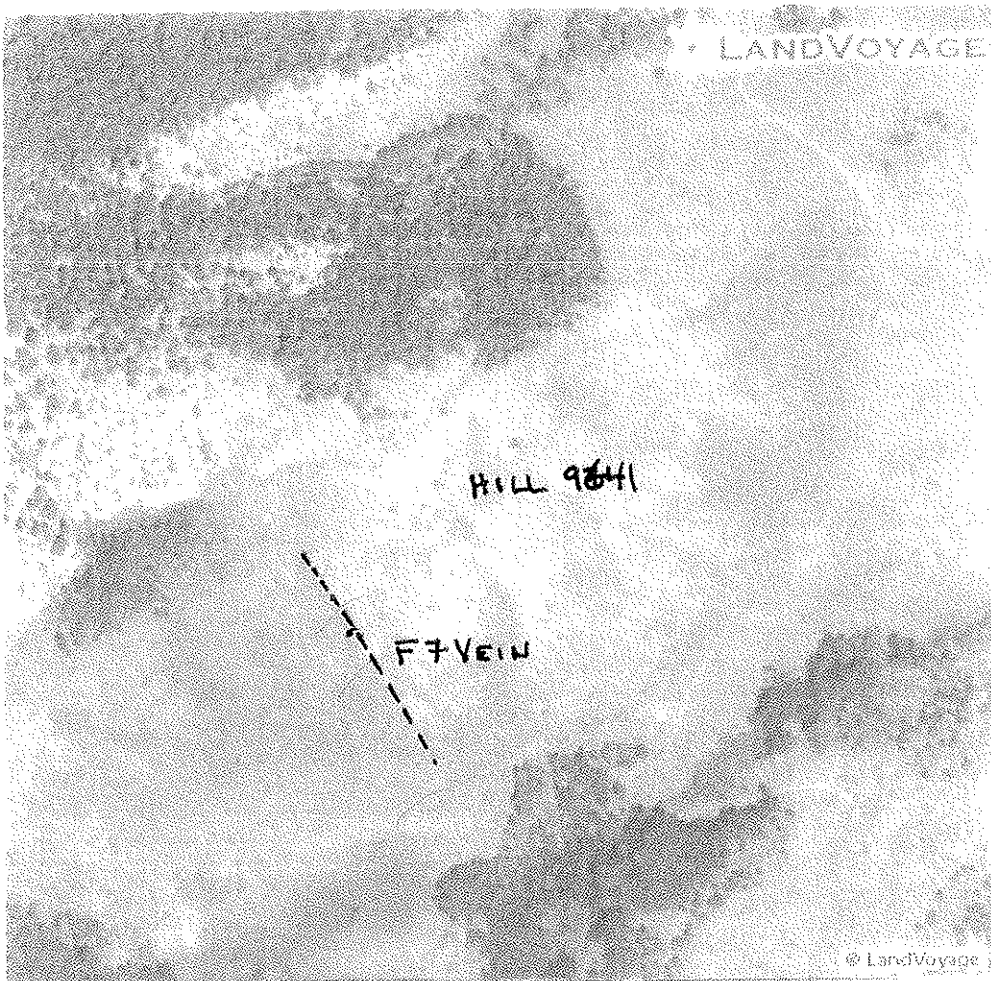


FIGURE 2.  
VEIN F7

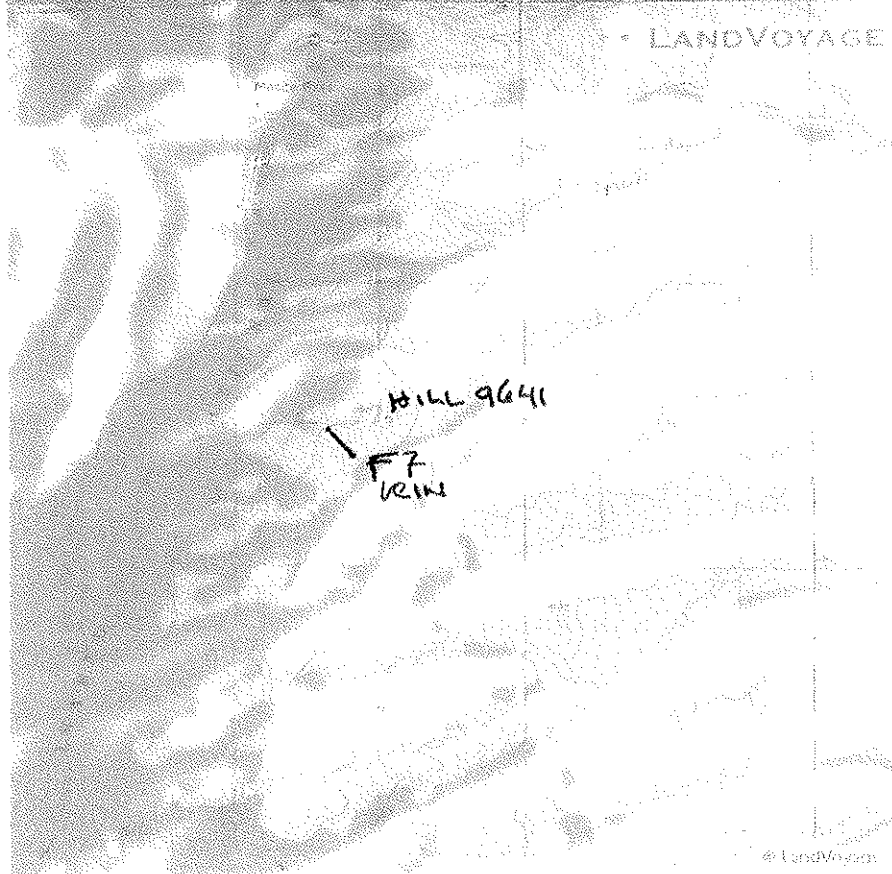


FIGURE 1.  
LOCATION

Reference was made to "Jasperoid in the United States – Its Characteristics, Origin and Economic Significance", USGS Professional Paper 710, by T. G. Lovering, 1972. In the section "Jasperoid as a guide to ore", pp. 50-56, characteristics of jasperoids that are favorable guides to economic ores appear to match the Jasperoid of initial F7 pit. This will be discussed further under the analytical section below.

### III. Evaluation of the F7 Vein

#### A. Location of F7 Vein.

The F7 Vein is located in NE ¼ of the SW ¼ of Section 9, T27S R72W, on USGS Mosca Pass 7.5 Quadrangle, 2001. (Fig. 2). It is located a few hundred feet SW down the flank of Hill 9641, which is underlain by Tertiary volcanic andesite (Ta). The original F7 prospect pit (Latitude 37.7159°N and Longitude 105.4466°W; GPS courtesy of Alan Seeling) area was re-examined and brown jasper and quartz surface float were traced to the NNW and SSE along the apparent subcrop to the F-7 Vein. These occurrences of float were interpreted as the outline of the vein which originally exposed by the F7 prospect pit (Fig.3).

#### B. Exposure of the F-7 Vein by Surface Trenching

As directed by Mr. Cogswell, HENDCO SERVICES visited the site on 17 May 2006 for the purposes of exploring and sampling the extent of the F7 Vein by surface trenching. Hendco was ably assisted by Mr. Jim Perino, Manager of the Fortune Ranch. Mr. Perino provided a backhoe to dig the trenches.

The trenches were dug perpendicular to the estimated strike of the vein of N30°W – S30°E. Trenches were dug at approximately 100' intervals north and south of the F7 (Pit 1). A total of 6 trenches were dug from NW to SE:

Pit 2,	Figures 4 – 7 ;
TN1,	Figures 8 – 10 ;
Pit 1 (F7 Prospect Pit);	Figures 11 – 14
TS1,	Figures 15 – 17;
TS2,	Figures 18 - 20;
TS3,	Figures 21 – 26; and
T4S site,	Figure 27



Figure 3. View of original discovery outcrop of Jasper-Chalcedony-quartz at Pit I. View looks along strike of F7 Vein south southeast towards T1S and backhoe. Also see Figure 14.

No trench was dug at TS4, but abundant float marked the probable subsurface location of the vein. The actual vein at TS4 is believed to be deeper than the 10' trenching done at Trench T3S to the NNW (See Sketch Map, Fig. 28).

The trenching followed the F7 Vein as far northwest and southeast as possible. To the NW the vein went as far as Pit 2, which was an old prospect pit not observed in the October 2005 visit. This pit is on the hillside just south of the Fortune Ranch Boundary with USFS land. Northwest across the boundary fence are outcrops are of Precambrian metamorphic rocks (Fig. 29) with no recognized indication of a northwesterly extension of the F7 vein (Fig. 30). Trenching to the SE followed the F7 Vein about 400' to the Trench TS4 site. Here, the vein is deeper in the alluvial cover and only strong jasper-quartz-chalcedony fragments occur at the surface. A further projection of the vein SSE of T4S site should be exposed on the small rise SE of the small stream drainage immediately SE of T4S. This rise was searched for F7 Vein float, but none was found (Fig. 30). In any case, at this time, the F7 Vein is considered "open" and extending to the SSE of T4S for an undetermined length and depth with further exploration.

By trenching, the extent of the F7 Vein was determined to extend in excess of 550' in length' with a fairly consistent dip of 65°NE. The strike of the vein is N30°-35° NW from TS4 to Pit 1 (F7 Pit) and N35°- 50° NW from Pit 1 to Pit 2. Thus there is a small westerly shift in the strike north of Pit 1. As discussed below, measured vein widths in the trenches corrected for vein dip yield the following true vein widths as follows:

Pit II.	?, but in excess of 4 feet (too steep to fully trench)
TN1	6 feet
Pit II (F7)	11 feet
TS1	8 feet
TS2	14 feet
TS3	~ 19 feet
TS4	> 15 feet surface float trace

This yields an average vein width of 10 feet between trenches Pit II and TS3. (The average vein width would be (11) if the float range of 15' at TS4 is included). The 19' vein width calculated for trench TS3 is approximated as the solid vein is not exposed. However, the occurrence of primarily jasper-quartz-chalcedony fragments across about 7 meters (21 feet) strongly suggests that the solid vein is directly below the bottom of trench TS3 (See Figs. 22- 26 and Figure 31, a sketch of T3S).



Note that the vein appears to widen from NW to SE. This fact, coupled with the interpretation that the F7 Vein openly extends beneath the alluvium southeast of trench TS3 and the TS4 float exposure, suggest the F-7 vein may continue to widen and extend some distance SE of TS4. This supports that further exploration by deeper trenching and / or diamond core drilling that may prove significant mineralization SSE of the surface vein exposed by trenching at T3S.

### C. Sampling

Sampling was conducted at all exposures of the F-7 Vein including Pit II on the NW end and the siliceous float at TS4. The samples consisted of representative channel samples across the length of the vein exposed in each trench.

In general, the vein is relatively consistent in its composition. It is much the same as originally observed in the F-7 Pit (Pit I) and consists mostly of jasper with veins of quartz, chalcedony, and carbonate minerals (calcite with minor siderite). Some black manganese oxides were observed in some trenches. Photographic details of the trench exposures follow below.



Figure 4. F7 Vein Pit II outcrop before backhoe work. Jasper – Chalcedony. Note Fortune Ranch USFS boundary fence in background. View -> NE

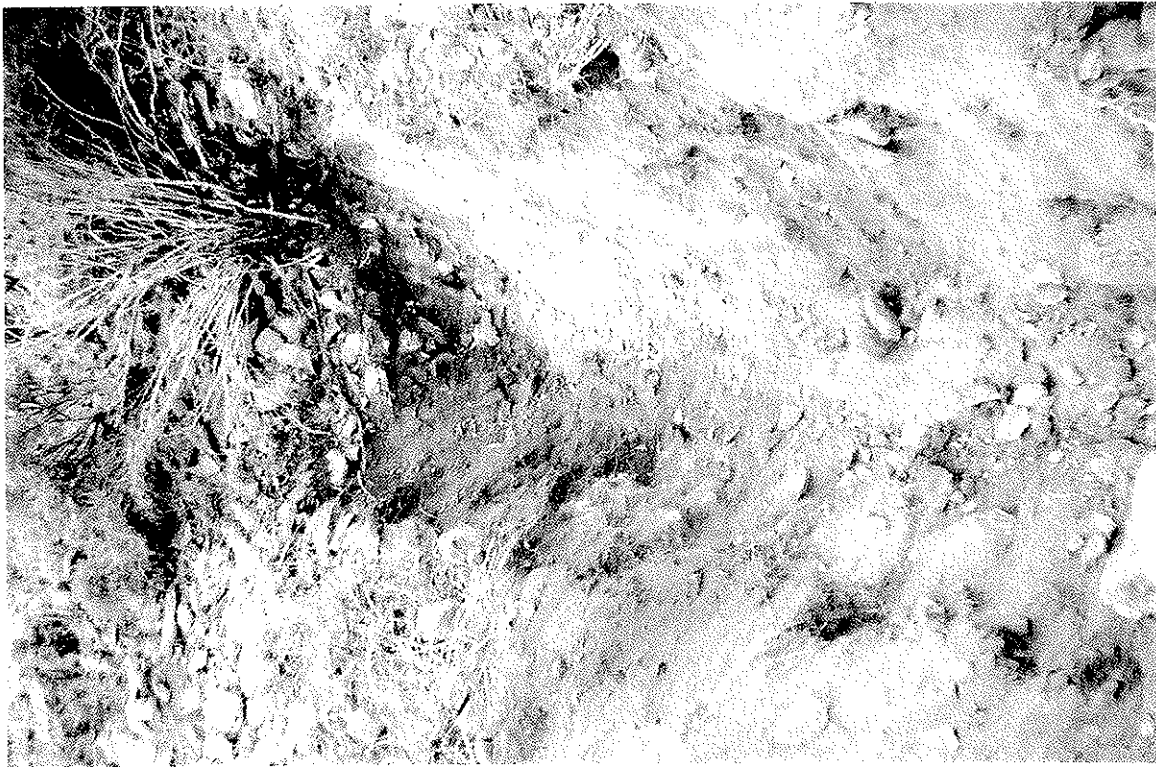


Figure 5. F7 Pitt II Trench. Too steep for good trench; not completely exposed. Jasper-Chalcedony vein 4' + across trench. View ->N.



Figure 6. F7 Pitt II Trench. Backhoe opening partial trench on steep slope. Precambrian outcrops on hill on USFS land behind backhoe. View ->N



Figure 7. F7 Vein Pit II outcrop view -> S45°-50°E towards T1N trench and backhoe trenching Pit I. Vein changes to S30°E beyond Pit I.

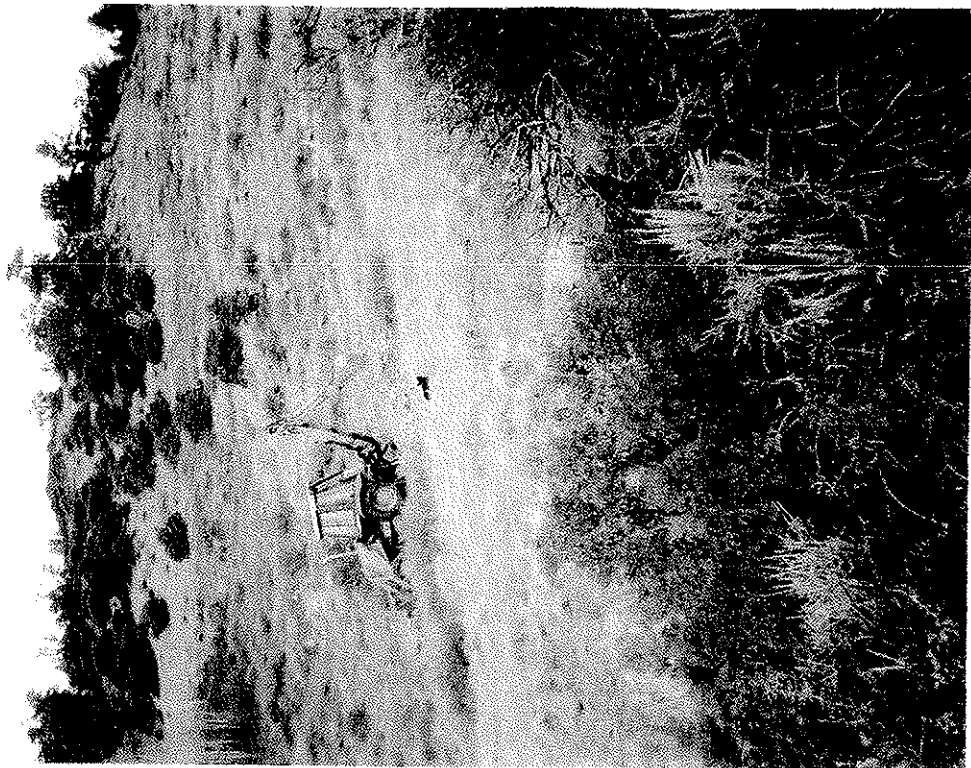


Figure 8. F7 T1N Trench viewed  $\rightarrow$   $N45^{\circ}W$  from Pit I. Backhoe opening T1N trench. Precambrian brown outcrops on hill behind backhoe.



Down

Figure 9. F7 Vein T1N trench. View  $\rightarrow$  N at sharp jasper-chalcedony vein contact with hanging wall altered andesite wallrock. Vein dips  $65^{\circ}$



Figure 10. F7 T1N Trench viewed -> N45°W. Sharp footwall vein contact with altered and oxidized wall rock andesite. Note 2' colluvial cover of vein.

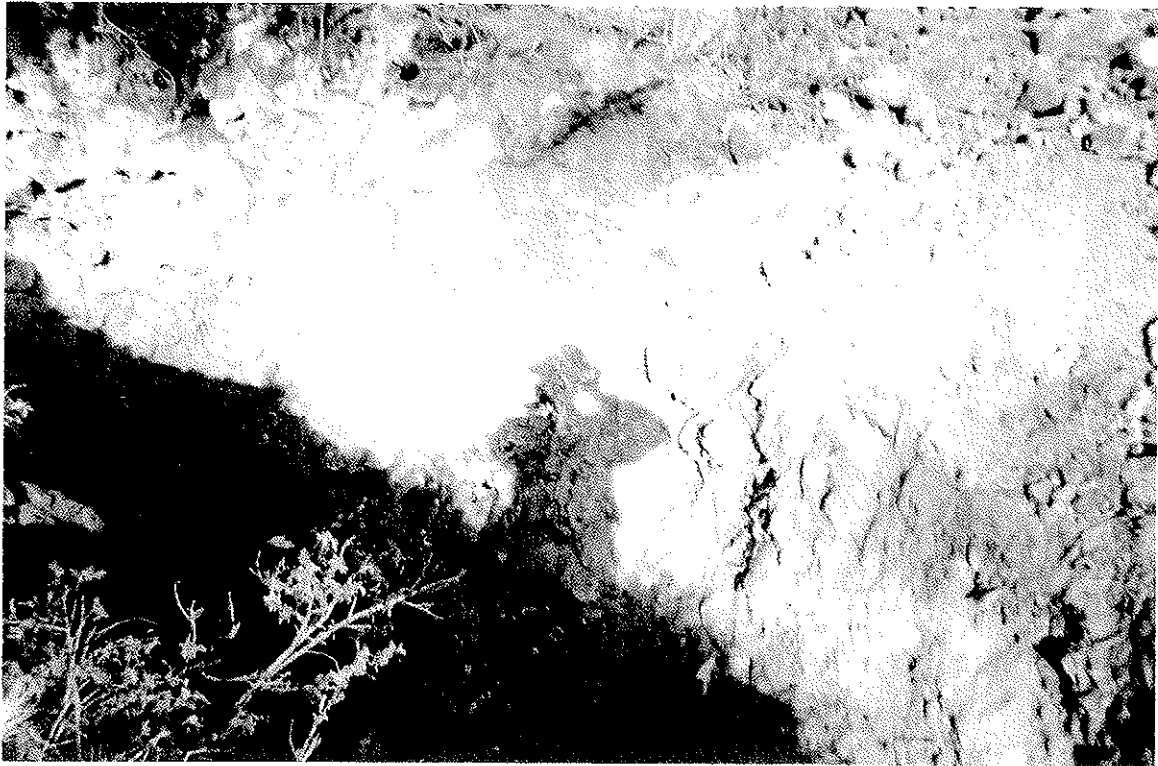


Figure 11. F7 Vein Pit I trench; SE wall. View -> E at jasper, chalcedony-quartz vein dipping 65° NE.



Figure 12. F7 Pit I Trench viewed -> N. Manganese oxide pod (Sample PI-B) on near vein contact with foot wall altered andesite.



Figure 13. F7 Vein Pit I jasper-chalcedony-quartz outcrop before trenching. View -> S 30°E towards backhoe trenching T1S. Note low ridge before trees on strike to SE: no float found there.

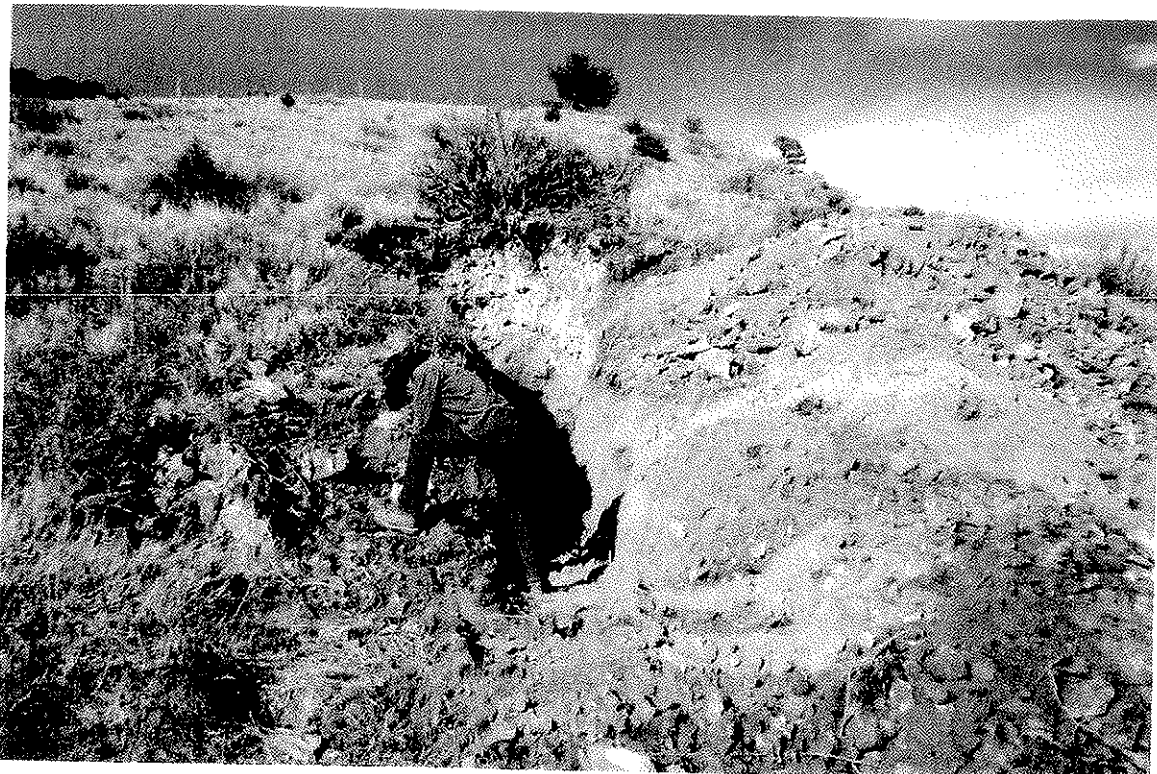


Figure 14. F7 Vein Pit I Trench viewed -> N45°E. Jim Perino. Note whiter bleached upper vein outcrop beneath bush. Also note Fortune Ranch-USFS boundary fence on Hill 9641 hill top with "locator" tree.

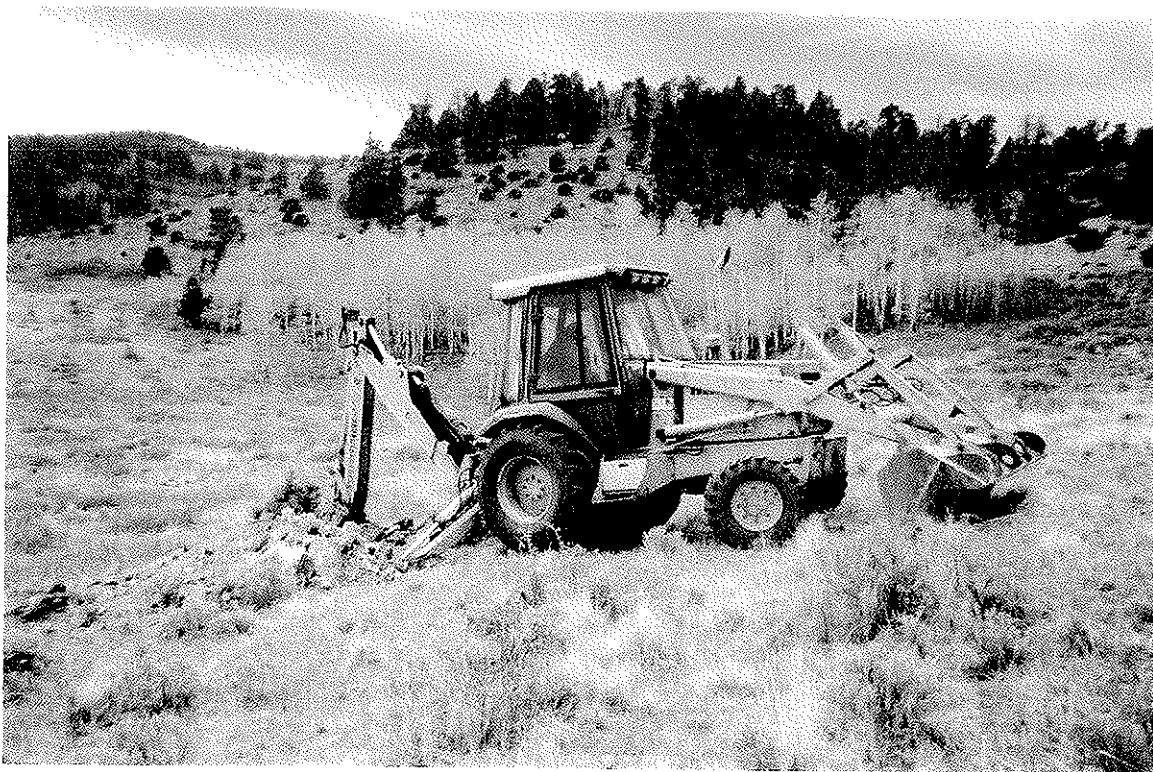


Figure 15. F7 Vein. Backhoe trenching T1S trench. View -> NW at Precambrian hills in background.

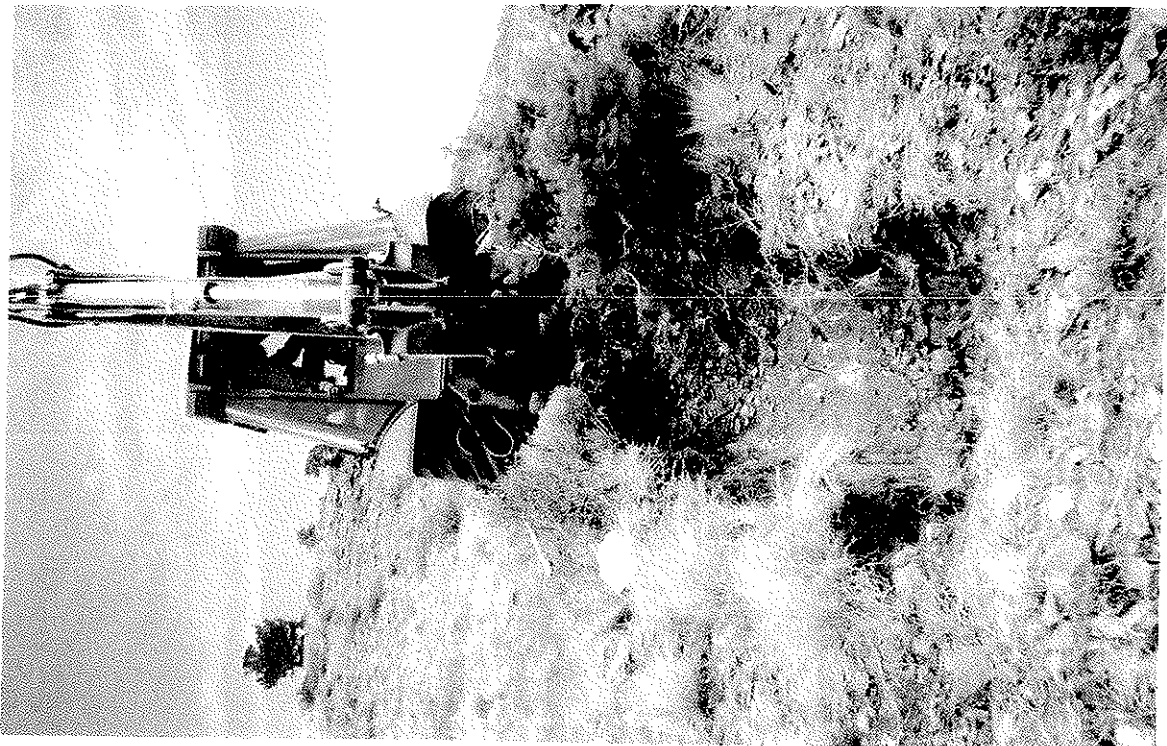


Figure 16. . F7 Vein Backhoe starting T1S Trench viewed -> N45°E. Note Hill 9641 hill top with "locator" tree. Hill 9641 Slope has siliceous float.

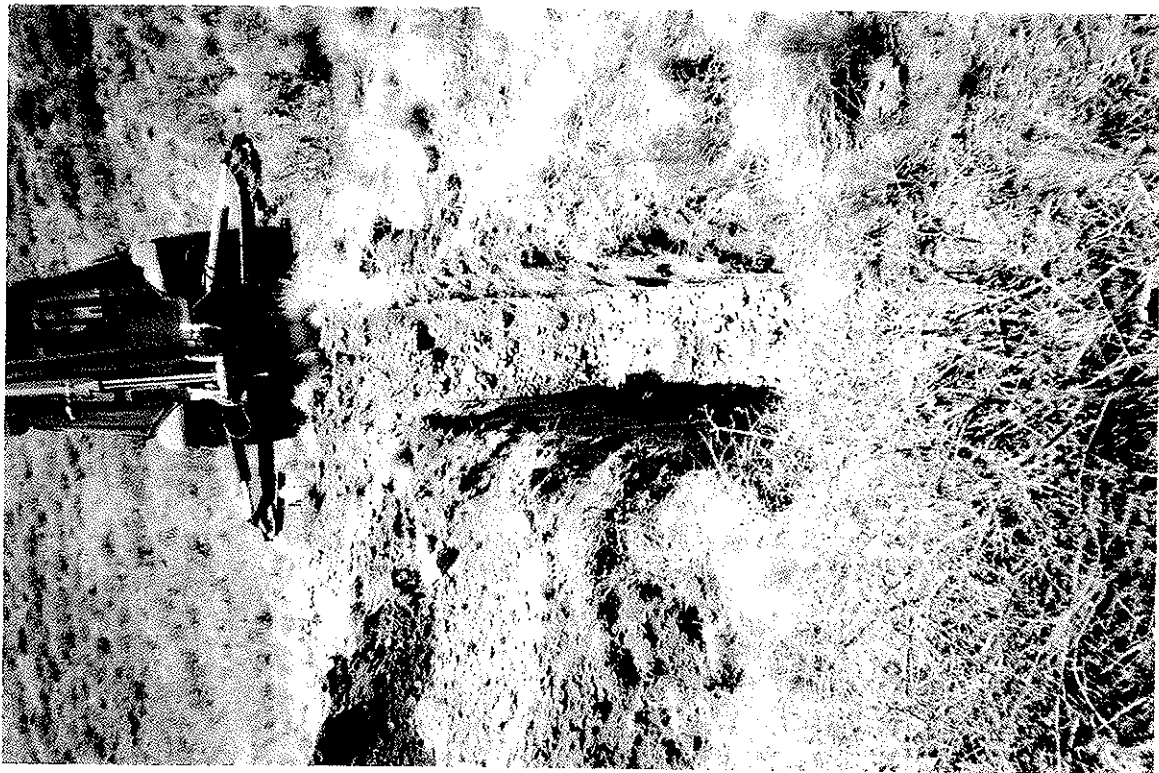


Figure 17. . F7 Vein. Backhoe trenching T1S trench. View -> SW. Note vein Subcrop just beneath alluvial cover.

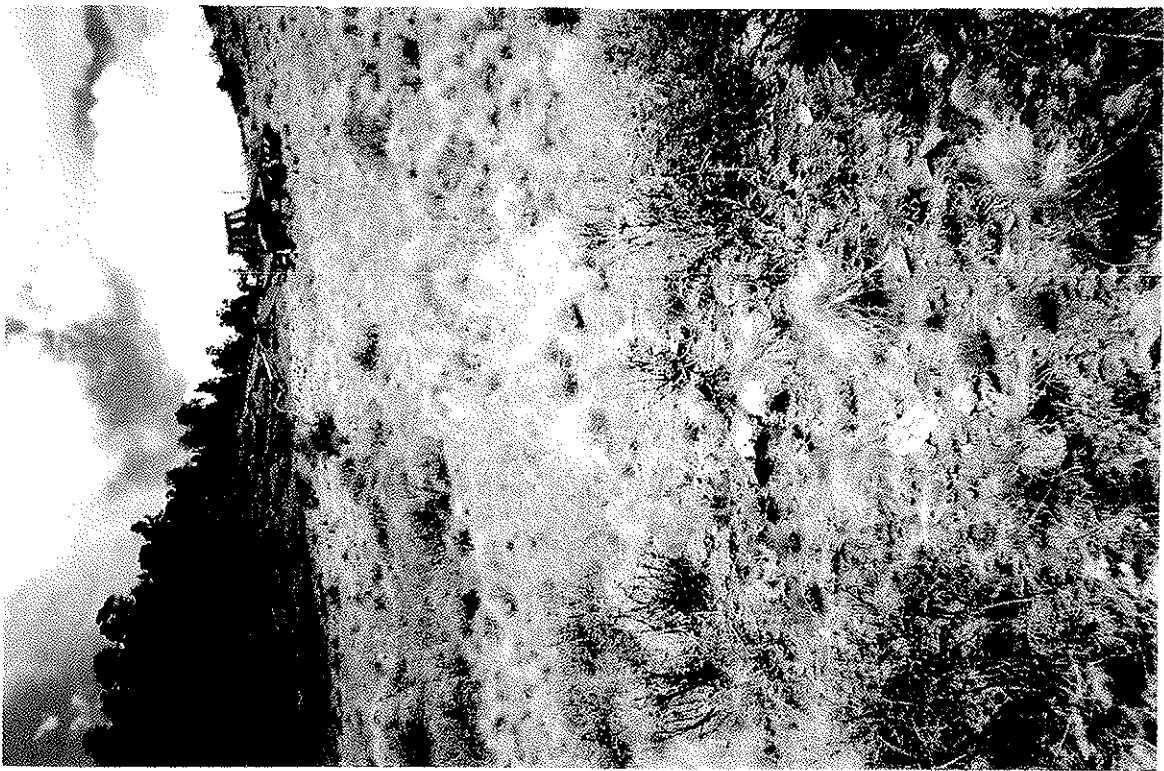


Figure 18. F7 Vein T1S being trenched by backhoe. View N30°W from vein jasper-chalcedony float over T2S Subcrop before trenching. Compare Fig 19.



Figure 19. F7 T2S Trench. View ->SW. Vein is about 5 meters (14') wide and subcrops about 1' below alluvium (see solid vein on south wall).



Figure 20. F7 Backhoe starting T2S Trench in thin alluvium . View -> N30°W towards T1S. Note jasper-chalcedony float over vein at backhoe wheel.



Figure 21. F7 T3S site with jasper-chalcedony float above vein Subcrop. View -> N30°W towards backhoe at T2S and T1S in distance.

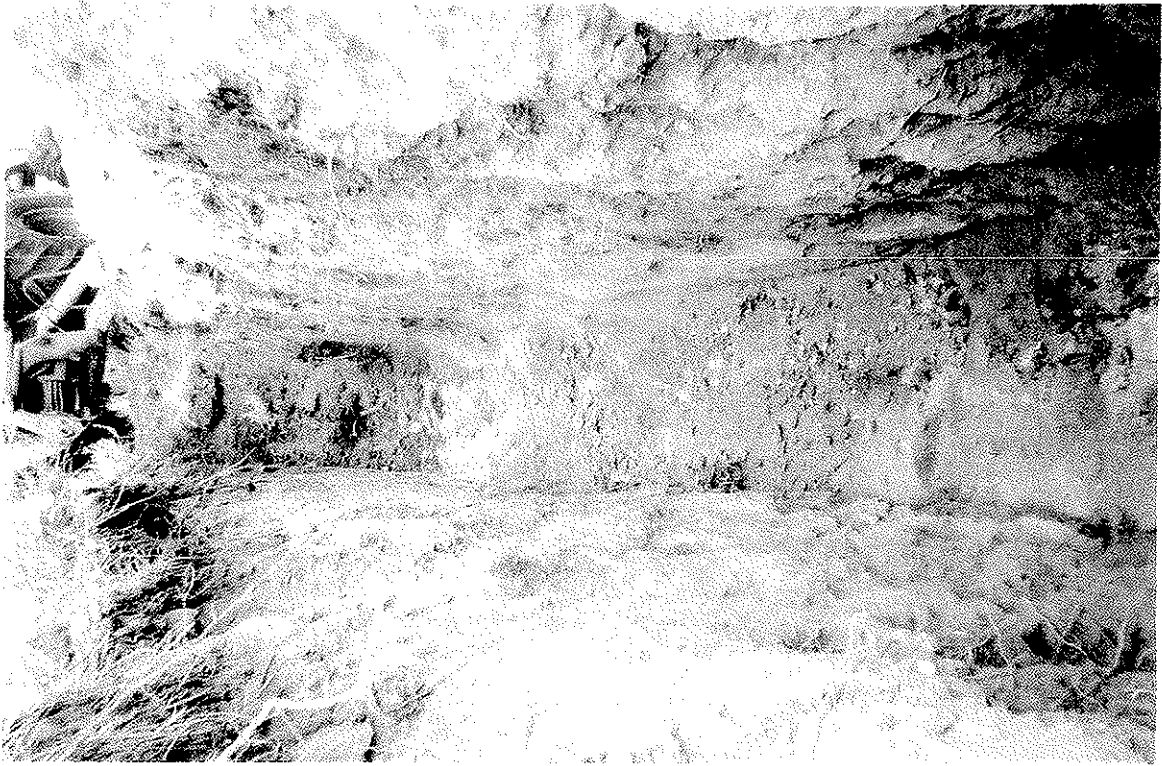


Figure 22. F7 T3S Trench, NE half of trench. View -> N60°E. Dark brown altered hanging wall andesite beyond vein contact at end.

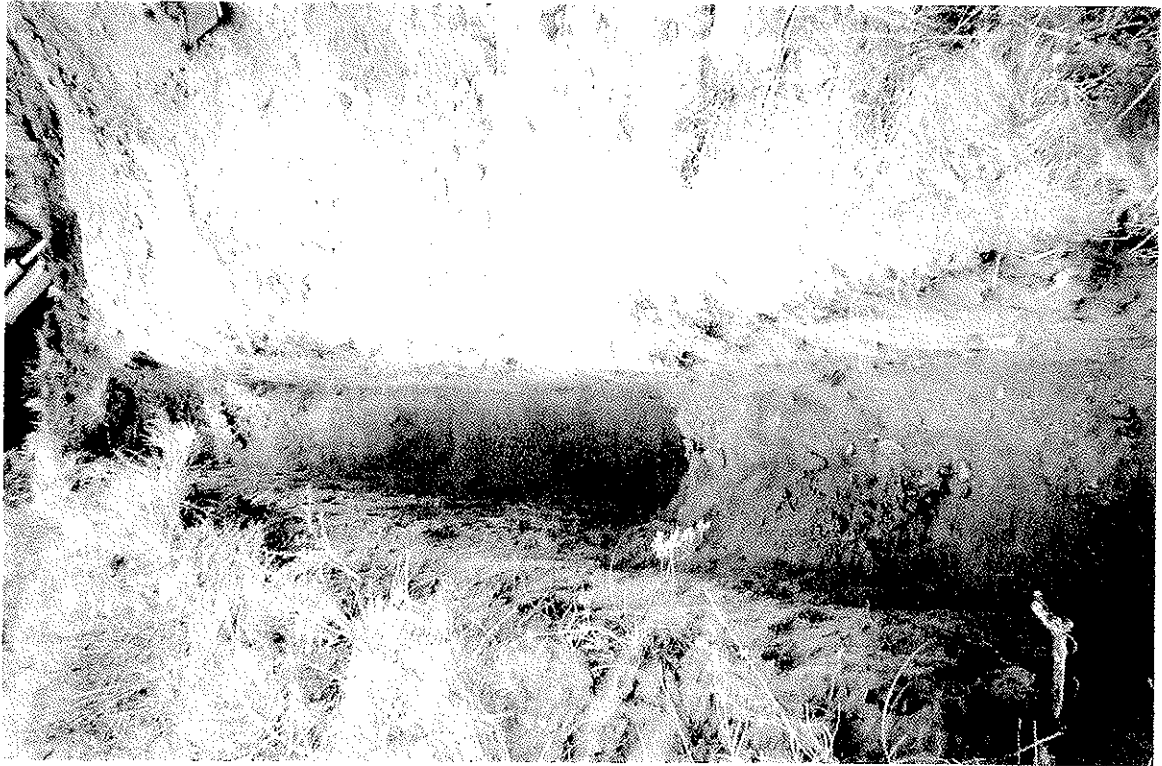


Figure 23. F7 T3S Trench, NE end. Trench is 9' deep. Alluvium, colluvium to 4' depth above weathered vein fragments over 19' width. Note vein berm.

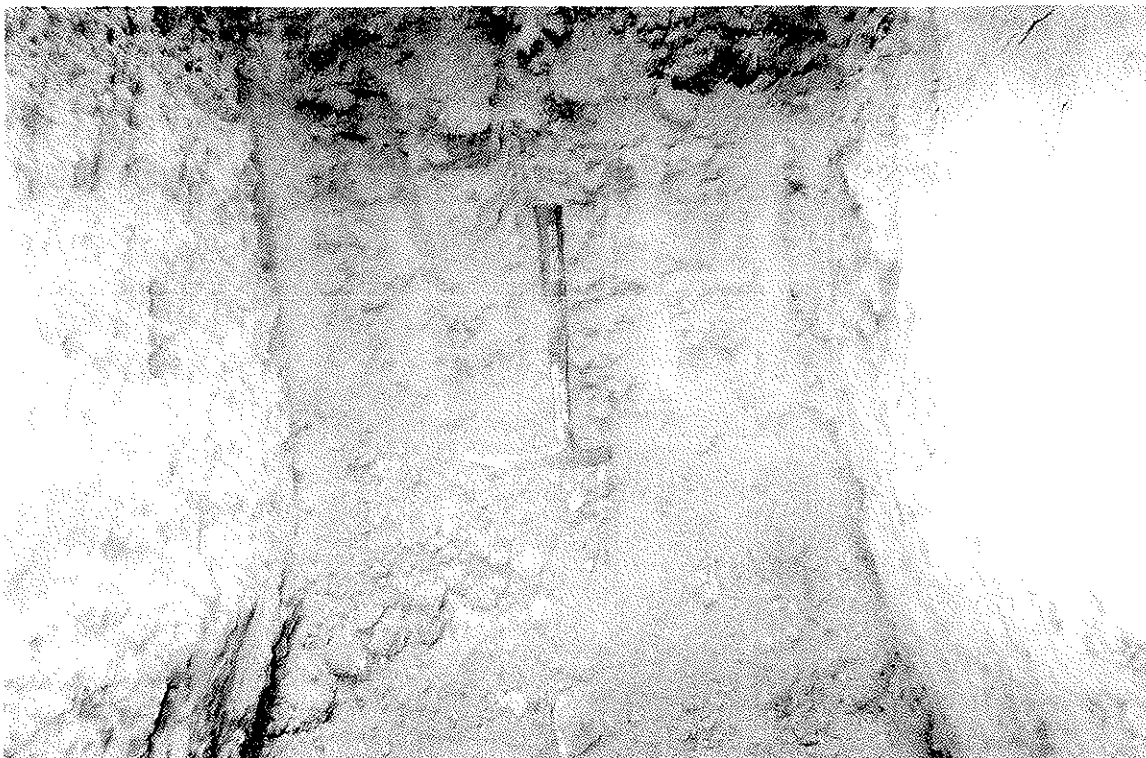


Figure 24. F7 T3S Trench, NE central berm. View -> N60°E. Ocherous oxidized and weathered vein subcrop 4'-6' beneath surface.



Figure 25. F7 T3S Trench; view -> SW. Note trench dump colluvial material NE to SW: light brown – andesite; dark brown - vein contact; ocherous – oxidized vein; light brown – andesite.



Figure 26. F7 T3S Trench. View -> N60°E. Author in trench at end of day. Final depth is about 10'.

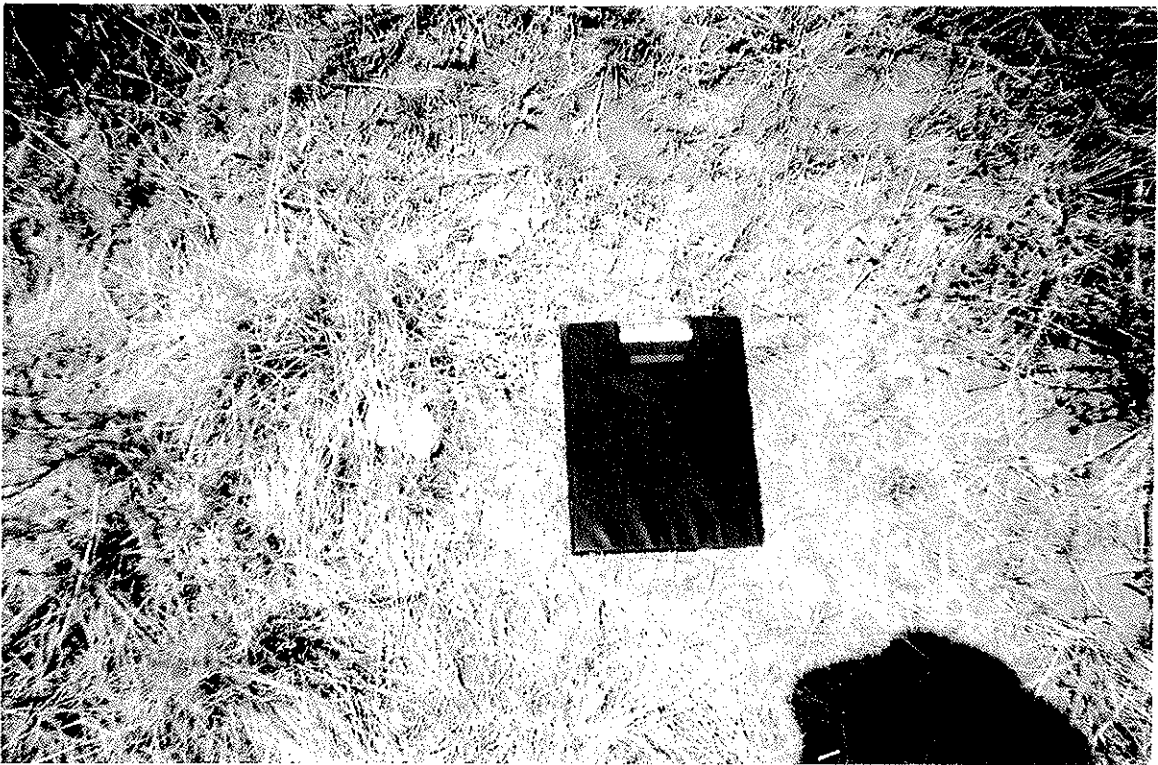


Figure 27. F7 T4S Site. Note jasper-chalcedony float next to note book. Float covers at least 15' perpendicular to the F7 Vein trend.

#### IV. F7 Vein Data and Analyses

##### A. Trench Descriptions

Table I is a condensed summary of the physical descriptions of Trenches Pit II, TN1, Pit II TS1, TS2, TS3 and Surface sample TS4 from NNW to SSE. The elevations of the Trenches were not measured, but the highest was Pit II on the NW end which dropped off sequentially to the lowest elevation at sample TS4 near the small drainage southeast of the traced F7 vein. The lengths of the trenches varied from about 15' - 35' from Pit II in the northwest to Pit I, and southeast of Pit I, from 40'-50' in the southeast. The depth of the trenches was generally about 8' with the deepest of 10' at TS3.

Pit II was on a steep part of the hill near the Fortune Ranch / BLM fence line. It was not trenched completely. Pit I was trenched mostly from the NE edge of the vein out into andesite country rock to the SW. Trenches TN1, TS1, TS2, and TS3 were trenched across the vein into country rock andesite on both the SW foot wall and the NE hanging wall of the vein.

The strike of the vein is generally N30°W from the T4S site north towards Pit I and bends to N50°W north from Pit I to Pit II. The strike of the vein is regularly 65°NE throughout the trench exposures.

The width of the vein varies from about 4'-6' at Pit 2 on the NW end widening to 14'-19' feet at the open SE end. The vein seems to be consistently jasper-chalcedony in the northwest to chalcedony-jasper in the southeast. The jasper-chalcedony contains various amounts of quartz-chalcedony-calcite veinlets with minor MnOx and FeOx.

Where exposed, the country rock adjacent to the vein appears to consist of altered and weathered andesite. This is consistent with the weathered, but unaltered andesite that outcrops about 60'-70' northeast of F7 Pit I and apparently underlies Hill 9641. The alteration and exact rock type of the andesite in the trenches was not confirmed in a laboratory.

TABLE I. DESCRIPTION OF F-7 VEIN TRENCHES

<u>TRENCH</u>	<u>LENGTH</u>	<u>DEPTH</u>	<u>VEIN WIDTH</u>	<u>VEIN STRIKE</u>	<u>VEIN DIP</u>	<u>VEIN MATERIAL</u>	<u>MINERALS</u>	<u>OVERBURDEN</u>	<u>COUNTRY ROCK</u>
Pit II	~15'	0'	4' - 6' not fully exposed	N 50° W	n.d.	silicic chalc-jasp with late chalc-qtz veins + later calc	jsp, qtz, chalc with calc, MnO and weathered FeOx	None	Andesite breccia
TN1	~35'	8'	6'	N 40°-50° W	65°-75° NE	silicic chalcedonic jasperoid with late calc-qtz veinlets	jsp, qtz, chalc minor calc	2' alluvium 1' FeO decompd Vein material	weathered altered andesite
Pit I (F7)	~35'	8'	12'	N30°-35°W	65° NE	silicic chalcedonic jasperoid with late calc-qtz veinlets with weather FeOx	jsp, qtz, chalc+ calc, sid + MnO veinlets	none Outcrops	altered andesite
TS1	~40'	8'	8'	N30°W		silicic chalcedonic jasperoid with late calc-qtz veinlets with weather FeOx	chalc, jasp, qtz minor calc	2'-3' alluvium + vein fragments	weathered altered andesite
TS2	~45'	8'	15'	N30°W		silicic jasperoid + chalcedony with late qtz-chalc-calc veinlets	jsp, qtz, chalc east 1/2 dark with Mn	3'-4" alluvium + vein fragments	weathered altered andesite
TS3	~50'	10'	21' of vein material at trench bt,	N30°W	n.a.	<b>No vein:</b> decomposed vein material at trench bottom See Fig.	qtz, chalc, jsp + FeOxides minor calc-qtz veinlets + MnO west end	Alluvium upper 6' Decomposed Veil 6' - 10'	6' weathered altered andesite andesite cobbles NE end
TS4	n.a.		Surface						

## B. Other Mineralization on Hill 9641

In addition to the Vein 7, samples were taken of the Precambrian metamorphic rocks outcropping on the hill on strike NNW from and above Pit II and two additional jasper vein outcrops ENE of Pit II on Hill 9641 (Andesite Hill) NE of F7 Vein. The Precambrian metamorphic rocks NW of Pit II are primarily quartz rich pegmatites and gneisses. They are pictured in Figure 29. A view SSE down strike of the F7 vein is shown in Figure 30. It shows Pit II down about 20' immediately below the author's boot, Pit II (green bushes in center of picture and the backhoe cutting Trench T1S 100 meters beyond. The F7 vein cuts andesite volcanic rock in the low grass foreground but the andesite – Precambrian metamorphic contact is between the outcrop the author is standing on and Pit II. Thus, it appears the F7 fault dies out and does not cut the Precambrian (no traces were found on this examination)

Additional jasper-chalcedony float was found on the south and Southwest slopes of Hill 9641 northeast of the F-7 Vein trenches (Fig. 32). The hill was briefly traversed and two mineralized outcrop areas on U. S. Forestry Land immediately north of Fortune Ranch land were located. They may be related to the float on the slopes of Hill 9641. However, HENDCO SERVICES believes other veins occur on the slopes of Hill 9641 as sources of float on Fortune Ranch land. A further surface survey of Hill 9641 on Fortune Ranch land is highly recommended.

The two outcrops on Hill 9641 are named Gap Vein I (Sample FRGV-1) and Hill 9641 (Sample FRRH-1). Table II is a brief description of these two vein occurrences and samples.

Gap Vein 1 is located at the top of the ridge north of the F7 Vein in a slight topographic low between the Precambrian metamorphic rocks north of Pit II and the top of Hill 9641 in andesite rocks east of Pit II (Fig. 33). It is 8' x 8' outcrop of small dark brown chalcedony-jasper-quartz veinlets with large patches of white calcite. The outcrop has an apparent trend of NE -SW perpendicular to the F7 Vein to the SW (Fig. 34).

The Hill 9641 outcrops consists of two occurrences of small chalcedony –quartz-calcite veinlets in andesite (?) that occur directly northeast (Fig. 35) and southeast (Fig 36) of the andesitic top of Hill 9641. These veinlets are of particular interest because their assay returned the highest trace values of trace metals of gold (0.013 ppm), silver (8.2 ppm), cadmium (6.4 ppm), chrome (75 ppm), copper (39 ppm), lead (2,610 ppm or 0.26%) and zinc (467 ppm or 0.05%) among all of the F7 Vein area samples tested. It is again noted that these occurrences are on USFS land immediately north of Fortune Ranch land.

TABLE II. DESCRIPTION OF HILL 9641 VEIN SAMPLES

<u>TRENCH</u>	<u>LENGTH</u>	<u>DEPTH</u>	<u>VEIN WIDTH</u>	<u>VEIN STRIKE</u>	<u>VEIN DIP</u>	<u>VEIN MATERIAL</u>	<u>MINERALS</u>	<u>OVERBURDEN</u>	<u>COUNTRY ROCK</u>
<u>GAP VEIN I</u> (FRGV-1)	Outcrop area	Surface	tbd.	tbd.	tbd.	Small veinlets in andesite drk brwn chalc-jsp-qtz veins with large patches of calc. 200'-250' NW Pit II Several patches in a NE-SW trend middle of gap W of Hill 9641 Patches ~ 8'x8'.	chalc, jsp, qtz calc	None	Andesite
<u>HILL 9641</u> (FRRH-1)	Outcrop area	Surface	tbd.	tbd.	tbd.	Small veinlets in andesite chalc-qtz-calc veinlets Several patches of veinlets directly NE and SE of top of Hill 9641 Patches ~ 6'x6'.	chalc, qtz	None	Andesite



Figure 29. Precambrian quartz rich meta-sediments on USFS land directly above and N45°W of Pit II.

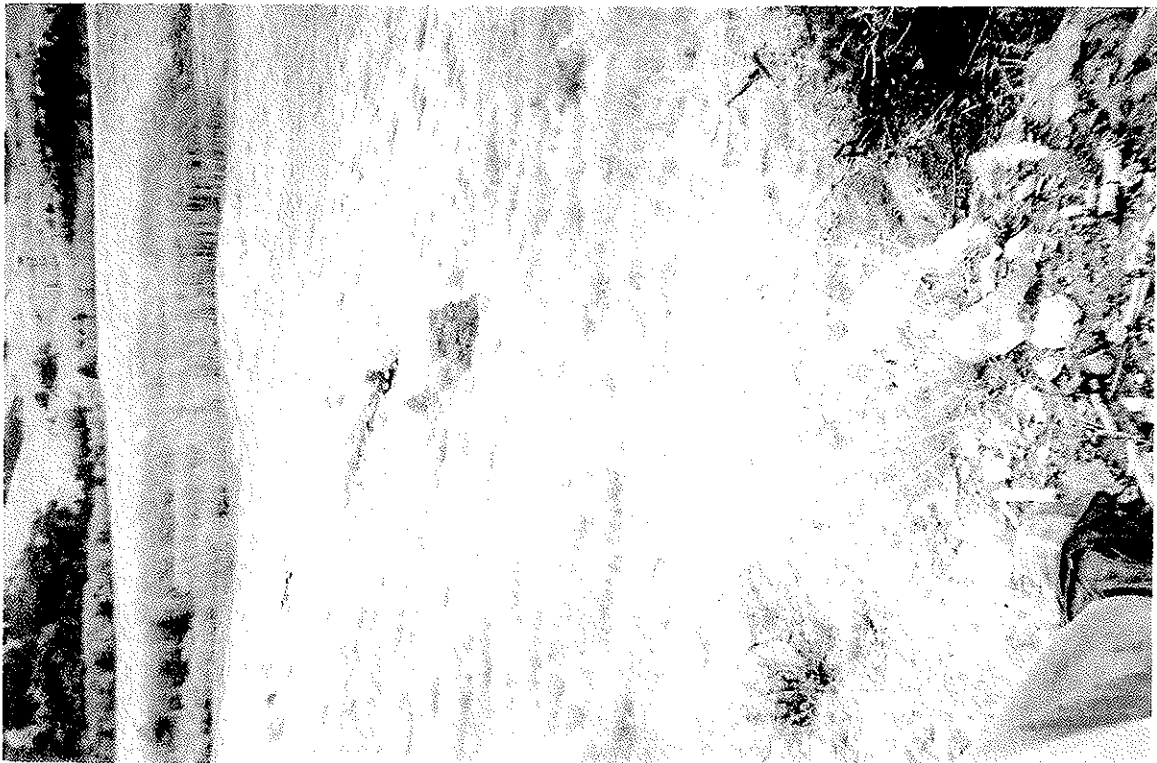


Figure 30. Precambrian quartz rich meta-sediments looking S45°E towards the F7 Vein. Backhoe trenching T1S. Trend of F7 vein reaches Pit II immediately beyond Author's boot, but apparently down not cut Precambrian at feet.



Figure 32. SW and S slopes of Hill 9641 -> NNE from vicinity of T4S. Note locator tree near top. Jasper-chalcedony float occurs on these slopes. Fresh andesite crops out behind and in front of SUV.

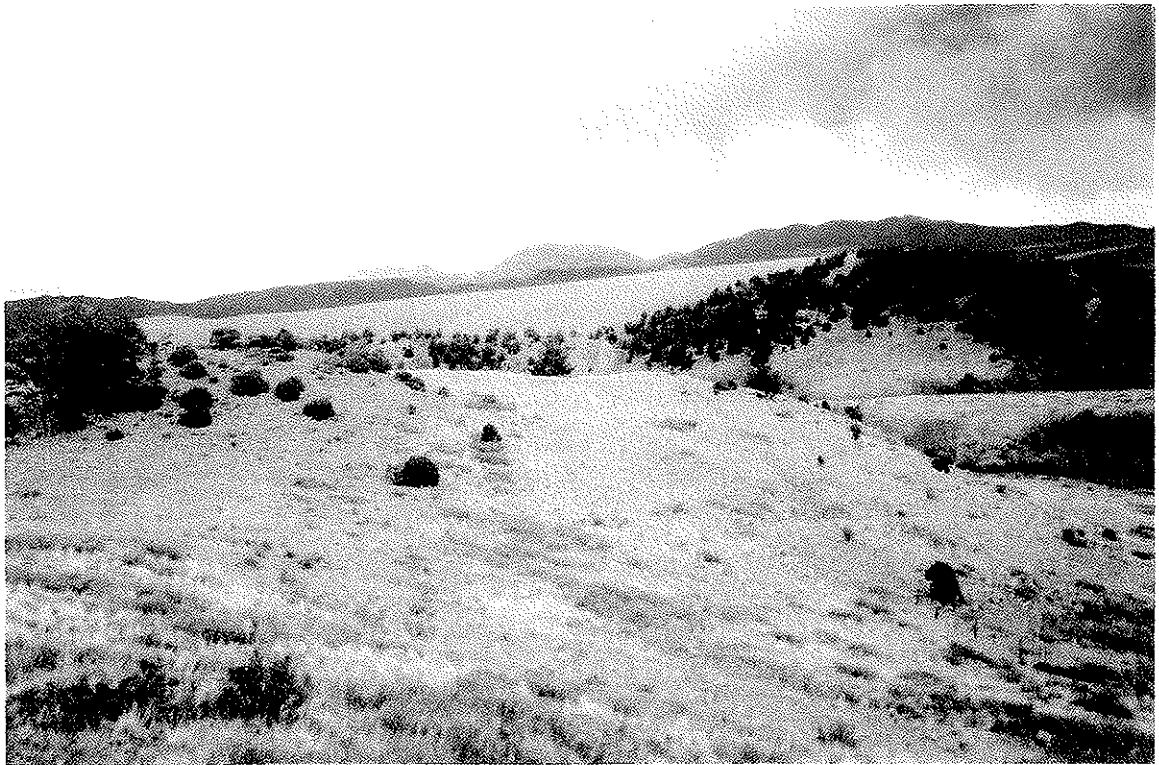


Figure 33. Top of Precambrian hill above Pit II. View ->E toward Hill 9641. GV-1 outcrops in topo low just left of picture. RV-1 outcrops at top of Hill 9641 beyond tree upper left corner, possibly in Precambrian. Lower lighter bench in center is andesite. Locator tree on this bench to the right. P. 21

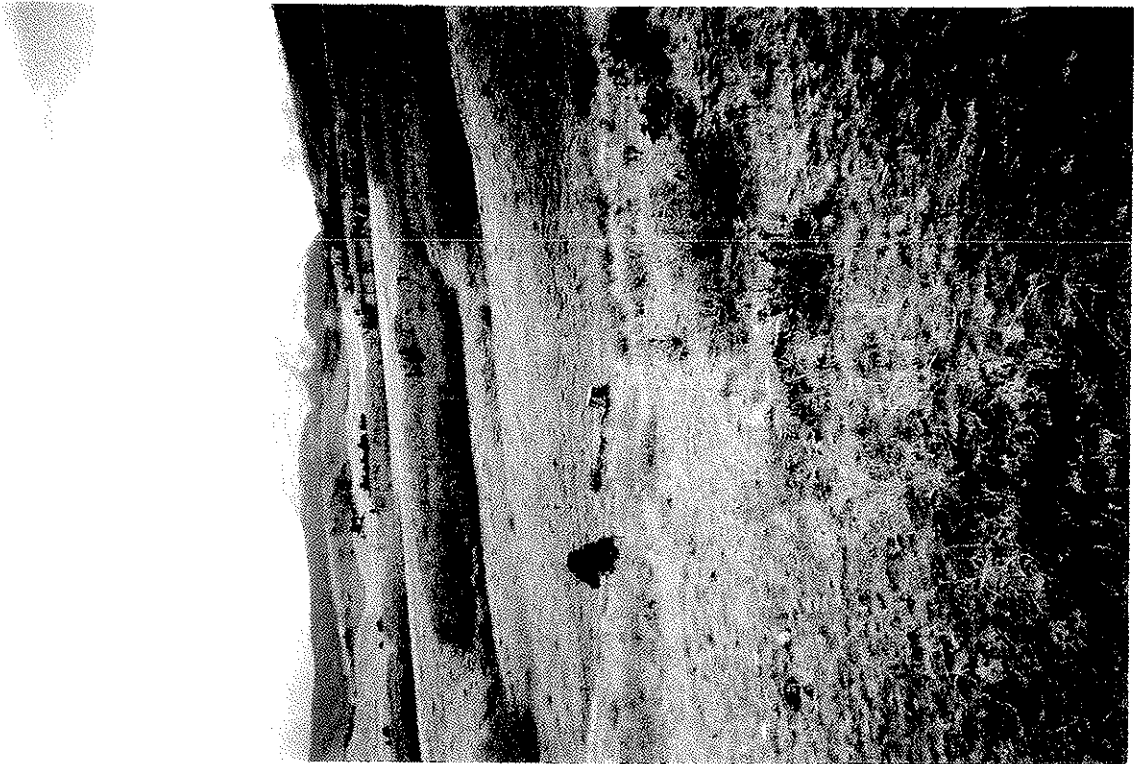


Figure 34. Gap Vein (GV-1) brown jasper quartz outcrop in topo low immediately west of Hill 9641. View -> SSW to Blanca Peak. Backhoe trenching F7 vein mid center.



Figure 35. Top of Hill 9641. View -> Blanca Peak. Small quartz-chalcedony veins at RH-1 sample site. in



Figure 36. Top of Hill 9641 at southern outcrop of RH-1. Small quartz-jasperoid float and subcrop. Site of best analyses of study. View -> NNW.



Figure 37. View -> South from Locator Tree on Hill 9641. T1S trench directly beyond SUV. T3S and T1S trenches visible to the left and right respectively.

## B. Trench Samples

Rough chip channel sampling was the method used for all trench samples. A complete as possible representative sample of vein material was taken horizontally across the veins exposed in the trenches. The samples were approximately parallel to the trench bottoms.

## D. Sample Analyses

The samples were examined by hand lens for rock and mineral content as reported in Tables I and II. They were split and samples shipped for analyses by ALS Chemex in Sparks, Nevada; the same company that analyzed the samples collected in October, 2005.

Table III is the ALS Chemex report showing the actual analytical results for the trench sample and Hill 9641 samples.

## V. Economic Discussion of F7 Vein and Hill 9641 Samples

In order to evaluate the economic significance of the F7 Vein and other samples in this study, the ALS Chemex sample analyses shown in Table III are rearranged for comparison in Table IV. In the discussion below, it is first noted that none of samples analyzed contained any economic amounts of any elements. However, the F7 Vein samples did in general contain trace elements favorable to alteration and potential economic mineralization at depth. The most economically interesting samples in order are the RH-1 (Hill 9641); GV-1 (Gap Vein) and Pit 1 on the F7 Vein samples. The RH-1 and GV- samples are on U.S. Forest land just across the border fence line with Fortune Ranch land immediately south in Section 9.

Table IV. breaks down the analyses in three categories:

Favorable Jasperoid Trace Elements (Lovering, 1972);  
Additional Favorable Trace Elements (HENDCO SERVICES) and  
Other Elements Analyzed. As mentioned in Section V.C.

In some mining districts, jasperoid can contain gold in economic quantities, but most vein jasperoid are indicative of alteration and possible economic mineralization at depth. Lovering (1972) compares trace elements in jasperoids that are "favorable" or "unfavorable" to economic mineralization at depth.

RE06050896 - Finalized  
 CLIENT : "HENSER - Hendco Services"

# of SAMPLES : 12

DATE RECEIVED : 2006-06-08 DATE FINALIZED : 2006-06-21

PROJECT : ""

CERTIFICATE COMMENTS : ""

PO NUMBER : ""

SAMPLE	WEI-21	Au-AA23	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41						
DESCRIPT	kg	Recvd	Wt. Au	ppm	Ag	ppm	Al	%	As	ppm	B	ppm	Ba	ppm	Be	ppm	Bi	ppm	Ca	%	Cd	ppm	Co	ppm
Pit 11	0.92	<0.005	<0.2	<0.2	0.14	222	10	350	2.9	<2	15.5	0.7	10											
T1N	0.42	<0.005	<0.2	0.2	101	<10	100	1.3	<2	20.4	<0.5	5												
P1	1.04	<0.005	0.2	0.23	119	<10	40	2.2	<2	17.2	<0.5	4												
P1B	0.56	<0.005	0.6	0.03	155	<10	1880	1.9	<2	4	>25.0	2.6	25											
T1S	1.38	0.007	<0.2	0.11	32	<10	80	1.2	<2	>25.0	<0.5	3												
T1S-A pos:	1.06	<0.005	<0.2	0.1	79	<10	430	1.1	<2	2	>25.0	7												
T2S-B	0.8	<0.005	<0.2	0.44	118	<10	340	1.3	<2	>25.0	<0.5	8												
T3S-A	0.74	<0.005	<0.2	1.35	8	<10	210	<0.5	<2	1.01	<0.5	13												
T3S-C	0.76	<0.005	<0.2	1.73	5	<10	170	<0.5	<2	1.03	<0.5	22												
T3S-D	0.74	<0.005	<0.2	1.62	7	<10	180	<0.5	<2	1	<0.5	23												
GV1	1.02	<0.005	<0.2	0.25	286	<10	1720	2.6	<2	15.1	<0.5	7												
RH1	0.06	0.013	8.2	0.1	46	<10	40	0.6	<2	16.7	6.4	1												

Table III; TRENCH SAMPLE ANALYSES, A.L. Chemex

	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	Hg-CV41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41
	Cr	Cu	Fe	Ga	Hg	K	La	Mg	Mn	Mo	Na	Ni	Ni	Ni	Ni	Ni	Ni
	ppm	ppm	%	ppm	ppm	%	ppm	%	ppm	ppm	%	ppm	ppm	ppm	%	ppm	ppm
Pit 11	5		7	5.12	<10	0.01	0.02	<10	0.1	4040	8	0.01	0.01	0.01	0.01	0.01	2
T1N	25		5	4.62	<10	<0.01	0.01	<10	0.13	1960	2	0.01	0.01	0.01	0.01	0.01	6
P1	4		4	4.14	<10	<0.01	0.03	<10	0.14	1530	2	0.01	0.01	0.01	0.01	0.01	1
P1B	10		33	1.48	<10	0.01	0.32	<10	0.06	31500	38	0.01	0.01	0.01	0.01	0.01	27
T1S	2		2	2.06	<10	<0.01	0.01	<10	0.27	1470	1	0.01	0.01	0.01	0.01	0.01	4
T1S-A pos:	27		4	1.51	<10	<0.01	0.01	<10	0.16	4740	4	0.01	0.01	0.01	0.01	0.01	3
T2S-B	2		4	3	<10	<0.01	0.02	<10	0.23	3370	2	0.01	0.01	0.01	0.01	0.01	2
T3S-A	22		19	4.55	10	<0.01	0.09		0.25	1315	1	0.1	0.1	0.1	0.1	0.1	8
T3S-C	14		19	5.5	10	0.01	0.1		0.29	1710	<1	0.13	0.13	0.13	0.13	0.13	6
T3S-D	25		21	5.38	10	0.01	0.1		0.28	1560	1	0.12	0.12	0.12	0.12	0.12	9
GV1	6		89	3.78	<10	0.01	0.03	<10	0.11	2440	7	0.03	0.03	0.03	0.03	0.03	5
RH1	75		39	0.83	<10	0.03	0.01	<10	0.12	519	2	0.01	0.01	0.01	0.01	0.01	2

Table III; **TRENCH SAMPLE ANALYSES**, A.L. Chemex; Continued

	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41
P	Pb	S	Sb	Sc	Sr	Ti	Ti	Ti	U	V	W	Zn						
ppm	ppm	%	ppm	ppm	ppm	%	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm
Pit 11	180	5	0.01	<2	2	184	0.01	0.01	10	<10	117	<10	40					
T1N	280	5	<0.01	<2	1	164	0.01	<10	<10	<10	32	<10	28					
P1	190	<0.01	<2	<2	2	228	0.01		10	<10	58	<10	31					
P1B	120	6	<0.01	<2	2	777	<0.01	<10	20	<10	393	<10	80					
T1S	120	<0.01	<2	<2	2	604	<0.01	<10	<10	<10	16	<10	18					
T1S-A pos:	110	<0.01	<2	<2	1	172	<0.01		10	<10	23	<10	19					
T2S-B	260	3	<0.01	<2	2	190	0.02		10	<10	37	<10	37					
T3S-A	2070		0.01	<2	9	62	0.08	<10	<10	<10	99	<10	115					
T3S-C	2270	5	0.02	<2	10	72	0.08		10	<10	106	<10	106					
T3S-D	2270		0.02	<2	8	71	0.08		10	<10	107	<10	99					
GV1	250	5	0.05	<2	1	213	0.03	<10	<10	<10	86	<10	40					
RH1	80	2610	<0.01		5	109	0.01	<10	<10	<10	20	<10	467					

Table III; TRENCH SAMPLE ANALYSES, A.L. Chemex; Continued

**TABLE IV "FAVORABLE" TRACE ELEMENT ANALYSES, USGS 19**

	Pit II	T1N	Pit I	P1-B	T1S	T1S-A	T2S-B	T3S-A	T3S-C	T3S-D	GV-1	RH-1
Weight	0.92	0.42	1.04	0.56	1.38	1.06	0.8	0.74	0.76	0.74	1.02	0.06
Ag			0.2	0.6								8.2
As	222	101	119	155	32	79	118	8	5	7	286	46
Bi			4		2							
Cu	7	5	4	33	2	4	4	19	19	21	89	39
Fe %	5.12	4.62	4.14	1.48	2.06	1.51	3	4.56	5.5	5.38	3.78	0.83
Ga							10	10	10	10		
In												
Mo	8	2	2	38	1	4	2	1	1	1	7	2
Pb	5	6		6			3		5		5	2,610 0.26%
Sn												
Zn	40	28	31	80	18	19	37	115	106	99	40	467

**ADDITIONAL FAVORABLE TRACE ELEMENTS: HENDCO SERVICES**

Au					0.007							0.013
Cd	0.7			2.6								6.4
Co	10	5	4	25	2	7	8	13	22	23	7	1
Hg	0.01			0.01					0.01	0.01	0.01	0.03

**ADDITIONAL FAVORABLE TRACE ELEMENTS: HENDCO SERVICES**

Mn	4,040	1,960	1,530	31,500	1,470	4,740	3,370	1,315	1,710	1,560	2,440	519
Ni	2	6	1	27	4	3	2	8	6	9	5	2
S	0.01			3.15%				0.01	0.02	0.02	0.05	
Sb												5

**OTHER ELEMENTS ANALYSED**

Al %	0.14	0.2	0.23	0.03	0.11	0.1	0.44	1.35	1.73	1.62	0.25	0.1
B	10										10	
Ba	350	100	40	1,880	80	430	340	210	170	180	1,720	40
Be	2.9	1.3	2.2	1.9	1.2	1.1	1.3				2.6	0.6
Ca %	15.5	20.4	17.2	> 25.0	> 25.0	> 25.0	> 25.0	1.01	1.03	1	15.1	16.7
Cr	5	25	4	10	2	27	2	22	14	25	6	75
K	0.02	0.01	0.03	0.32	0.01	0.01	0.02	0.09	0.1	0.1	0.03	0.01
La								30	30	30		
Mg	0.1	0.13	0.14	0.06	0.27	0.16	0.23	0.25	0.29	0.28	0.11	0.12
Na	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.1	0.13	0.12	0.03	0.01
P	180	280	190	120	120	110	260	2,070	2,270	2,270	250	80



In comparing the analyzed elements by sample in Table IV, the highest amount of each element are in red and the second or "notable" amounts of the elements are shown in green. To better compare the samples they are regrouped as shown in Table V and discussed below.

A. Favorable Jasperoid Trace Elements (Lovering, 1972)

As can be seen in Table IV, these trace elements according to Lovering are Ag (silver), As (arsenic), Bi (bismuth), Cu (copper), Fe (iron), Ga (gallium), In (Indium), Mo (molybdenum), Pb (lead), Sn (tin), and Zn (zinc). The analytical trace elements are reported in ppm (parts per million) except iron (Fe) which is a major element of jasperoids and is reported in % (percent). In looking at these analyses in Tables IV and V, the following observations are made.

F7 Vein samples PII, T1N, PI, T1S, T1S-A, T2S and T2-B are similar in mineralogy and in analytical results. In Table V, the values are averaged for these samples in Column I and the highest of these (Pit I) compared in Column II. These analyses seem to represent the F7 Vein in general. T3S-A, -B, -C samples (averaged in Column III) are generally similar, but in detail they differ from the Pit II – T2S samples, primarily because they are diluted with altered andesitic wall rock and colluvium as discussed below. The GV-1 and RH-1 sample are distinctly different from the F7 Vein samples.

As can be seen in Table V, all samples show good trace concentrations of six out of eleven "favorable" trace elements: As, Cu, Fe, Mo, Pb, and Zn. Three other "favorable" trace elements Ag, Bi, and Ga occur in a few samples, while In and Sn are not present. Trace elements in T3S A-C are similar but have higher than average (Column I) of Cu, Fe, Ga, and Zn. The "favorable" elements in GV-1 and RH-1 are generally higher in As, Cu, Pb, and Zn than the averages for F7 Vein samples. In addition, trace gold was found in RH-1 from Hill 9641.

These sample results indicate the strong likelihood that the F-7 Vein is favorable for alteration and economic mineralization at depth, but does not predict how deep such mineralization might be found. This possibility can only be tested by drilling.

**TABLE V. SAMPLE ANALYSES GROUPED AS ECONOMIC INDICATORS**

<u>Element</u> ppm/(%)	<u>Column I</u> Average: PII, T1N, PI, T1S, T1S-A, T2SB	<u>Sample</u> # (6)	<u>Column II</u> PI-B	<u>Column II</u> T3S A-C	<u>Sample</u> # (3)	<u>GV-1</u>	<u>RH-1</u>
{ (+) or (-) is higher or lower than F7 Averages in Column I }							

**"Favorable" Trace Element Analyses: USGS 1972**

Ag	( 0.2ppm)	#1	0.6ppm (+)	0.0ppm (-)	#3	0.0ppm (-)	8.2ppm (+)
As	111.8ppm	#6	155ppm (+)	6.7ppm	#3	286ppm (+)	46ppm (-)
Bi	( 2.0ppm)	#1	4ppm (+)	0.0ppm (-)	#3	0.0ppm (-)	0.0ppm (-)
Cu	4.3ppm	#6	33ppm (+)		#3	89ppm (+)	39ppm (+)
Fe (%)	3.41%	#6	1.48% (-)	5.1% (+)	#3	3.78%(=)	0.83% (-)
Ga	0.0ppm	#6	0.0ppm (=)	10ppm (+)	#3	0.0ppm (=)	0.0ppm (=)
In (not found)	0.0ppm	#6	0.0ppm (=)	0.0ppm (=)	#3	0.0ppm (=)	0.0ppm (=)
Mo	3.2ppm	#6	38ppm (+)	0.7ppm (-)	#2	7ppm (+)	2ppm (-)
Pb	4.7ppm	#3	6ppm (+)	1.7ppm (-)	#2	5ppm (=)	2,610ppm 0.26% (++)
Sn (not found)	0.0ppm	#6	0.0ppm (=)	0.0ppm (=)	#3	0.0ppm (=)	0.0ppm (=)
Zn	28.8ppm	#6	80ppm (+)	106.7ppm (+)	#3	40ppm (+)	467ppm (+)

**Additional "Favorable Trace Elements": HENDCO SERVICES**

(Au)	( 0.07ppm)	#1	0.0ppm (-)	0.0ppm (-)	#3	0.0ppm (-)	0.013ppm(+)
(Cd)	(0.7ppm)	#1	2.6ppm (+)	0.0ppm (-)	#3	0.0ppm (-)	6.4ppm (+)
Co	6ppm	#6	25ppm (+)	19.3ppm(+)	#3	7ppm (=)	1ppm (-)
(Hg)	0.01ppm(+)	#1	(0.01ppm)	(0.01ppm) (-)	#3	0.01ppm (=)	0.03ppm (+)
Mn	2,852ppm	#6	31,500ppm 3.15% (++)	1,528ppm (-)	#3	2,440ppm (=)	519ppm (-)
Ni	3ppm	#6	27ppm (+)	7.6ppm (+)	#3	5ppm (+)	2ppm (=)
Su	(0.01ppm)	#1	0.0ppm (-)	1.7ppm (+)	#3	0.005 (=)	0.0ppm (=)
Sb	0.0ppm	#6	0.0ppm (=)	0.0ppm (=)	#3	0.0ppm (=)	0.0ppm (=)

**TABLE V. SAMPLE ANALYSES GROUPED AS ECONOMIC INDICATORS**

<u>Element</u> ppm/(%)	<u>Column I</u> Average: PII, T1N, PI, T1S, T1S-A, T2SB	<u>Sample</u> # (6)	<u>Column II</u> PI-B	<u>Column II</u> T3S A-C	<u>Sample</u> # (3)	<u>GV-1</u>	<u>RH-1</u>
{ (+) or (-) is higher or lower than F7 Averages in Column I }							

**Other Trace Elements Analyzed**

Al	0.2ppm	#6	0.03ppm (-)	1.57ppm (-)	#3	0.25ppm (=)	0.1ppm (-)
B	(10ppm)	#1	0.0ppm (-)	0.0ppm (-)	#3	0.0ppm (-)	0.0ppm (-)
Ba	223.3ppm	#6	1,880ppm (+)	186.7ppm (=)	#3	1,720ppm (+)	40ppm (-)
Be	1.7ppm	#5	1.9ppm (=)	0.0ppm (-)	#3	2.6ppm (+)	0.6ppm (-)
Ca (%)	21.35%	#6	>25% (+)	1% (-)	#3	15.1% (-)	16.7% (-)
Cr	10.8ppm	#6	10ppm (=)	20.3ppm (+)	#3	6ppm (-)	75ppm (+)
K	0.017ppm	#6	0.32ppm (+)	0.097ppm (+)	#3	0.03ppm (-)	0.01ppm (-)
La	0.0ppm	#6	0.0ppm (=)	30ppm(+)	#3	0.0ppm (=)	0.0ppm (=)
Mg	0.17ppm	#6	0.06ppm (-)	0.27ppm (+)	#3	0.11ppm (-)	0.12ppm (-)
Na	0.01ppm	#6	0.01ppm(=)	0.17ppm (+)	#3	0.03ppm (+)	0.01ppm(=)
P	190ppm	#6	120ppm (-)	2,203ppm (++)	#3	250ppm (+)	80ppm (-)
Sc	1.7ppm	#6	2ppm (=)	9ppm (+)	#3	1ppm (-)	1ppm (-)
Sr	257ppm	#6	777ppm (+)	68ppm (-)	#3	213ppm (=)	109ppm (-)
Ti	0.0125ppm	#4	20ppm (+)	0.08ppm(+)	#3	0.0ppm (=)	0.0ppm (=)
Tl	12.5ppm	#4	0.0ppm (=)	10ppm (-)	#2	0.03ppm (-)	0.01ppm (-)
U (Not found)	0.0ppm	#6	0.0ppm (=)	0.0ppm (=)	#3	0.0ppm (=)	0.0ppm (=)
V	47.2ppm	#6	393ppm (+)	104ppm(+)	#3	86ppm (+)	20ppm (-)
W (Not found)	0.0ppm	#6	0.0ppm (=)	0.0ppm (=)	#3	0.0ppm (=)	0.0ppm (=)

## B. Additional Favorable Trace Elements (HENDCO SERVICES)

Other elements that are commonly considered indicative of economic hydrothermal mineralizing solutions in vein systems such as the F7 Vein are shown in the second section of Table V. They include Au (gold), Cd (cadmium), Co (cobalt), Hg (mercury), Mn (manganese), Ni (nickel), S (Sulfur) and Sb (antimony). Especially significant are the underlined element.

In the analytical results, Co, Mn, and Ni occur in most of the samples. Au, Cd, Hg and S occur variously in some samples\*, while Sb was not identified in any sample.

Of interest, gold was found as a minor trace element in samples T1S and RH-1 (Hill 9641) and trace mercury was found in Samples Pit I, T3S a-c, GV-1 and RH-1.

These results tend to support the conclusion above that the F-7 Vein as sampled is favorable for alteration and economic mineralization at depth. \* **The presence of trace Au, Ag, Cd, and Hg are often favorable for gold/silver mineralization at depth.**

## C. Other Elements Analyzed

Section III of Table V lists other elements analyzed in this study. In general, they are not indicative of the presence economic mineralization. Silicon was not analyzed for and would have been high because of the high percentages of quartz minerals jasperoid, chalcedony, and quartz in present in all samples.

Higher amounts of Al (aluminum), K (potassium), Mg (magnesium), Na (sodium), P (phosphorus), Sc (scandium), and Ti (titanium), as well as the lower Ca (calcium), Ba (barium) and Sr (strontium) occur in the T3SA-C samples. They are interpreted as altered wall rock andesite and colluvium being mixed in with broken and weathered F7 Vein jasperoid, chalcedony and quartz exposed deeper in T3S.

### C. Significance of GV-1 and RH-1 Samples

The samples taken at Gap Vein (GV-1) and Hill 9641 (Andesite Hill) are interesting because they represent mineralization east of the F7 Vein in the andesitic hanging wall of the F7 Vein fissure. While GV-1 contains jasperoid, chalcedony, quartz and calcite, RH-1 contains chalcedony, quartz and calcite and NO jasperoid. GV-1 has As, Cu, Mo, and Zn values higher than the F7 Vein averages (Column I). RH-1 on the other hand, has Au (gold) as well as higher As, Cu, Pb (lead, at 0.26 %) and Zn than the average of F7 Vein samples.

The significance of the mineralization in GV-1 and RH-1 is that they show that the hanging wall andesite projected above the northeast dipping F7 vein contains some trace and low grade (RH-1, 0.26% Pb + trace Ag [silver] and Au [gold]) base and precious mineralization occurrences. This coupled with the previously described jasperoid, chalcedony, quartz and calcite float samples found on the south and southeast slopes of Hill 9641, suggests that additional mineralization may be found in the F7 Vein hanging wall andesite underlying portions of Hill 9641 **on Fortune Ranch Property**. **The RH-1 mineralization may be indicative of the type of target economic mineralization to be found at depth down dip on the F7 Vein**. These occurrences are the basis for **RECOMMENDATION I, to map the rest of Hill 9641 on Fortune Ranch Property in NE and central east Section 9**.

### VII. Proposed F7 Vein Magnetic Survey and Drilling Program

In order to test the potential for alteration and economic mineralization at depth, the following exploration survey and drilling program is recommended. The model to be tested is possible andesite wallrock alteration and economic mineralization at depth down dip (65°NE) from the surface jasper-chalcedony-quartz F7 Vein outcrops. The first step is surface mapping of the hanging wall andesite NE of the F7 Vein as recommended in Section IV. The second step is to conduct a simple ground magnetic across the F7 Vein and hanging wall to identify and outline the proposed down dip, subsurface zone of andesite wall rock alteration. The third step is to drill the alteration anomaly and proposed mineralization at depth with an initial three hole core drilling program as indicated below.

**A. Recommendation 1. Hill 9641 Hanging Wall Mapping.**

As discussed in IV above, a one day program of surface mapping of the hanging wall andesite above the F7 Vein is recommended. The goal of this effort is to revisit the Gap Vein (GV-1) and Hill 9641 (RH-1) sites and map the northeast, east and south faces of Hill 9641 on Fortune Ranch land to locate potential additional vein outcrops and the sources of jasper-chalcedony-quartz float on Fortune Ranch Property above the F7 Vein. Such hanging wall mineralization would be further indication of potential F7 Vein mineralization at depth. (See B. below).

In addition, mineralization of the hanging wall on the slopes of Hill 9641 might help refine the site locations for the core drilling program recommended in C. below. Cost of Step 1 mapping would be between \$1,500 and \$2,500 depending on outcrops found and samples analyzed.

**B. Recommendation 2. Surface Magnetic Survey**

As a relatively inexpensive second step, it is recommend that a simple surface, ground magnetic survey be conducted perpendicular to the surface outcrop of the F7 Vein and the hanging wall andesite northeast of the F7 Vein to identify wallrock alteration at depth along F7 Vein. Ground magnetic surveys can identify subsurface wall rock alteration where the magnetic ferromagnesian minerals of unaltered andesite are "demagnetized" by hydrothermal alteration to pyrite and other non-magnetic alteration minerals. Such a non-magnetic anomaly should contain any economic mineralization present in the VF7 Vein system at depth. The anomaly will also help better define the core drilling program recommended in C. below.

One geophysicist suggests a four line traverse perpendicular to the strike of the F7 Vein. On the assumption of HENDCO SERVICICES that the vein continues beneath the alluvium SSE of T4S, the initial four lines would be laid out as suggested in Figure 38. This would consist of one day in the field, 1,600' of magnetic survey along 4 traverses, and a day to correct the data and report the results. The cost of such a survey is approximately \$1,500 to \$2,000.

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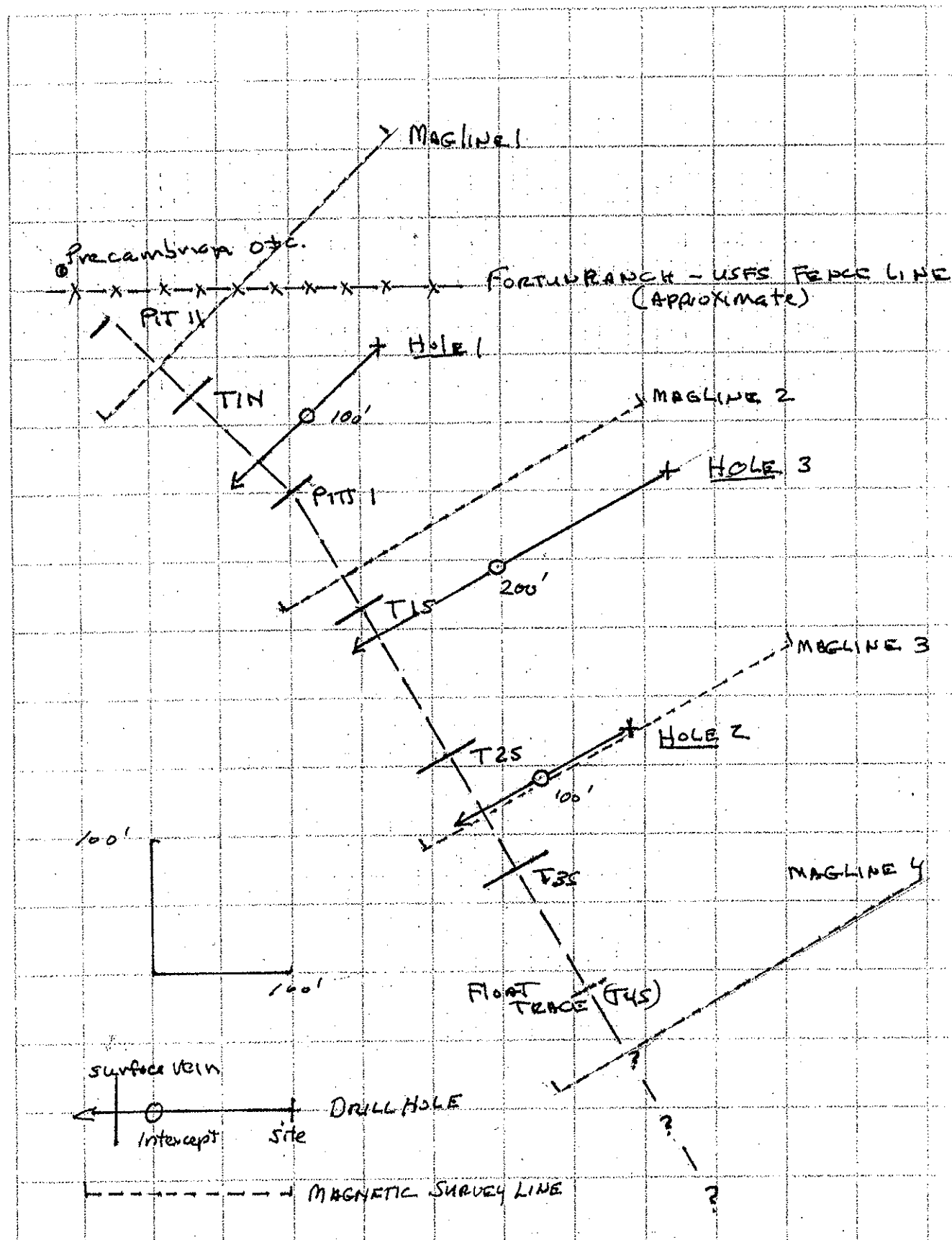


FIGURE 38: VEIN, DRILL SITES AND MAGNETIC LINES

## C. Recommendation 3. Proposed Three Hole Core Drilling Program.F7

### 1. Vein and Drilling Site Map

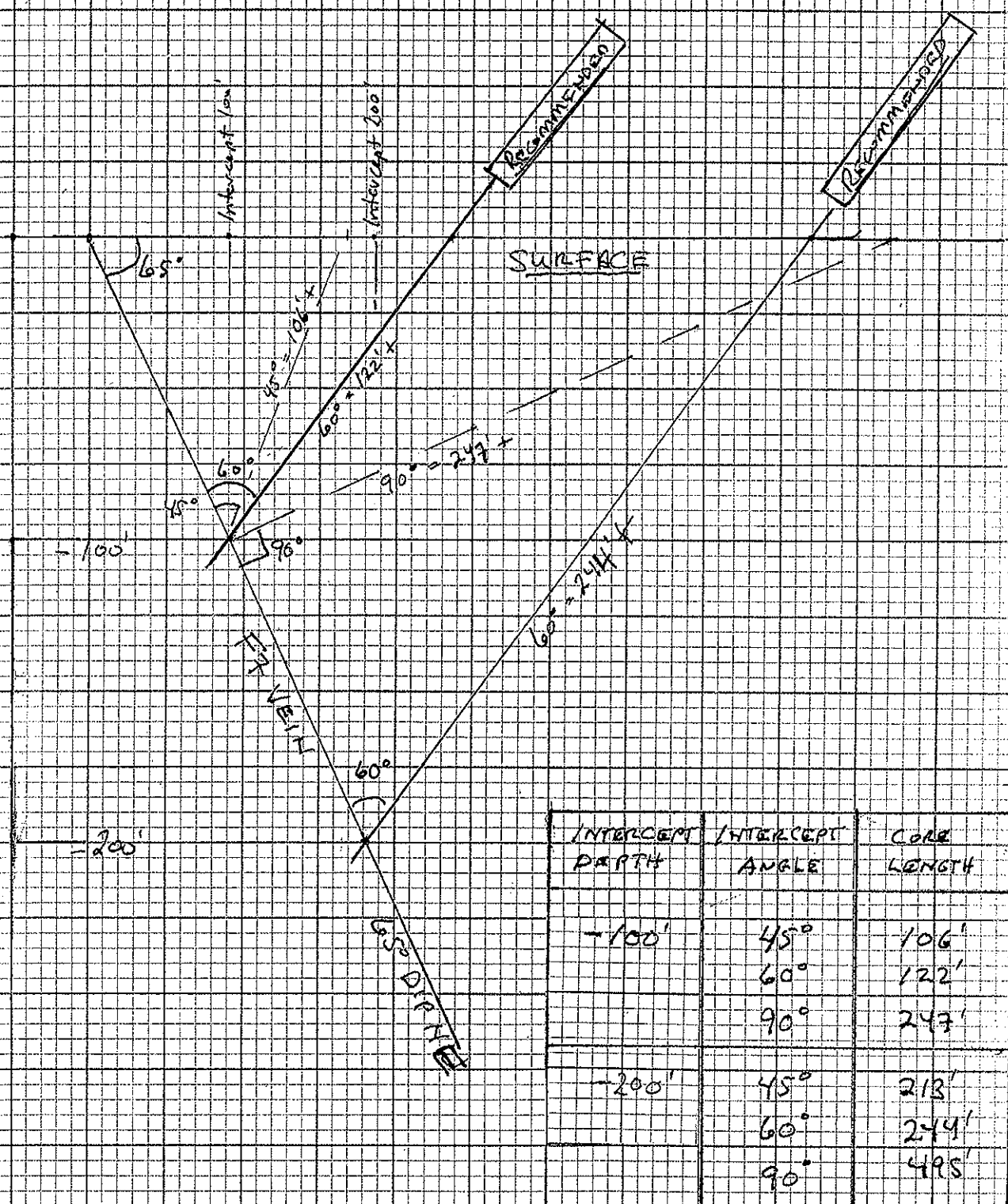
Figure 38 is a simplified plan map of the F7 Vein outcrop and trenches, proposed magnetic survey traverses, and preliminary site location of the proposed three hole core drilling program. Holes 1 and 2 intersect the F7 Vein at a 60° angle (other options are at 45° or 90° see C.3. below) at a depth of 100' below the surface. Hole 3 also intersects the F7 Vein at a 60° angle at 200' below the surface in the middle of the exposed vein. This configuration should provide samples of wall rock alteration and mineralization if they occur at 200' or less from the surface. The results of the surface magnetic survey may cause this drilling plan to be modified to intersect a deeper indicated alteration and mineralization zone and the potential SSE extension of the F7 Vein SSE of T34.

### 2. F7 Vein Drilling Cross Section

Figure 39 is a simplified cross sectional view of the proposed three hole drilling program. The relation of the hanging wall andesite and the F7 Vein area is also shown. This cross section shows the proposed 60° angular intersection of the drill holes with the F7 Vein. The cross section also shows hypothetical wallrock alteration and economic vein mineralization which is the exploration model to be tested by the proposed drilling program. The actual existence and depth of alteration and mineralization remain to be tested by the core drilling program.

### 3. Estimated Drilling Costs

Calculations for the proposed drilling program were made for three cases of intersections with the vein: 45°, 60° and 90° as shown in Figure 39. Drilling footage and costs depend on the angle of vein intersection. A 90° intersection would provide the best vein sample, but at the highest footage cost. A 45° vein intersection yields the lowest drilling footage costs, but risks deflecting off of a hard siliceous vein with possibly poor sampling of the vein. The 60° vein intersection is the recommended compromise vein intersection angle. If Fortune Ranch does move forward with the drilling program, it should be bid out to local drillers. They might favor a different angle of intersection for best sampling based on their drilling experiences and the planned program.



INTERCEPT DEPTH	INTERCEPT ANGLE	CORE LENGTH
100'	45°	106'
	60°	122'
	90°	247'
200'	45°	213'
	60°	244'
	90°	495'

FIGURE 39. CROSS SECTION - DRILLING SOLUTIONS

The recommended 60° vein intersection would require approximately 1,200' of core drilling, presumably of H size (2.5" diameter) diamond drill core. This drill core will be logged by a geologist and vein mineralization alteration intersections will be sampled as appropriate and analyzed similarly to the trench samples. Preliminary discussions with a local (minimum mobilization) driller in 2006 provided an estimate of an eight day drilling program costing about \$35,000 - \$40,000.

4. Total costs for the recommended mapping, magnetic survey and three hole drilling program are as follows.

a. Hill 9641 Mapping	\$ 1,500 - \$ 2,500
b. Ground Magnetic Survey	\$ 1,500 - \$ 2,000
c. Three Hole Drill Program	\$35,000 - \$40,000
d. Sample analyses (est.)	\$ 1,000 - \$ 1,500
d. Supervisory Geological Magnetic Survey, Core Logging, Report (does not include a. mapping above)	\$ 5,000 - \$ 7,000
TOTAL	<hr/> \$44,000 - \$53,000

5. Speculative Economic Value

The potential value of this prospect is impossible to determine without drilling and proving potential mineralization at depth as discussed throughout this report. However, in order to speculate on the value of proceeding with the recommended drilling program, a calculation of a potential value of the F7 at depth is shown in Figure 40. This calculation is based on the Herbert Hoover Half-moon method for rapid calculation of potential vein value knowing only the dimensions of the vein at the surface. This rapid exploration evaluation method has been successfully used by Herbert Hoover in the past and later independently by the Author.

While of interest in speculating on the potential value of a mineralized F7 Vein at depth, there is no known reason at present why this calculation is, in fact, true. The abundant silica in the F7 Vein argues strongly for wall rock alteration at depth. However there is no assurance at present that any **economic** concentration of precious or base metals of value ever occurred in this system.

This disclaimer being made, the calculations in Figure 40 yield the following speculative economic values for the F7 Vein. [Please note the several unproven assumptions made in Fig. 40]

- a. F7 Vein as exposed at the surface \$ 19 Million
- b. F7 Vein doubled\* in length to SSE \$ 75 Million
  - \*Vein width expanding to SE
  - \*Vein continuity open to SE
- c. "Value" / Drilling Costs
  - a. above: 380 / 1
  - b. above: 1,500 / 1

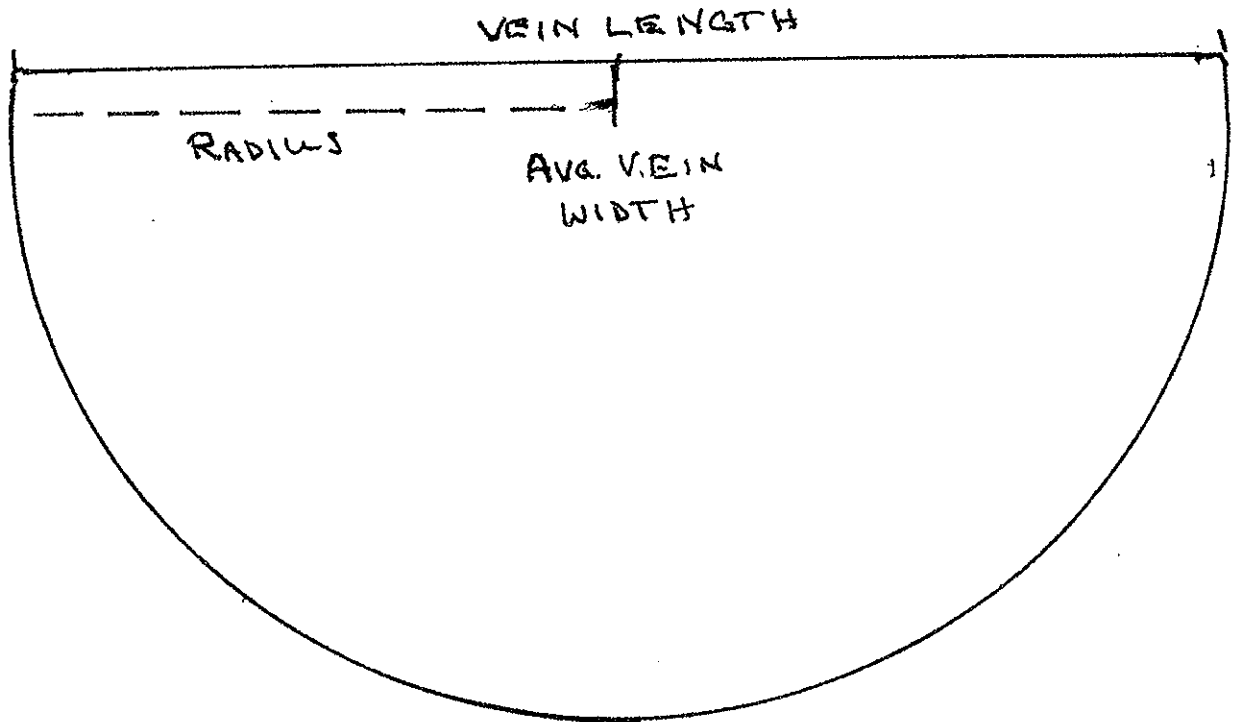
#### VIII. References

Henderson, Fred, 2006; "A Brief Mineral Resource Evaluation. McAlpine Ranch, Huerfano County, Colorado", of 6 October 2005.

Lovering, T. G., 1972; "Jasperoid in the United States – Its Characteristics, Origin and Economic Significance", USGS Professional Paper 710

USGS, 2001; Mosca Pass 7.5' Quadrangle

**HERBERT HOOVER'S HALF MOON CALCULATION  
FOR QUICK VEIN VALUE**



Two Cases: A. F7 Vein as exposed; B Vein length doubled as Open to SE

Assumptions: Specific Gravity (Sp.G.) for ore is 3.00  
Value of ore is minimal \$100 / metric tonne (= 0.2 oz gold)

Herbert Hoover Half Moon Calculation in meters is the area (half circle beneath surface vein length) with the radius of half the vein width squared X pi divided by 2 (for half circle) X the average vein width = the volume X Sp.G. of ore = metric tonnes X Value of ore in \$ / metric tonne = Quick Value of Vein.

Calculation:	Case A.	Case B.
Radius	100 m	200m
$\frac{\pi (r^2)}{2}$	1.571 x 10,000 m <sup>2</sup>	6.284 x 10,000 m <sup>2</sup>
Avg. Width	4 m	4 m
Volume	6.284 x 10,000 m <sup>3</sup>	25.136 x 10,000 m <sup>3</sup>
Tons (V.xSp.G)	188,520 tonnes	754,408 tonnes
(Value) (Tx\$100/T)	\$18.852 Million	\$ 75,441 Million