DMA Form 1

DEFENSE MINERALS ADMINISTRATION
Control Slip

CONTROLLED DOCUMENT

DMA Docket No. 3975

DO NOT DETACH THIS SLIP

Action on this document is recorded and controlled in Reports and Records Branch. Any movement of this document between divisions or offices of DMA or movement outside DMA must be reported to the Reports and Records Branch. Actions taken that affect status of the case must also be reported.

This document has been recorded as

Exploration Assistance

Any action taken to change the type of request for assistance must be promptly reported to the Reports and Records Branch. Use DMA Form 2 for submitting these reports.

1 cy B Mines; cy 700

Routing Slip

To:	700	Date	9/13/55
To:	Oper. Com.	Date	10/12/55
To:	Oper. Com	Date	1-27-56
To:	F.C. Johnson	Date	1-30-56
To:		Date	
To:		Date	
To:		Date	
To:		Date	
To:		Date	
To:		Date	
To:		Date	
To:		Date	
To:		Date	
To:		Date	
To:		Date	

DO NOT DETACH

CONTROLLED DOCUMENT

700

FILE COPY
Surname:
Ching
Clifton
Kiilsgaard
Jeffrey
Johnson

UNITED STATES
DEPARTMENT OF THE INTERIOR
DEFENSE MINERALS EXPLORATION ADMINISTRATION
WASHINGTON 25, D. C.

Mr. Joseph Page Leavitt
1339 South 3rd East
Salt Lake City, Utah

JAN 30 1956

Re: Docket No. DMEA-3975
(Uranium and Copper)
Joseph Page Leavitt, et al.
Windy Jim Claims
Mohave County, Arizona

Dear Mr. Leavitt:

Your application for aid in an exploration project and other information available to us in Washington concerning the above-named property have been reviewed.

Projects approved by the Defense Minerals Exploration Administration must, in its judgment, show definite promise of yielding materials of acceptable grade in quantities that will significantly improve the mineral supply position for the National Defense Program.

Careful study of all our information, although noting a small amount of uranium and copper mineralization on your property, indicates to us that the probability of disclosing minable ore reserves is not sufficiently promising to justify Government participation. We regret to advise you that, under these circumstances, your application for exploration assistance is denied.

We wish to thank you for your interest in the Defense Minerals Program and for bringing your property to our attention.

Sincerely yours,

C. O. Mitchell

Administrator

MChing/izm 12-27-56
cc to: Docket
Code 700
Mr. Ching
Admr.'s Reading File
Operating Committee
DMEA Field Team, Region III (2)
Messrs. JECrawford, Rm. 3641
THKiilsgaard, Rm. 5224
JOHosted, Rm. 3210, GSA

B.C.G.

Docket Copy
700

Ching
Ellis

January 27, 1956

Summary of Proposed Project

Object: Denial of application for an exploration project.

Docket No.: DMEA-3975

Commodity: Uranium and Copper

Applicant: Joseph Page Leavitt, et al., a partnership
1339 South 3rd East
Salt Lake City, Utah

Property: Windy Jim Claims Nos. 1, 2 and 3. Unpatented lode claims situated in an unsurveyed area, apparently lying in Sec. 6 or 7, T. 41 N., R. 9 W., G. & S.R.B. & M., Mohave County, Arizona. Applicant is the owner.

Date of Application: September 3, 1955

Amount of Application: $43,919.53

Work Proposed: (As clarified by Field Team)

Explore the mineralized area by 600 feet of drifting, 80 feet of inclined raising, and two crosscuts totaling 350 feet. Total 1,030 feet costing $43,919.53.

Field Team Report: Transmitted January 5, 1956;
M. M. Gilkey, USBM & R. W. Osterstock, USGS:

The property lies on the east slope of a basalt-capped hill and is underlain by the Triassic Moenkopi formation and the Permain Kaibab limestone. Uranium-copper mineralization was exposed in a bulldozer cut made in an area of semi-consolidated slide material of the Moenkopi formation. The mineralization is limited to scattered, low-grade float containing malachite and carnotite-type minerals; no mineralization was found in place. Since the float is not of commercial grade and the site of the proposed underground work is below the source of the float it is recommended that the application be denied.

The Applicant reported a sample assaying 8.1% copper and 0.39% U_3O_8, but inspection and radiometric testing of a selected pile of float indicated a much lower average grade. No abnormally high radioactivity was noted in a traverse across the claim area. The relatively low intensity of the observed mineralization is such that no significant amount of copper-uranium ore is believed to exist in the area.

Commodity Group Comments:

Geological Survey - N. E. Nelson - January 16, 1956:

Concurs with the recommendation of denial. Since only signs of weak mineralization have been shown, and they are not in place, no suitable objective for underground work is offered.

Bureau of Mines - James Paone - January 24, 1956:

Discussed the Report of Examination with the AEC representative. Concurs in the Field Team's recommendation of denial.

Rare and Miscellaneous Metals Division - Michael Ching - January 20, 1956:

The application was very poorly presented and the indications are that the Applicant is not fully qualified to carry on an exploration project.

Work already completed consists of a 35-foot adit and a bulldozer cut 150 feet long just below the adit. No mineralized rock in place was found in the adit and the only mineralization found was low-grade float in the bulldozer cut. The proposed underground drifting and crosscutting would be 75 feet below the old adit and, therefore, in a horizon which has given no indication of mineralization whatever.

Conclusions and Recommendations:

The proposed work would be pure prospecting and the chances of making a significant discovery are poor. It is recommended that the application be denied.

Ernest Wm. Ellis

Ernest Wm. Ellis, Chief
Rare and Miscellaneous
Metals Division

1-25-56

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF MINES
WASHINGTON 25, D. C.

RECEIVED
JAN 25 1956

January 24, 1956

Memorandum

To: Ernest William Ellis, DMEA Member
Uranium Commodity Committee, Room 4445

From: James Paone, Bureau of Mines Alternate Member
Uranium Commodity Committee

Subject: Report of Examination, DMEA Docket 3975, Joseph Page Leavitt and Partners, Windy Jim claims, Mohave County, Arizona.

I have reviewed the report of examination of DMEA Docket 3975, dated January 5, and received in this office on January 24, 1956. I have also discussed it with Joseph O. Hosted, Washington representative of the Atomic Energy Commission.

The applicant requested DMEA assistance in exploring for uranium by drifting, raising, and crosscutting on the Windy Jim claims located in Mohave County, Arizona. The estimated total cost of the project is $43,919.53.

An examination of the subject claims was made by DMEA personnel on October 12, 1955. The examining team found scattered float containing small amounts of copper and uranium mineralization in a slide or slumped area on the Windy Jim claims but could not find mineralization of this type in place and consequently the field team recommends denial of the application for DMEA assistance.

We concur in the recommendation of the field team that the application be denied.

The report is being forwarded to the Chief, Division of Minerals, in accordance with the routing slip attached thereto.

James Paone

James Paone

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF MINES
WASHINGTON 25, D. C.

RECEIVED
JAN 25 1956

January 24, 1956

Memorandum

To: Ernest William Ellis, DMEA Member
Uranium Commodity Committee, Room 4445

From: James Paone, Bureau of Mines Alternate Member
Uranium Commodity Committee

Subject: Report of Examination, DMEA Docket 3975, Joseph Page Leavitt and Partners, Windy Jim claims, Mohave County, Arizona.

I have reviewed the report of examination of DMEA Docket 3975, dated January 5, and received in this office on January 24, 1956. I have also discussed it with Joseph O. Hosted, Washington representative of the Atomic Energy Commission.

The applicant requested DMEA assistance in exploring for uranium by drifting, raising, and crosscutting on the Windy Jim claims located in Mohave County, Arizona. The estimated total cost of the project is $43,919.53.

An examination of the subject claims was made by DMEA personnel on October 12, 1955. The examining team found scattered float containing small amounts of copper and uranium mineralization in a slide or slumped area on the Windy Jim claims but could not find mineralization of this type in place and consequently the field team recommends denial of the application for DMEA assistance.

We concur in the recommendation of the field team that the application be denied.

The report is being forwarded to the Chief, Division of Minerals, in accordance with the routing slip attached thereto.

James Paone

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF MINES
WASHINGTON 25, D. C.

RECEIVED
JAN 25 1956

January 24, 1956

Memorandum

To: Ernest William Ellis, DMEA Member
Uranium Commodity Committee, Room 4445

From: James Paone, Bureau of Mines Alternate Member
Uranium Commodity Committee

Subject: Report of Examination, DMEA Docket 3975, Joseph Page Leavitt and Partners, Windy Jim claims, Mohave County, Arizona.

I have reviewed the report of examination of DMEA Docket 3975, dated January 5, and received in this office on January 24, 1956. I have also discussed it with Joseph O. Hosted, Washington representative of the Atomic Energy Commission.

The applicant requested DMEA assistance in exploring for uranium by drifting, raising, and crosscutting on the Windy Jim claims located in Mohave County, Arizona. The estimated total cost of the project is $43,919.53.

An examination of the subject claims was made by DMEA personnel on October 12, 1955. The examining team found scattered float containing small amounts of copper and uranium mineralization in a slide or slumped area on the Windy Jim claims but could not find mineralization of this type in place and consequently the field team recommends denial of the application for DMEA assistance.

We concur in the recommendation of the field team that the application be denied.

The report is being forwarded to the Chief, Division of Minerals, in accordance with the routing slip attached thereto.

James Paone

1-17-56

IN REPLY REFER TO:

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY
WASHINGTON 25, D. C.

RECEIVED
JAN 17 1956

January 16, 1956

Re: DMEA 3975
J. P. Leavitt and Partners
Windy Jim claims
Mohave Co., Arizona
$43,919.53 - Uranium-Copper

Memorandum

To: E. W. Ellis, Defense Minerals Exploration Administration

From: N. E. Nelson, U. S. Geological Survey

Subject: Review of Field Team report.

The applicant requested assistance in prospecting, by drifting, raising and crosscutting, for the source of radioactive float. The work was estimated to cost $43,919.53, and, as planned, to consist of:--

Drifting	600 feet
Raising	80 "
Crosscutting	350 "
	1,030 feet

The work, which would be below the places where the scarce and low-grade float is found and probably below the source of the float, appears to have no definite target other than the probing of beds which might hold a "mother lode."

As disclosed in the bulldozer cut, loose rock fragments showing copper and uranium stains are the showings on which the application is based. A specimen of the material is reported by the applicant to have assayed 8.1% copper and 0.39% U_3O_8, but no such material was seen by the examiners, though it is conceded some ore grade material could be picked from the broken rock exposed in the bulldozer cut.

Because only signs of weak mineralization have been shown, and they are not in place, no suitable objective of underground work is offered, and the examiners and Field Team recommend that the application be denied.

I concur with the recommendation.

N. E. Nelson

N. E. Nelson

IN REPLY REFER TO:

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY
WASHINGTON 25, D. C.

RECEIVED
JAN 17 1956

January 16, 1956

Re: DMEA 3975
J. P. Leavitt and Partners
Windy Jim claims
Mohave Co., Arizona
$43,919.53 - Uranium-Copper

Memorandum

To: E. W. Ellis, Defense Minerals Exploration Administration

From: N. E. Nelson, U. S. Geological Survey

Subject: Review of Field Team report.

The applicant requested assistance in prospecting, by drifting, raising and crosscutting, for the source of radioactive float. The work was estimated to cost $43,919.53, and, as planned, to consist of:--

Drifting	600 feet
Raising	80 "
Crosscutting	350 "
	1,030 feet

The work, which would be below the places where the source and low-grade float is found and probably below the source of the float, appears to have no definite target other than the probing of beds which might hold a "mother lode."

As disclosed in the bulldozer cut, loose rock fragments showing copper and uranium stains are the showings on which the application is based. A specimen of the material is reported by the applicant to have assayed 8.1% copper and 0.39% U_3O_8, but no such material was seen by the examiners, though it is conceded some ore grade material could be picked from the broken rock exposed in the bulldozer cut.

Because only signs of weak mineralization have been shown, and they are not in place, no suitable objective of underground work is offered, and the examiners and Field Team recommend that the application be denied.

I concur with the recommendation. N. E. Nelson

NENelson:iml
G-1/16/56

N. E. Nelson

cc: Director's reading, 4212
Branch reading, 4212
DMEA (3)
Docket file
J. G. Hosted, 3210; J. E. Crawford, 3641

1-17-56 dgm

UNITED STATES
DEPARTMENT OF THE INTERIOR
DEFENSE MINERALS EXPLORATION ADMINISTRATION
WASHINGTON 25, D. C.

RECEIVED
JAN 12 1956

January 5, 1956

224 New Customhouse
Denver 2, Colorado

Memorandum

To: Secretary to the Operating Committee, DMEA

From: Field Team, Region III

Subject: Report of Examination, DMEA Docket 3975 (Uranium-Copper), Joseph Page Leavitt and Partners, Windy Jim claims, Mohave County, Arizona

Enclosed are the original and three copies of the Report of Examination on the subject application.

The field examiners concur that mineralization in the area is weak and that no logical program at this time may be planned to explore the area. They recommend that the application be denied, and we concur in this recommendation.

DMEA Field Team, Region III

W. M. Traver

E. N. Harshman

Enclosures

Reviewed by
DMEA OPERATING COMMITTEE
1-16-56
(date)

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF MINES

1600 EAST FIRST SOUTH STREET
SALT LAKE CITY 12, UTAH

DMEA
Date Rec'd.
DEC 1955
BUREAU OF MINES
Denver, Colorado

December 28, 1955

RECEIVED
JAN 12 1956

Memorandum

To: W. M. Traver, Executive Officer, DMEA Field Team, Region III

From: Stephen R. Wilson

TRANSMITTED
JAN 5 1956

Subject: Docket No. DMEA-3975 (Uranium-copper), Joseph Page Leavitt and Partners, Mohave County, Arizona

Enclosed are the original and 10 copies of an engineering report covering examination of the uranium property held by Joseph Page Leavitt and Partners, Mohave County, Arizona. Also included are copies of a separate section, Summary, Conclusions and Recommendations, and a copy of the brochure. The examination was made by M. M. Gilkey and R. W. Osterstock of the Geological Survey.

The applicant has proposed a program of drifting, raising and crosscutting to explore uranium-copper occurrences on the Windy Jim claims. The estimated cost of the project is $43,919.53. Rocks prominent in the area consist of the Permian Kaibab limestone and the Triassic Moenkopi formation. Mineralization is exposed most prominently in a bulldozer cut in the vicinity of a 30-foot adit. Mineralization appears to be confined to a slumped area of sandstone and siltstone in the Moenkopi formation. It is believed the mineralization is float, inasmuch as no mineralization was noted in place. The float does not approach commercial grade, and the site of the proposed exploratory work is below the source of the float. The examining engineer recommends that the requested lease be denied. I concur in this recommendation.

The Windy Jim property has not been examined by representatives of the Atomic Energy Commission. The property was discussed with members of the Salt Lake office of the Atomic Energy Commission, but no additional information was obtained.

Stephen R Wilson
Stephen R. Wilson

Enclosure

cc: J. F. Shaw
J. B. Clemmer

Reviewed by
DMEA OPERATING COMMITTEE
1-16-56
(date)

TRANSMITTED
JAN 1956
RECEIVED
JAN 12 1956
DMEA
Date Rec'd.
DEC 1955
BUREAU OF MINES
Denver, Colorado

SUMMARY, CONCLUSIONS AND RECOMMENDATIONS

By R. W. Osterstock and M. M. Gilkey

Joseph Page Leavitt and partners have applied for DMEA assistance in exploring the Windy Jim uranium-copper claims, Mohave County, Arizona. Proposals included in the application consist of approximately 1,030 feet of drifting, crosscutting and raising, at an estimated cost of $43,919.53. The property was examined by DMEA personnel during October 1955.

The Windy Jim claims lie in an area of gently tilted Permian Kaibab limestone and the Triassic Moenkopi formation. Uranium-copper mineralization has been exposed in a bulldozer cut, and appears to be in an area of slumping or movement of beds by landslide. Mineralization is confined to a coarse, sandy grit and pebble conglomerate facies of the Moenkopi formation. This unit was not noted in place on the Windy Jim claims. Mineralization in the area of the bulldozer cut and a short adit near the cut is considered float. The float is not of commercial grade, and the site of the exploration as proposed by the applicant is below the source of the float.

The examining engineer and geologist recommend that the request for DMEA assistance on the Windy Jim claims be denied. Mineralization in the area is weak and no logical program may be planned to explore the small area apparently confined to float at and near the surface.

Reviewed by
DMEA OPERATING COMMITTEE
1-16-56
(date)

RECEIVED
JAN 12 1956

TRANSMITTED
JAN 5 1956

JOSEPH PAGE LEAVITT AND PARTNERS
WINDY JIM CLAIMS
MOHAVE COUNTY, ARIZONA
DMEA-3975
Uranium and Copper

Engineering Report

By M. M. Gilkey
Mining Engineer
Bureau of Mines

Reviewed by
DMEA OPERATING COMMITTEE
1-16-56
(date)

JOSEPH PAGE LEAVITT AND PARTNERS
WINDY JIM CLAIMS
MOHAVE COUNTY, ARIZONA

CONTENTS

	Page
Engineering report	
Summary	2
Introduction	2
Location, topography and climate	3
Ownership and extent	4
History, production and ore reserves	4
Description of the deposits	4
Proposed exploration	6
Conclusions and recommendations	7

ILLUSTRATIONS

Fig. 1 Location map, J. P. Leavitt, Windy Jim claims, Mohave County, Arizona

Fig. 2 Geologic sketch map of Windy Jim claims, Nos. 1, 2 and 3

SUMMARY

J. P. Leavitt and partners submitted an application, dated September 3, 1955, for DMEA assistance on copper-uranium property in Mohave County, Arizona. The nearest town and source of supplies is St. George, Utah, 21 miles to the northwest. The property, consisting of three unpatented lode claims, was examined by DMEA personnel October 12, 1955.

Copper-stained float was first found on the claims in 1914. Exploratory work completed to date consists of a 30-foot adit driven in 1914, and a 150-foot bulldozer cut completed in 1955. Examination of the property reveals that known mineralization is limited to scattered, low-grade float containing malachite and carnotite-type uranium mineralization. The float is found at and near the surface, in a slide or slumped area of sandstone and siltstone of the Moenkopi formation.

The applicant proposes a program consisting of an estimated 1,030 feet of drifting, raising and crosscutting, at a cost of $43,919.53, or $42.64 a foot. Inasmuch as the float is not of commercial grade, and the site of the proposed work is below the source of the float, it is recommended that the request for Government aid be denied.

INTRODUCTION

Joseph Page Leavitt and partners submitted an application, dated September 3, 1955, for Government aid in an exploratory project on the Windy Jim uranium-copper claims in Mohave County, Arizona. Estimated

total cost of the project is $43,919.53. The property was examined October 12, 1955, by R. W. Osterstock of the Geological Survey and M. M. Gilkey of the Bureau of Mines. Mr. Joseph Page Leavitt accompanied the examiners.

LOCATION, TOPOGRAPHY AND CLIMATE

The property is situated in Mohave County, Arizona, in an unsurveyed area near the Utah State line (Fig. 1). By projection, it appears that the property would lie in Sec. 6 or 7, T. 41 N., R. 9 W., Gila and Salt River Base and Meridian. From St. George, Utah (population 4,545), the nearest town and trading center of the area, the distance to the property is approximately 21 miles, in a southeasterly direction.

From the center of St. George, an oiled highway leads south, across the Santa Clara River bridge, to a junction at a distance of 3 miles. The graveled road to the left leads to the property. From the oiled highway the applicant's claims are reached by keeping to the right at all road junctions. The last few miles of the road are not passable by passenger car.

The mineralized area lies on the steep, east slope of a basalt-capped mesa which rises to an altitude of 4,000 feet. The mesa forms the west side of a 1000-foot-deep canyon.

Temperatures in the area are high during the summer. The short winters are mild. Vegetation is sparse and consists principally of greasewood. Water must be hauled from the settled area in the vicinity of St. George.

OWNERSHIP AND EXTENT

Land involved in the proposed project consists of three unpatented lode claims, the Windy Jim Nos. 1, 2 and 3. The claims are recorded at the Mohave county seat, at Kingman, Arizona. Book and page numbers are listed below.

Claim	Book	Page
Windy Jim No. 1	4-H	320
" " No. 2	4-Q	167
" " No. 3	4-Q	166

The claims are owned by the applicant, Joseph Page Leavitt and partners.

HISTORY, PRODUCTION AND ORE RESERVES

The applicant states that copper-stained float was discovered in the proposed project area during 1914. A 30-foot adit, reportedly driven during that year, failed to find mineralized rock in place. No further work was done until 1955 when lessees constructed an access road to the property, and bulldozed a prospect cut about 150 feet long just below the adit. No ore was found in place in the bulldozer cut. A few pieces of the copper-stained float are piled near the adit portal.

There are no known ore reserves on the property.

DESCRIPTION OF THE DEPOSITS

Two gently tilted, sedimentary formations, the grey, sandy Permian Kaibab limestone, and the Triassic Moenkopi formation are exposed in the vicinity of the Windy Jim claims. As shown on figure 2, the Kaibab is exposed in the east-west fault scarp south of the claims, and is bared by erosion northeast of the property, at the bottom and on the

east side of the canyon. The Moenkopi formation, which unconformably overlies the Kaibab limestone, is predominantly soft, brown, purple and reddish shaly sandstone and siltstone. To the east, the Moenkopi forms the top of a mesa. In the claim area, on the west side of the canyon, this formation is largely covered by Quaternary alluvium. Brownish basalt caps the mesa west of the claims and the mesa south of the fault scarp.

Semiconsolidated material exposed in the bulldozer trench (see insert, fig. 2) on the Windy Jim No. 1 claim consists principally of reddish sandstone and siltstone. Lack of depositional order indicates slumping or movement of the beds by landslide.

Mineralized float found in the bulldozer cut consists of a coarse, sandy grit containing malachite and small amounts of carnotite-type uranium mineralization. Some of the float came from that part of the cut which removed the original portal of the adit. No mineralized rock was observed in the adit beyond the portal. Rock at the face of the adit is of the same character as that near the portal and in the bulldozer cut - jumbled, reddish sandstone and siltstone. Apparently the mineralized float is found only near the surface. The applicant reports an assay of 8.1 percent copper and 0.39 percent U_3O_8. Inspection and radiometric testing of the small pile of float collected in the bulldozer cut indicates a much lower average grade than the above assay. No abnormally high radioactivity was noted in a traverse across the claim area.

PROPOSED EXPLORATION

Estimated cost of the proposed exploratory project is $43,919.53. Time to complete the work is estimated by the applicant at 18 months.

The description of the work in the application is not clear but a discussion of the work with the applicant revealed his intention to explore the mineralized area by drifting, crosscutting and raising as described below:

1. From a point 75 feet vertically below and 300 feet southeast of the portal of the present 30-foot adit, drift 600 feet northwest (i.e. directly under the portal, plus 300 feet farther to the northwest) ----------	600 feet
2. From the point 75 feet directly under the adit portal, raise approximately 80 feet from the 600-foot drift, on a steep incline, and connect with the adit at a point near the face ----------	80 feet
3. From the same point 75 feet directly under the adit portal (300 feet from the portal of the 600-foot drift), crosscut easterly to the surface, an estimated distance of 150 feet ----------	150 feet
4. From a point 450 feet from the portal of the 600-foot drift, drive a second crosscut easterly to the surface, an estimated distance of 200 feet ----------	200 feet
Total estimated drifting, crosscutting and raising ---	1,030 feet

Unit cost, computed on the basis of a total cost of $43,919.53 and 1,030 feet of drifting crosscutting and raising, is $42.64 a foot.

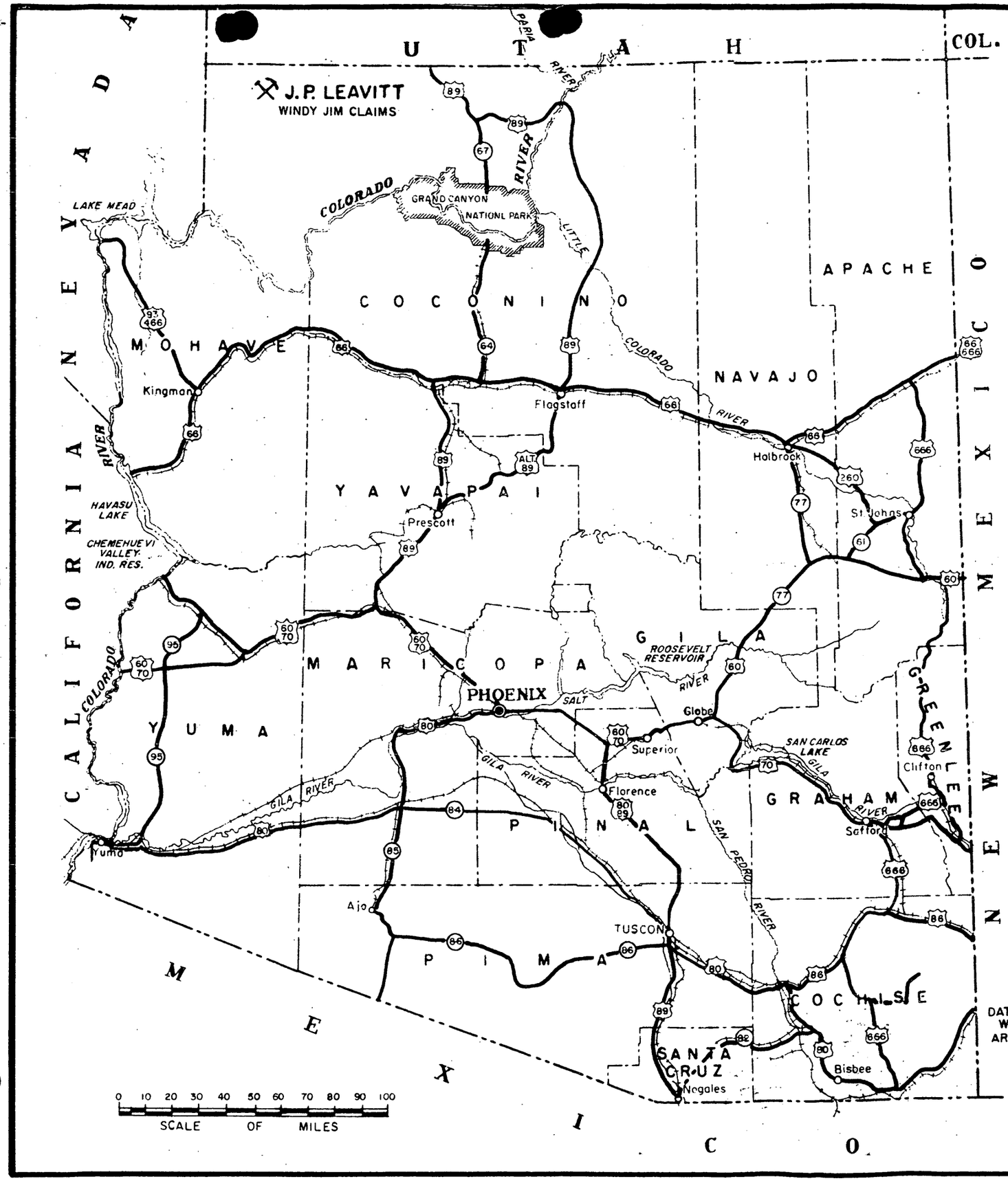
Ground conditions are fairly good; timber would be required for the raise and in some sections of the drift and crosscuts. It is assumed that inside-timber dimensions would be 4' x 6' for the raise, and 5½' x 7½' for the drift and crosscuts. The prevailing wage for

miners in the area is about $15 a day. With a crew of three men, and with adequate equipment (including a mucking machine), advance on a one-shift basis should average 3 feet a day, and total time to complete the project should be about 15 months. Under prevailing conditions, as to cost of labor, nature of the ground, and accessibility, the work could probably be done for $35 a foot.

CONCLUSIONS AND RECOMMENDATIONS

Scattered float containing small amounts of copper and uranium mineralization is found in a slide or slumped area on the Windy Jim claims. No mineralization of this type has been found in place.

It is recommended that the requested loan be denied, inasmuch as the float does not approach commercial grade and the site of the proposed exploratory work is below the source of the float.



NOTE

DATA TRACED FROM HAMMOND'S LIBRARY WORLD ATLAS. ROADS PLOTTED FROM ARIZONA TOURING MAP OF STANDARD OIL COMPANY OF CALIFORNIA, 1950.

U. S. DEPARTMENT OF THE INTERIOR
BUREAU OF MINES

Fig. 1 DMEA Docket No. 3975
Location Map
STATE OF ARIZONA
J. P. LEAVITT, WINDY JIM CLAIMS
MOHAVE COUNTY

ENGINEER: *Millard M. GILKEY*	DATE: DEC. 14, 1955
DRAWN: DEC., 1955; A.P.T.S.	1900-366-F
CHECKED:	

RECEIVED
JAN 12 1956

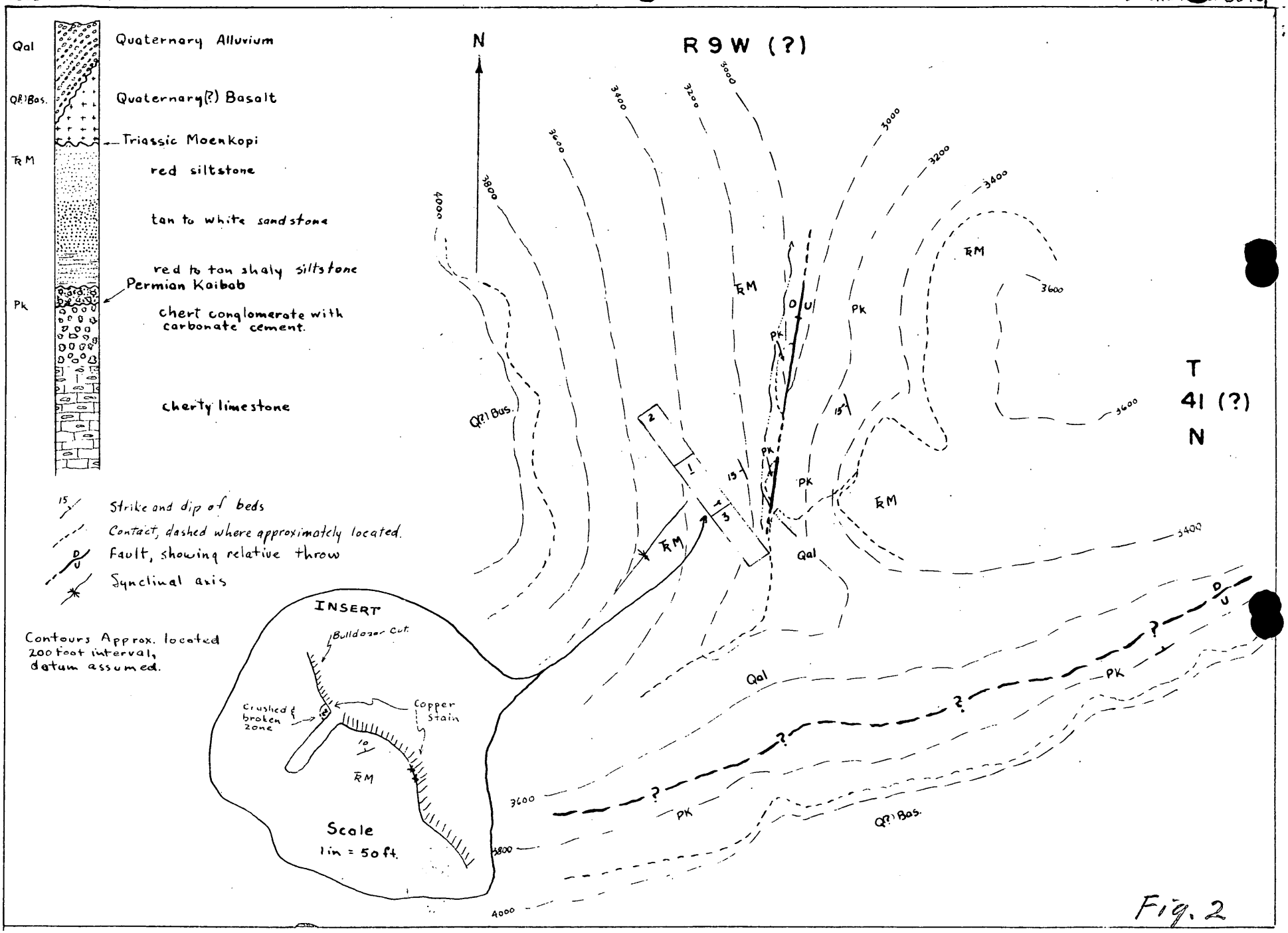


FIG. 2 GEOLOGIC SKETCH MAP OF WINDY JIM CLAIMS, NOS. 1, 2, & 3
MOJAVE COUNTY, ARIZONA

1900 - 367 - E

RECEIVED
JAN 12 1956

Room 208 - 222 So. West Temple
Salt Lake City 1, Utah
November 29, 1955

Memorandum

TRANSMITTED
JAN 5 1956

To: E. H. Harshman, DMEA Field Team, Region III

From: R. W. Ostrotsch

Subject: DMEA Docket 3975 (Uranium) J.(oseph) P.(age) Leavitt and partners, Windy Jim Claims, Mohave County, Arizona.

Enclosed are eleven copies of a geologic report of examination on the subject property by R. W. Ostrotsch, U. S. Geological Survey.

J. P. Leavitt and partners requested government assistance for copper-uranium ores on their Windy Jim claims. The applicants proposed an exploration program consisting of underground work beneath an adit and bulldozer cut which exposed isolated blocks of mineralized material on the Windy Jim No. 1 claim. The program was estimated to cost $43,919.53.

Copper-uranium mineralization on the Windy Jim claims has been noted only in isolated fragments of a coarse facies of the Triassic Moenkopi formation now contained in semi-consolidated slope wash. With no mineralization yet noted in place it is not possible to postulate ore controls and consequently no target area for a planned exploration program can be delineated.

It is concluded that the apparently weak mineralization conditions did not provide for the deposition of significant amounts of copper-uranium ore in the area. It is therefore recommended that the subject application be denied.

R. W. Ostrotsch

RWO/rw
Enclosures

Reviewed by
DMEA OPERATING COMMITTEE

(date)

RECEIVED
JAN 12 1956

J. P. LEAVITT - WINDY JIM CLAIMS

MOHAVE COUNTY, ARIZONA

TRANSMITTED
JAN 5 1956

DMEA DOCKET 3975

Initial Geologic Report

By R. W. Osterstock
U. S. Geological Survey

Reviewed by
DMEA OPERATING COMMITTEE
1-16-56
(date)

RECEIVED
JAN 12 1956

CONTENTS

	Page
Summary	1
Introduction	2
Location and accessibility	2
History and production	3
Geology	3
Ore Deposits	5
Ore Reserves	6
Proposed Exploration	6
Conclusions and Recommendations	7

ILLUSTRATIONS

Fig. 1 — Index map of Arizona

2 — Geologic sketch map of Windy Jim claims

DMEA DOCKET 3975

SUMMARY

J. P. Leavitt and partners made application for DMEA assistance on September 3, 1955. The applicants' proposals involve underground exploration for copper-uranium ores on their Windy Jim claims in Mohave County, Arizona. The property was examined by DMEA personnel on October 12, 1955.

The Windy Jim claims lie on an east facing slope of a basalt capped mesa-like hill. The area is underlain by the Triassic Moenkopi formation and the Permian Kaibab limestone. Some minor faulting in the claim area may be related to the large Hurricane fault system which lies a few miles to the east. Copper mineralization is noted at two localities on the Windy Jim No. 1 claim; only one of these in a bulldozer trench below an old adit carried visible uranium minerals. All of the ore mineralization found to date has been in isolated fragments of a coarse grit and pebble conglomerate facies of the Moenkopi formation which are enclosed in semi-consolidated slope wash. No ore mineralization has yet been found in place.

No acceptable exploration program can be formulated in the light of present information. The relatively low intensity of the observed mineralization is such that no significant amount of copper-uranium ore is believed to exist in the area. It is recommended, therefore, that the application be denied.

INTRODUCTION

On September 3, 1955, J. P. Leavitt and partners applied for government assistance for uranium exploration on their Windy Jim claims, Nos. 1-3, Mohave County, Arizona.

At the request of the DMEA Region III Field Team an examination of the subject property was conducted by R. W. Osterstock (USGS) and M. M. Gilkey (USBM) on October 12, 1955. Mr. J. P. Leavitt accompanied the field examiners during the inspection.

The total cost of the exploration program as proposed by the applicant is $43,919.53.

Location and accessibility

The Windy Jim claims are probably situate in Section 6 or 7, T. 41 N., R. 9 W., unsurveyed, Gila and Salt River Base and Meridian, in Mohave County, Arizona. More specifically, the claims lie on the east slope of a 4,000 foot high plateau; the slope leads down to a sharply incised northerly draining canyon. Just south of the property a long east-west trending limestone cliff forms the head of the drainage basin which feeds the canyon.

The claims may be reached by travelling about 16 miles southeast of St. George, Utah on the "old Mt. Trumbull" road (Utah 64), this road is partially oiled and partially improved gravelled road. At this point a stock tank and drift fence mark the take off point to the claims. A right fork of unimproved dirt road rapidly degenerates to a jeep trail which continues in a westerly direction for 5 miles to the southern end of the Windy Jim No. 1 claim.

Any type of adverse weather would render the latter section of the access road almost immediately impassable.

History and production

The applicant reports that the Windy Jim claim area was originally staked approximately 35 years ago. Apparently the interest at that time was in copper. An adit, estimated to have been 40 feet in length, was driven on what is now the Windy Jim No. 1 claim. The early exploration efforts must have been discouraging inasmuch as the property lay idle until recently relocated by the applicants. At the present time the Windy Jim claims are held by right of location by the applicants.

Prior to the date of the DMEA field examination a leaser had conducted a moderate bulldozer stripping operation with which a 150 foot countoured trench was dug on the Windy Jim No. 1 claim. The northwestern-most part of the trench has removed approximately the first 10 feet of the old adit. To date the property has no recorded production for either uranium or copper.

GEOLOGY

The Windy Jim claims lie in an area of gently tilted Permian and Triassic sedimentary rocks capped by Quaternary basalt flows.

Two formations are exposed in the vicinity of the claims, the Permian Kaibab limestone and the unconformably overlying Triassic Moenkopi formation. Only the uppermost beds of the Kaibab are bared by erosion near the claims, however, a short distance to the east approximately 400 feet of this formation is intermittently exposed in the facing canyon wall. It is noteworthy that this predominantly sandy

limestone formation becomes increasingly cherty and dolomitic near its top. The Triassic Moenkopi formation overlying the Kaibab was deposited after a long erosion interval, however the strata are essentially parallel. The Moenkopi is characterized by soft, easily weathered reddish, brown and purple shaly sandstone and siltstone. The lowermost beds, generally referred to as the Timpoweap member, are described by H. E. Gregory (USGS Prof. Paper 220, Geology and Geography of the Zion Park Region, Utah and Arizona, p. 60, 1950) as yellow red and gray gypsiferous sandy shales and lenticular brown sandstone, mostly in hard thin sheets, some sandy limestones, massive and shaly, some minutely brecciated with angular black cherts. It is believed that the Timpoweap member has not received maximum deposition in the claim area as the more characteristic red shaly sandstones are almost immediately apparent above the Kaibab limestone.

The rocks exposed by the bulldozer trench on the Windy Jim No. 1 claim are predominantly red shaly siltstones and sandstones with lesser amounts of lenticular grit beds. None of the above mentioned rock types have any semblance of depositional order, nor may any of the beds be traced laterally for more than a few feet. It is suggested therefore that the material on the Windy Jim No. 1 claim may have been transported a short distance downslope by slumping or landslide thereby jumbling the beds. The mass is now semi-consolidated probably as a result of ground water action.

Capping the Moenkopi and Kaibab formations and holding up the plateau and mesa-like tops of the hills are brown weathering Quaternary(?) basalt flows. Large blocks of this rock have broken off and are noted frequently on the slopes below the rim.

Structurally, the claim area lies in a region of broad upwarps cut by extremely persistent north striking normal faults. The major structural feature in the region is the Hurricane fault which lies a few miles to the east of the Windy Jim claims. Locally, the sediments are cut by a small north striking normal fault, down on the west; this fault parallels the Hurricane fault and may be considered a related subordinate structure. A short distance to the south of the claims a long E-W limestone cliff apparently represents a fault scarp. Projection of the Kaibab limestone from the canyon east of the claim area indicates that this structure has elevated the section in the south block.

ORE DEPOSITS

Ore mineralization in the claim area is noted at only three localities, two in the bulldozer cut on the Windy Jim No. 1 claim and one very small exposure at the bottom of the canyon on the north striking fault zone, probably not in place.

All of the mineralized exposures are exemplified by green copper staining. Visible uranium minerals were noted only in loose rock fragments lying in the bulldozer cut near the mouth of the old adit. Both the copper, as malachite, and the uranium, probably as uranophane or carnotite, appear to be restricted to a coarse sandy grit and pebble conglomerate facies of the Moenkopi formation. This unit was not found

in place on the property. Isolated fragments of mineralized material are apparently encased in the partially cemented slope wash which blankets the claim area. One such specimen is reported by the applicant to have assayed 8.1 percent copper and 0.39 percent U_3O_8. No abnormally high amount of radio activity was noted in a scintillator traverse across the claim area.

As the ore mineral bearing fragments have not been observed in their original setting, no theorizing relative to the origin and locallizing controls is feasible.

ORE RESERVES

No ore reserves of any classification are estimated for the Windy Jim claims. It is possible that a very small amount of ore grade material, probably not exceeding a few hundred pounds, may be recovered from mineralized blocks and chunks exposed by the bulldozer trenching.

PROPOSED EXPLORATION

The applicant has proposed an exploration program costing $43,919.53. Although the work proposals in the application are not quite clear, discussion of the program with the applicant in the field revealed his plans to drop about 75 feet vertically below and to the southeast of the present adit and drive a 300 foot northwesterly crosscut to a point approximately below the old adit. The applicant then proposed raising to the old adit on a steep incline and from the main level driving two additional crosscuts out to the east until their headings holed through the face of the slope.

In view of the lack of target area as might be defined by projectable ore controls it appears that the applicants' exploration program is designed to test the ground further into the hill which may not have been subjected to slumping. The fact the ore bearing fragments thus far located are all vertically above the proposed work would tend to negate the effectiveness of such work. If additional work is to be done it should involve prospecting above the present dozer cut inasmuch as the fragments of mineralized material found have apparently been torn out of a vertically higher zone subjected to slumping.

CONCLUSIONS AND RECOMMENDATIONS

The copper-uranium ore mineralization on the Windy Jim claims is confined to a coarse sand and grit facies of the Moenkopi formation which has not been found in place. The frequency of distribution of the mineralized fragments in the semi-consolidated slope wash is such that no economically feasible mining operation can be conducted on this material. As the fragments have not been observed in their original setting no ore controls may be postulated which would aid in delineating a target area for an acceptable exploration program.

It is recommended that the application for government assistance be denied on the grounds that the area has probably been subjected to only very weak mineralizing solutions;and no acceptable exploration program can be offered in the light of the available information. It is doubtful that such an area contains sufficient copper-uranium mineralization to constitute a significant addition to the nation's resources.

The Windy Jim property has not been examined by representatives of the AEC and consequently they have nothing to offer by way of concurrence with this report.

U. S. DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY

DEFENSE MINERALS EXPLORATION ADMINISTRATION
DOCKET [redacted]

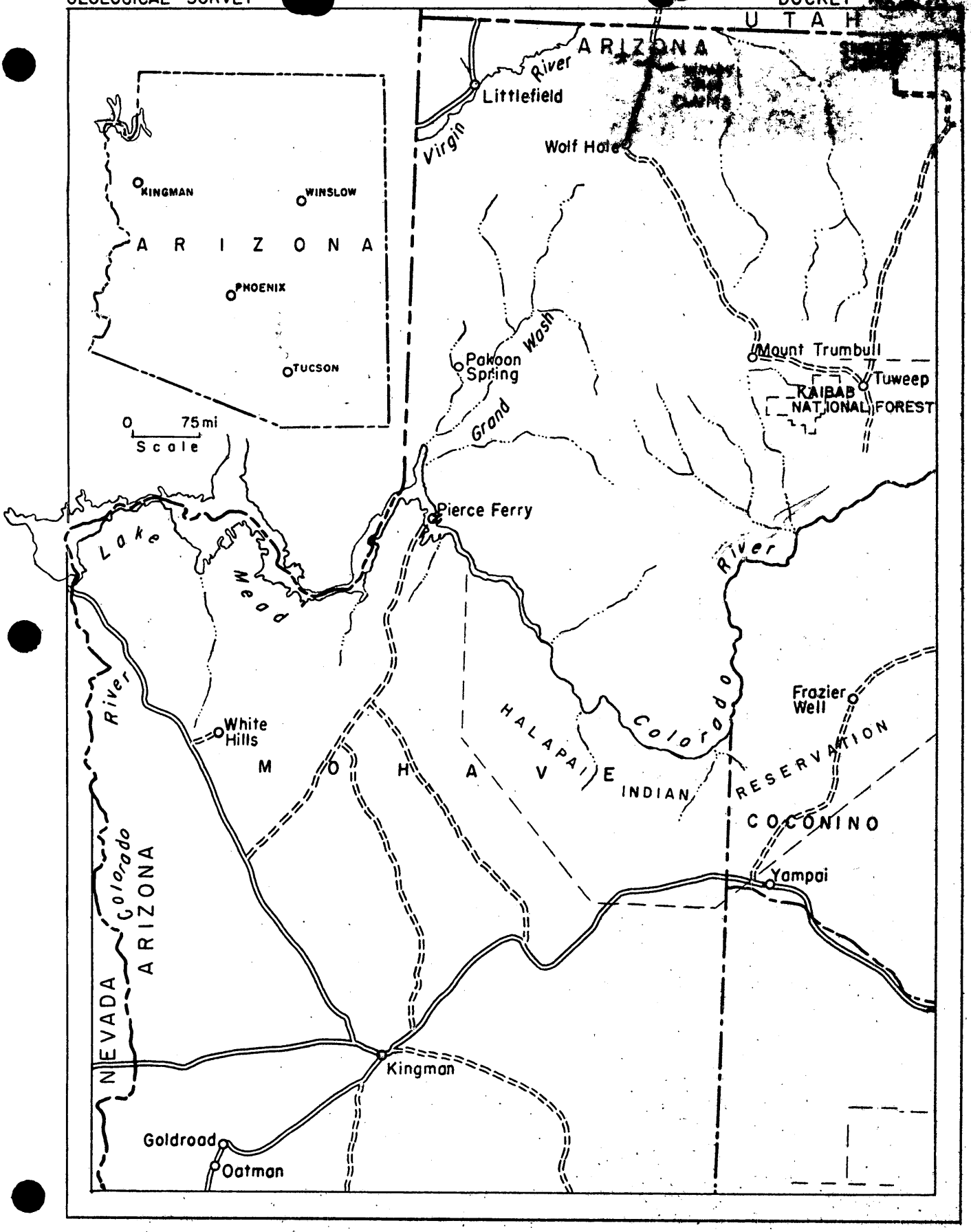


FIG. I

INDEX MAP OF ARIZONA

0 5 10 15 20 miles
Scale

RECEIVED
JAN 1 2 1956

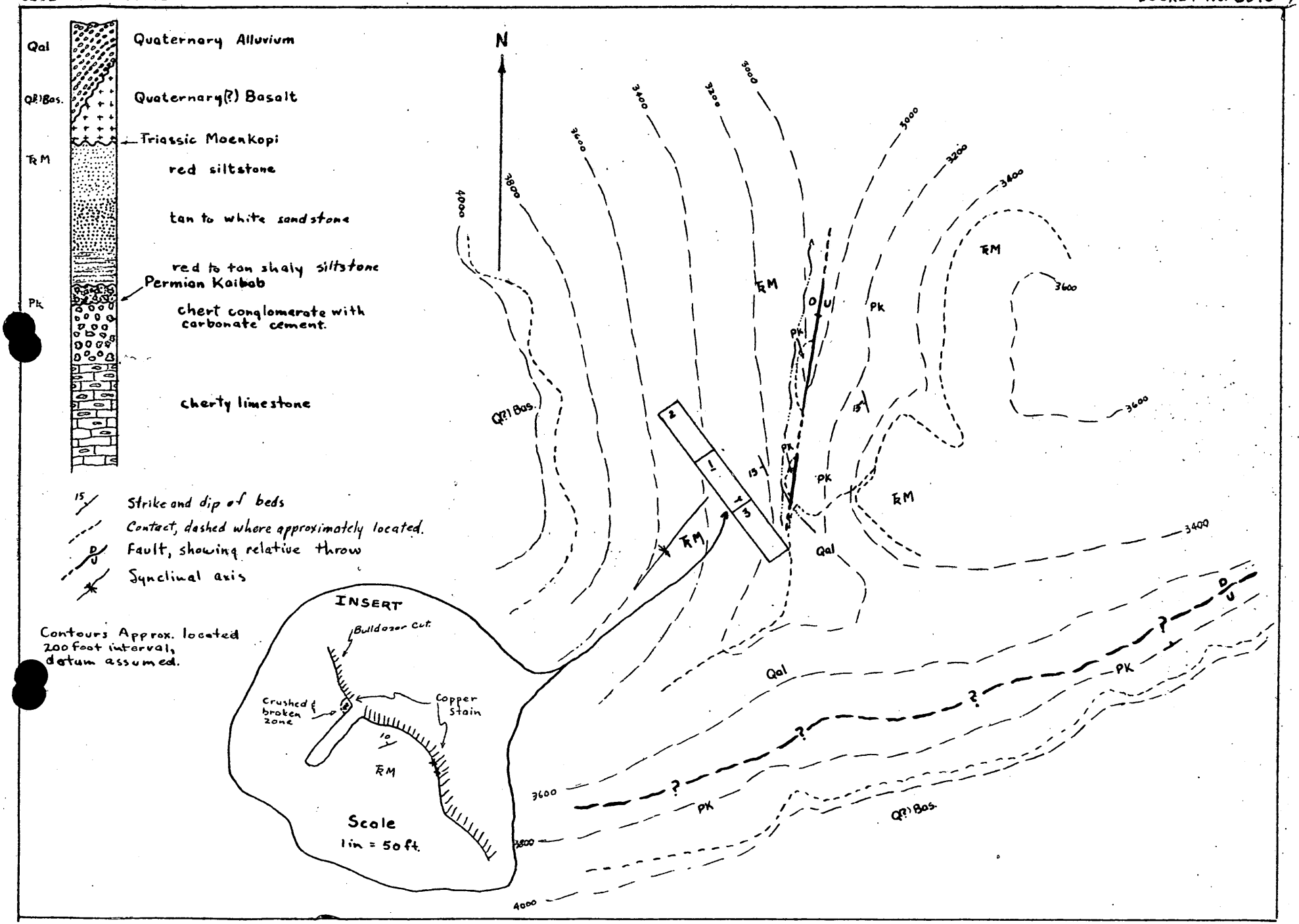


FIG. 2 GEOLOGIC SKETCH MAP OF WINDY JIM CLAIMS, NOS. 1, 2, & 3
MOJAVE COUNTY, ARIZONA

RECEIVED
JAN 1 3 .53

1-12-56 [illegible]

UNITED STATES
DEPARTMENT OF THE INTERIOR
DEFENSE MINERALS EXPLORATION ADMINISTRATION
WASHINGTON 25, D. C.

RECEIVED
JAN 12 1956

January 5, 1956

224 New Customhouse
Denver 2, Colorado

Memorandum

To: Secretary to the Operating Committee, DMEA

From: Field Team, Region III

Subject: Report of Examination, DMEA Docket 3975 (Uranium-Copper), Joseph Page Leavitt and Partners, Windy Jim claims, Mohave County, Arizona

Enclosed are the original and three copies of the Report of Examination on the subject application.

The field examiners concur that mineralization in the area is weak and that no logical program at this time may be planned to explore the area. They recommend that the application be denied, and we concur in this recommendation.

DMEA Field Team, Region III

W. M. Traver

W. M. Traver

E. N. Harshman

E. N. Harshman

Enclosures

Reviewed by
DMEA OPERATING COMMITTEE

1-16-56
(date)

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF MINES
1600 EAST FIRST SOUTH STREET
SALT LAKE CITY 12, UTAH

RECEIVED
JAN 12 1956

DMEA
Date Rec'd.
DEC 30 1955
BUREAU OF MINES
Denver, Colorado

December 28, 1955

Memorandum

To: W. M. Traver, Executive Officer, DMEA Field Team, Region III

From: Stephen R. Wilson

TRANSMITTED
JAN 5 1956

Subject: Docket No. DMEA-3975 (Uranium-copper), Joseph Page Leavitt and Partners, Mohave County, Arizona

Enclosed are the original and 10 copies of an engineering report covering examination of the uranium property held by Joseph Page Leavitt and Partners, Mohave County, Arizona. Also included are copies of a separate section, Summary, Conclusions and Recommendations, and a copy of the brochure. The examination was made by M. M. Gilkey and R. W. Outerstock of the Geological Survey.

The applicant has proposed a program of drifting, raising and crosscutting to explore uranium-copper occurrences on the Windy Jim claims. The estimated cost of the project is $43,919.53. Rocks prominent in the area consist of the Permian Kaibab limestone and the Triassic Moenkopi formation. Mineralization is exposed most prominently in a bulldozer cut in the vicinity of a 30-foot adit. Mineralization appears to be confined to a slumped area of sandstone and siltstone in the Moenkopi formation. It is believed the mineralization is float, inasmuch as no mineralization was noted in place. The float does not approach commercial grade, and the site of the proposed exploratory work is below the source of the float. The examining engineer recommends that the requested loan be denied. I concur in this recommendation.

The Windy Jim property has not been examined by representatives of the Atomic Energy Commission. The property was discussed with members of the Salt Lake office of the Atomic Energy Commission, but no additional information was obtained.

Stephen R. Wilson
Stephen R. Wilson

Enclosure

cc: J. F. Shaw
J. B. Clemmer

Reviewed by
DMEA OPERATING COMMITTEE
1-16-56
(date)

RECEIVED
JAN 12 1956

TRANSMITTED
JAN 5 1956

SUMMARY, CONCLUSIONS AND RECOMMENDATIONS

By R. W. Ostenstock and M. M. Gilley

Joseph Page Lentsch and partners have applied for DMEA assistance in exploring the Windy Jim uranium-copper claims, Mohave County, Arizona. Proposals included in the application consist of approximately 1,000 feet of drifting, crosscutting and raising, at an estimated cost of $43,989.33. The property was examined by DMEA personnel during October 1955.

The Windy Jim claims lie in an area of gently tilted Permian Kaibab limestone and the Triassic Moenkopi formation. Uranium-copper mineralization has been exposed in a bulldozer cut, and appears to be in an area of slumping or movement of beds by landslide. Mineralization is confined to a coarse, sandy grit and pebble conglomerate facies of the Moenkopi formation. This unit was not noted in place on the Windy Jim claims. Mineralization in the area of the bulldozer cut and a short adit near the cut is considered float. The float is not of commercial grade, and the site of the exploration as proposed by the applicant is below the source of the float.

The examining engineer and geologist recommend that the request for DMEA assistance on the Windy Jim claims be denied. Mineralization in the area is weak and no logical program may be planned to explore the small area apparently confined to float at and near the surface.

Reviewed by
DMEA OPERATING COMMITTEE

1-16-56
(date)

RECEIVED
JAN 12 1956

JOSEPH PAGE LEAVITT AND PARTNERS
WHERE JIM CLAIMS
MOHAVE COUNTY, ARIZONA
DMEA-3975
Uranium and Copper

TRANSMITTED
JAN 5 1956

Engineering Report

By M. M. Gilkey
Mining Engineer
Bureau of Mines

Reviewed by
DMEA OPERATING COMMITTEE
1-16-56
(date)

RECEIVED
JAN 18 1956

JOSEPH PAGE LEAVITT AND PARTNERS
WINDY JIM CLAIMS
MOHAVE COUNTY, ARIZONA

CONTENTS

	Page
Engineering report	
Summary	2
Introduction	2
Location, topography and climate	3
Ownership and extent	4
History, production and ore reserves	4
Description of the deposits	4
Proposed exploration	6
Conclusions and recommendations	7

ILLUSTRATIONS

Fig. 1 Location map, J. P. Leavitt, Windy Jim claims, Mohave County, Arizona

Fig. 2 Geologic sketch map of Windy Jim claims, Nos. 1, 2 and 3

RECEIVED
JAN 18 1956

SUMMARY

J. P. Leavitt and partners submitted an application, dated September 3, 1955, for DMEA assistance on copper-uranium property in Mohave County, Arizona. The nearest town and source of supplies is St. George, Utah, 21 miles to the northwest. The property, consisting of three unpatented lode claims, was examined by DMEA personnel October 12, 1955.

Copper-stained float was first found on the claims in 1914. Exploratory work completed to date consists of a 30-foot adit driven in 1914, and a 150-foot bulldozer cut completed in 1955. Examination of the property reveals that known mineralization is limited to scattered, low-grade float containing malachite and carnotite-type uranium mineralization. The float is found at and near the surface, in a slide or slumped area of sandstone and siltstone of the Moenkopi formation.

The applicant proposes a program consisting of an estimated 1,030 feet of drifting, raising and crosscutting, at a cost of $43,919.53, or $42.64 a foot. Inasmuch as the float is not of commercial grade, and the site of the proposed work is below the source of the float, it is recommended that the request for Government aid be denied.

INTRODUCTION

Joseph Page Leavitt and partners submitted an application, dated September 3, 1955, for Government aid in an exploratory project on the Windy Jim uranium-copper claims in Mohave County, Arizona. Estimated

total cost of the project is $43,919.53. The property was examined October 12, 1955, by R. W. Gaterstock of the Geological Survey and M. M. Gilkey of the Bureau of Mines. Mr. Joseph Page Leavitt accompanied the examiners.

LOCATION, TOPOGRAPHY AND CLIMATE

The property is situated in Mohave County, Arizona, in an unsurveyed area near the Utah State line (Fig. 1). By projection, it appears that the property would lie in Sec. 6 or 7, T. 41 N., R. 9 W., Gila and Salt River Base and Meridian. From St. George, Utah (population 4,545), the nearest town and trading center of the area, the distance to the property is approximately 21 miles, in a southeasterly direction.

From the center of St. George, an oiled highway leads south, across the Santa Clara River bridge, to a junction at a distance of 3 miles. The graveled road to the left leads to the property. From the oiled highway the applicant's claims are reached by keeping to the right at all road junctions. The last few miles of the road are not passable by passenger car.

The mineralized area lies on the steep, east slope of a basalt-capped mesa which rises to an altitude of 4,000 feet. The mesa forms the west side of a 1000-feet-deep canyon.

Temperatures in the area are high during the summer. The short winters are mild. Vegetation is sparse and consists principally of greasewood. Water must be hauled from the settled area in the vicinity of St. George.

OWNERSHIP AND EXTENT

Land involved in the proposed project consists of three unpatented lode claims, the Windy Jim Nos. 1, 2 and 3. The claims are recorded at the Mohave county seat, at Kingman, Arizona. Book and page numbers are listed below.

Claim	Book	Page
Windy Jim No. 1	4-M	320
" " No. 2	4-Q	167
" " No. 3	4-Q	166

The claims are owned by the applicant, Joseph Page Leavitt and partners.

HISTORY, PRODUCTION AND ORE RESERVES

The applicant states that copper-stained float was discovered in the proposed project area during 1914. A 30-foot adit, reportedly driven during that year, failed to find mineralized rock in place. No further work was done until 1955 when lessees constructed an access road to the property, and bulldozed a prospect cut about 150 feet long just below the adit. No ore was found in place in the bulldozer cut. A few pieces of the copper-stained float are piled near the adit portal.

There are no known ore reserves on the property.

DESCRIPTION OF THE DEPOSITS

Two gently tilted, sedimentary formations, the grey, sandy Permian Kaibab limestone, and the Triassic Moenkopi formation are exposed in the vicinity of the Windy Jim claims. As shown on figure 2, the Kaibab is exposed in the east-west fault scarp south of the claims, and is bared by erosion northeast of the property, at the bottom and on the

east side of the canyon. The Moenkopi formation, which unconformably overlies the Kaibab limestone, is predominantly soft, brown, purple and reddish shaly sandstone and siltstone. To the east, the Moenkopi forms the top of a mesa. In the claim area, on the west side of the canyon, this formation is largely covered by Quaternary alluvium. Brownish basalt caps the mesa west of the claims and the mesa south of the fault scarp.

Semiconsolidated material exposed in the bulldozer trench (see insert, fig. 2) on the Windy Jim No. 1 claim consists principally of reddish sandstone and siltstone. Lack of depositional order indicates slumping or movement of the beds by landslide.

Mineralized float found in the bulldozer cut consists of a coarse, sandy grit containing malachite and small amounts of carnotite-type uranium mineralization. Some of the float came from that part of the cut which removed the original portal of the adit. No mineralized rock was observed in the adit beyond the portal. Rock at the face of the adit is of the same character as that near the portal and in the bulldozer cut - jumbled, reddish sandstone and siltstone. Apparently the mineralized float is found only near the surface. The applicant reports an assay of 8.1 percent copper and 0.39 percent U_3O_8. Inspection and radiometric testing of the small pile of float collected in the bulldozer cut indicates a much lower average grade than the above assay. No abnormally high radioactivity was noted in a traverse across the claim area.

PROPOSED EXPLORATION

Estimated cost of the proposed exploratory project is $43,919.53. Time to complete the work is estimated by the applicant at 18 months.

The description of the work in the application is not clear but a discussion of the work with the applicant revealed his intention to explore the mineralized area by drifting, crosscutting and raising as described below:

1. From a point 75 feet vertically below and 300 feet southeast of the portal of the present 30-foot adit, drift 600 feet northwest (i.e. directly under the portal, plus 300 feet farther to the northwest) ———— 600 feet

2. From the point 75 feet directly under the adit portal, raise approximately 80 feet from the 600-foot drift, on a steep incline, and connect with the adit at a point near the face ———— 80 feet

3. From the same point 75 feet directly under the adit portal (300 feet from the portal of the 600-foot drift), crosscut easterly to the surface, an estimated distance of 150 feet ———— 150 feet

4. From a point 450 feet from the portal of the 600-foot drift, drive a second crosscut easterly to the surface, an estimated distance of 200 feet ———— 200 feet

Total estimated drifting, crosscutting and raising —— 1,030 feet

Unit cost, computed on the basis of a total cost of $43,919.53 and 1,030 feet of drifting crosscutting and raising, is $42.64 a foot.

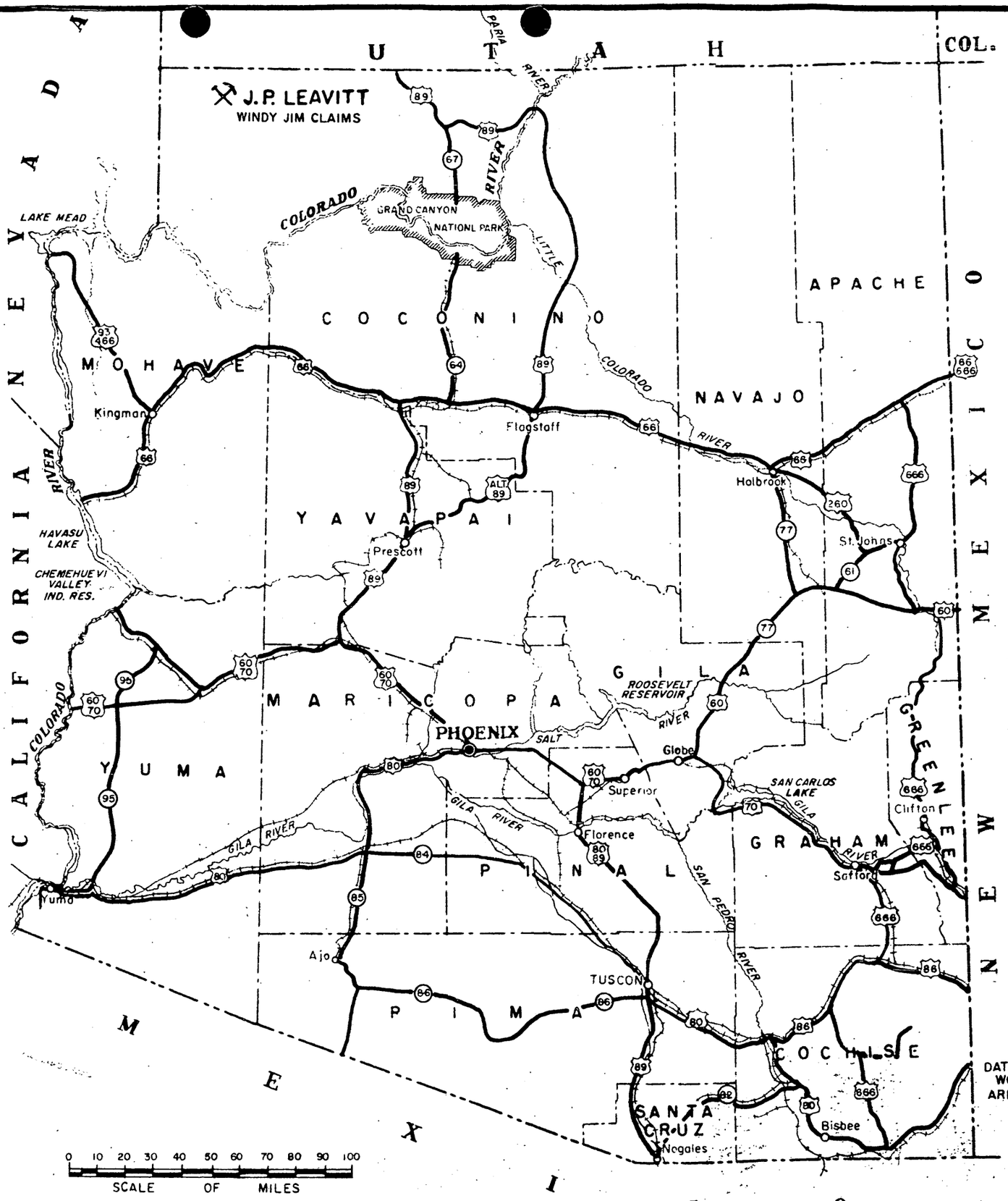
Ground conditions are fairly good; timber would be required for the raise and in some sections of the drift and crosscuts. It is assumed that inside-timber dimensions would be 4' x 6' for the raise, and 5½' x 7½' for the drift and crosscuts. The prevailing wage for

miners in the area is about $15 a day. With a crew of three men, and with adequate equipment (including a mucking machine), advance on a one-shift basis should average 3 feet a day, and total time to complete the project should be about 15 months. Under prevailing conditions, as to cost of labor, nature of the ground, and accessibility, the work could probably be done for $35 a foot.

CONCLUSIONS AND RECOMMENDATIONS

Scattered float containing small amounts of copper and uranium mineralization is found in a slide or slumped area on the Windy Jim claims. No mineralization of this type has been found in place.

It is recommended that the requested loan be denied, inasmuch as the float does not approach commercial grade and the site of the proposed exploratory work is below the source of the float.



NOTE

DATA TRACED FROM HAMMOND'S LIBRARY WORLD ATLAS. ROADS PLOTTED FROM ARIZONA TOURING MAP OF STANDARD OIL COMPANY OF CALIFORNIA, 1950.

U. S. DEPARTMENT OF THE INTERIOR
BUREAU OF MINES

Fig. 1 DMEA Docket No. 3975
Location Map
STATE OF ARIZONA
J. P. LEAVITT, WINDY JIM CLAIMS
MOHAVE COUNTY

ENGINEER: *Millard M. GILKEY*	DATE: DEC. 14, 1955
DRAWN: DEC., 1955; A.P.T.S.	1900-366-F
CHECKED:	

RECEIVED
JAN 12 1956

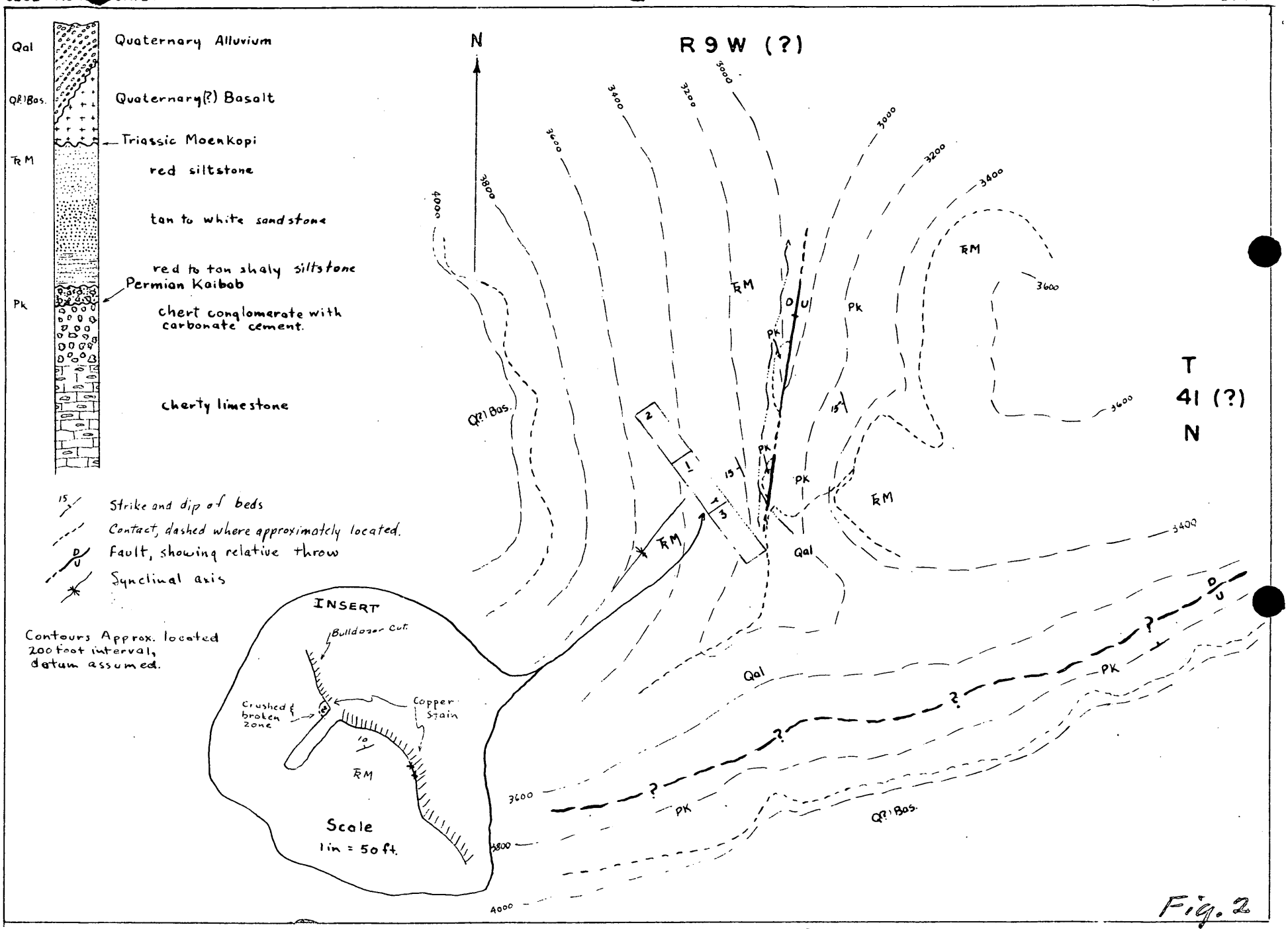


FIG. 2 GEOLOGIC SKETCH MAP OF WINDY JIM CLAIMS, NOS. 1, 2, & 3
MOJAVE COUNTY, ARIZONA

1900 - 367 - E

JAN 18 1956

Room 208 - 222 So. West Temple
Salt Lake City 1, Utah
November 29, 1955

TRANSMITTED
JAN 5 1956

Memorandum

To: E. H. Harshman, DMEA Field Team, Region III

From: R. W. Gruenstock

Subject: DMEA Docket 3975 (Uranium) J.(oseph) P.(ope) Leavitt and partners, Windy Jim Claims, Mohave County, Arizona.

Enclosed are eleven copies of a geologic report of examination on the subject property by R. W. Gruenstock, U. S. Geological Survey.

J. P. Leavitt and partners requested government assistance for copper-uranium ores on their Windy Jim claims. The applicants proposed an exploration program consisting of underground work beneath an adit and bulldozer cut which exposed isolated blocks of mineralized material on the Windy Jim No. 1 claim. The program was estimated to cost $43,919.33.

Copper-uranium mineralization on the Windy Jim claims has been noted only in isolated fragments of a coarse facies of the Triassic Moenkopi formation now contained in semi-consolidated slope wash. With no mineralization yet noted in place it is not possible to postulate ore controls and consequently no target area for a planned exploration program can be delineated.

It is considered that the apparently weak mineralization conditions did provide for the deposition of significant amounts of copper-uranium ore in the area. It is therefore recommended that the subject application be denied.

R. W. Gruenstock

RWG/rs
Enclosures

Reviewed by
DMEA OPERATING COMMITTEE
1-10-56
(date)

J. P. LEAVITT - WEEK JIM CLAIMS

MOHAVE COUNTY, ARIZONA

RECEIVED
JAN 12 1956

TRANSMITTED
JAN 5 1956

DMEA REPORT 3975

Initial Geologic Report

By R. W. Ostenstock
U. S. Geological Survey

Reviewed by
DMEA OPERATING COMMITTEE
1-16-56
(date)

CONTENTS

	Page
Summary	1
Introduction	2
Location and accessibility	2
History and production	3
Geology	3
Ore Deposits	5
Ore Reserves	6
Proposed Exploration	6
Conclusions and Recommendations	7

ILLUSTRATIONS

Fig. 1 — Index map of Arizona

2 — Geologic sketch map of Windy Jim claims

DMEA DOCKET 3975

JAN 13

SUMMARY

J. F. Leavitt and partners made application for DMEA assistance on September 3, 1955. The applicants' proposals involve underground exploration for copper-uranium ores on their Windy Jim claims in Mohave County, Arizona. The property was examined by DMEA personnel on October 12, 1955.

The Windy Jim claims lie on an east facing slope of a basalt capped mesa-like hill. The area is underlain by the Triassic Moenkopi formation and the Permian Kaibab limestone. Some minor faulting in the claim area may be related to the large Hurricane fault system which lies a few miles to the east. Copper mineralization is noted at two localities on the Windy Jim No. 1 claim; only one of these in a bulldozer trench below an old adit carried visible uranium minerals. All of the ore mineralization found to date has been in isolated fragments of a coarse grit and pebble conglomerate facies of the Moenkopi formation which are enclosed in semi-consolidated slope wash. No ore mineralization has yet been found in place.

No acceptable exploration program can be formulated in the light of present information. The relatively low intensity of the observed mineralization is such that no significant amount of copper-uranium ore is believed to exist in the area. It is recommended, therefore, that the application be denied.

INTRODUCTION

On September 3, 1955, J. P. Leavitt and partners applied for government assistance for uranium exploration on their Windy Jim claims, Nos. 1-3, Mohave County, Arizona.

At the request of the DMEA Region III Field Team an examination of the subject property was conducted by R. V. Gutenstein (USGS) and M. M. Gilbey (USBM) on October 12, 1955. Mr. J. P. Leavitt accompanied the field examiners during the inspection.

The total cost of the exploration program as proposed by the applicant is $43,929.53.

Location and accessibility

The Windy Jim claims are probably situate in Section 6 or 7, T. 41 N., R. 9 W., unsurveyed, Gila and Salt River Base and Meridian, in Mohave County, Arizona. More specifically, the claims lie on the east slope of a 4,000 foot high plateau; the slope leads down to a sharply incised northwesty draining canyon. Just south of the property a long east-west trending limestone cliff forms the head of the drainage basin which feeds the canyon.

The claims may be reached by travelling about 16 miles southeast of St. George, Utah on the "old Mt. Trumbull" road (Utah 64), this road is partially oiled and partially improved graveled road. At this point a stock tank and drift fence mark the take off point to the claims. A right fork of unimproved dirt road rapidly degenerates to a jeep trail which continues in a westerly direction for 5 miles to the southern end of the Windy Jim No. 1 claim.

Any type of adverse weather would render the latter section of the access road almost immediately impassible.

History and production

The applicant reports that the Windy Jim claim area was originally staked approximately 35 years ago. Apparently the interest at that time was in copper. An adit, estimated to have been 40 feet in length, was driven on what is now the Windy Jim No. 1 claim. The early exploration efforts must have been discouraging inasmuch as the property lay idle until recently relocated by the applicants. At the present time the Windy Jim claims are held by right of location by the applicants.

Prior to the date of the BGMA field examination a lessee had conducted a moderate bulldozer stripping operation with which a 150 foot contoured trench was dug on the Windy Jim No. 1 claim. The northwestern-most part of the trench has removed approximately the first 10 feet of the old adit. To date the property has no recorded production for either uranium or copper.

GEOLOGY

The Windy Jim claims lie in an area of gently tilted Permian and Triassic sedimentary rocks capped by Quaternary basalt flows.

Two formations are exposed in the vicinity of the claims, the Permian Kaibab limestone and the unconformably overlying Triassic Moenkopi formation. Only the uppermost beds of the Kaibab are bared by erosion near the claims, however, a short distance to the east approximately 400 feet of this formation is intermittently exposed in the footing canyon wall. It is noteworthy that this predominantly sandy

limestone formation becomes increasingly cherty and dolomitic near its top. The Triassic Moenkopi formation overlying the Kaibab was deposited after a long erosion interval, however the strata are essentially parallel. The Moenkopi is characterized by soft, easily weathered reddish, brown and purple shaly sandstone and siltstone. The lowermost beds, generally referred to as the Timpoweap member, are described by H. E. Gregory (USGS Prof. Paper 220, Geology and Geography of the Zion Park Region, Utah and Arizona, p. 60, 1950) as yellow red and gray gypsiferous sandy shales and lenticular brown sandstone, mostly in hard thin sheets, some sandy limestones, massive and shaly, some minutely brecciated with angular black cherts. It is believed that the Timpoweap member has not received maximum deposition in the claim area as the more characteristic red shaly sandstones are almost immediately apparent above the Kaibab limestone.

The rocks exposed by the bulldozer trench on the Windy Jim No. 1 claim are predominantly red shaly siltstones and sandstones with lesser amounts of lenticular grit beds. None of the above mentioned rock types have any semblance of depositional order, nor may any of the beds be traced laterally for more than a few feet. It is suggested therefore that the material on the Windy Jim No. 1 claim may have been transported a short distance downslope by slumping or landslide thereby jumbling the beds. The mass is now semi-consolidated probably as a result of ground water action.

Capping the Moenkopi and Kaibab formations and holding up the plateau and mesa-like tops of the hills are brown weathering Quaternary(?) basalt flows. Large blocks of this rock have broken off and are noted frequently on the slopes below the rim.

Structurally, the claim area lies in a region of broad uparps cut by extremely persistent north striking normal faults. The major structural feature in the region is the Hurricane fault which lies a few miles to the east of the Windy Jim claims. Locally, the sediments are cut by a small north striking normal fault, down on the west; this fault parallels the Hurricane fault and may be considered a related subordinate structure. A short distance to the south of the claims a long E-W limestone cliff apparently represents a fault scarp. Projection of the Kaibab limestone from the canyon east of the claim area indicates that this structure has elevated the section in the south block.

ORE DEPOSITS

Ore mineralization in the claim area is noted at only three localities, two in the bulldozer cut on the Windy Jim No. 1 claim and one very small exposure at the bottom of the canyon on the north striking fault zone, probably not in place.

All of the mineralized exposures are exemplified by green copper staining. Visible uranium minerals were noted only in loose rock fragments lying in the bulldozer cut near the mouth of the old adit. Both the copper, as malachite, and the uranium, probably as autunite or autunite, appear to be restricted to a coarse sandy grit and pebble conglomerate facies of the Moenkopi formation. This unit was not found

in place on the property. Isolated fragments of mineralized material are apparently encased in the partially cemented slope wash which blankets the claim area. One such specimen is reported by the applicant to have assayed 6.1 percent copper and 0.39 percent U_3O_8. No abnormally high amount of radio activity was noted in a scintillator traverse across the claim area.

As the ore mineral bearing fragments have not been observed in their original setting, no theorizing relative to the origin and localizing controls is feasible.

ORE RESERVES

No ore reserves of any classification are estimated for the Windy Jim claims. It is possible that a very small amount of ore grade material, probably not exceeding a few hundred pounds, may be recovered from mineralized blocks and chunks exposed by the bulldozer trenching.

PROPOSED EXPLORATION

The applicant has proposed an exploration program costing $43,919.53. Although the work proposals in the application are not quite clear, discussion of the program with the applicant in the field revealed his plans to drop about 75 feet vertically below and to the southeast of the present adit and drive a 300 feet northwesterly crosscut to a point approximately below the old adit. The applicant then proposed raising to the old adit on a steep incline and from the main level driving two additional crosscuts out to the east until their headings holed through the face of the slope.

In view of the lack of target area as might be defined by projectable ore controls it appears that the applicants' exploration program is designed to test the ground further into the hill which may not have been subjected to slumping. The fact the ore bearing fragments thus far located are all vertically above the proposed work would tend to negate the effectiveness of such work. If additional work is to be done it should involve prospecting above the present dozer cut inasmuch as the fragments of mineralized material found have apparently been torn out of a vertically higher zone subjected to slumping.

CONCLUSIONS AND RECOMMENDATIONS

The copper-uranium ore mineralization on the Windy Jim claims is confined to a coarse sand and grit facies of the Mesaverde formation which has not been found in place. The frequency of distribution of the mineralized fragments in the semi-consolidated slope wash is such that no economically feasible mining operation can be conducted on this material. As the fragments have not been observed in their original setting no ore controls may be postulated which would aid in delineating a target area for an acceptable exploration program.

It is recommended that the application for government assistance be denied on the grounds that the area has probably been subjected to only very weak mineralizing solutions, and no acceptable exploration program can be offered in the light of the available information. It is doubtful that such an area contains sufficient copper-uranium mineralization to constitute a significant addition to the nation's resources.

The Windy Jim property has not been examined by representatives of the AEC and consequently they have nothing to offer by way of concurrence with this report.

U. S. DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY

DEFENSE MINERALS EXPLORATION ADMINISTRATION
DOCKET NO. [illegible]

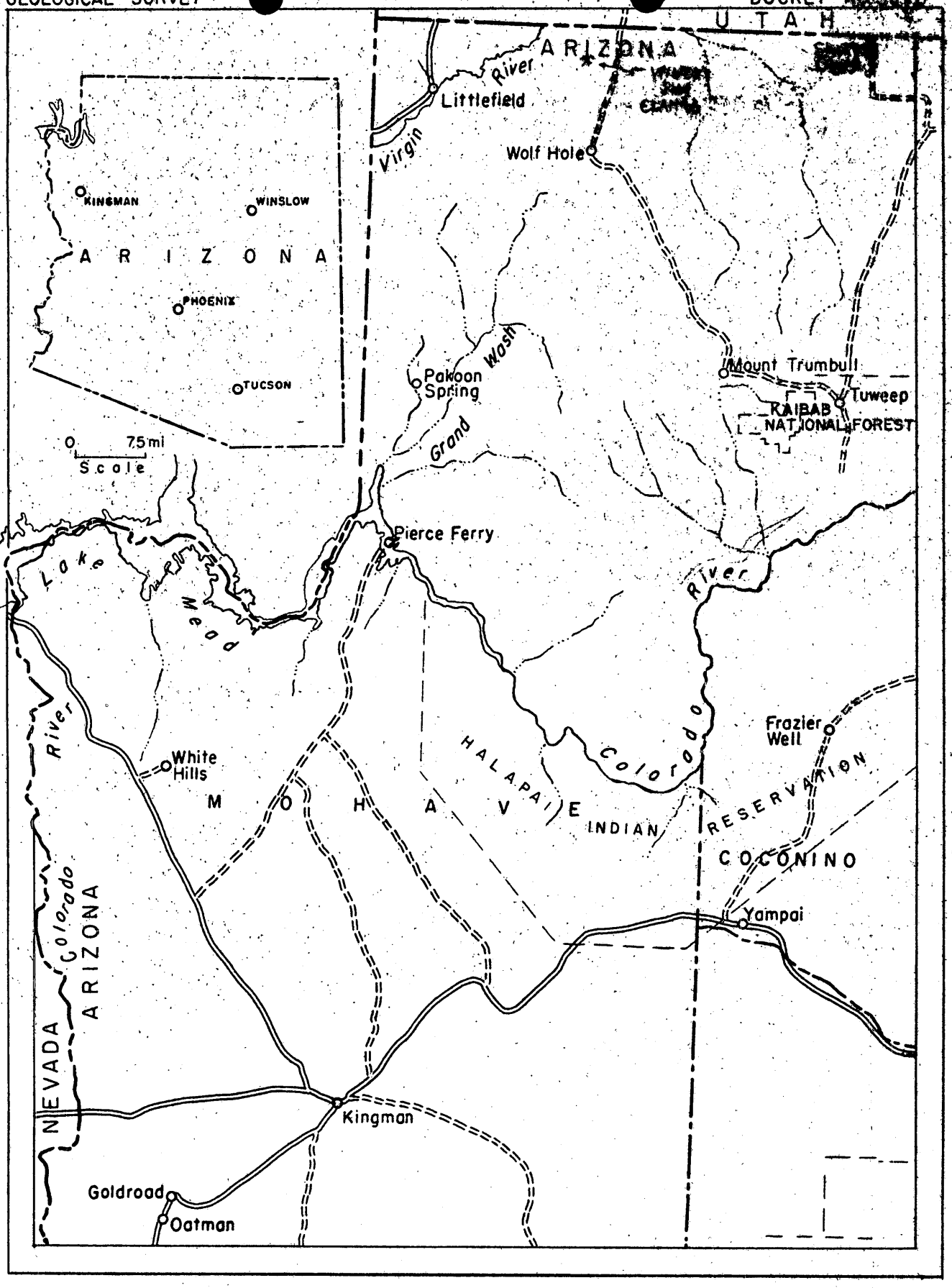


FIG. I

INDEX MAP OF ARIZONA

0 5 10 15 20 miles
Scale

RECEIVED
JAN 12 1956

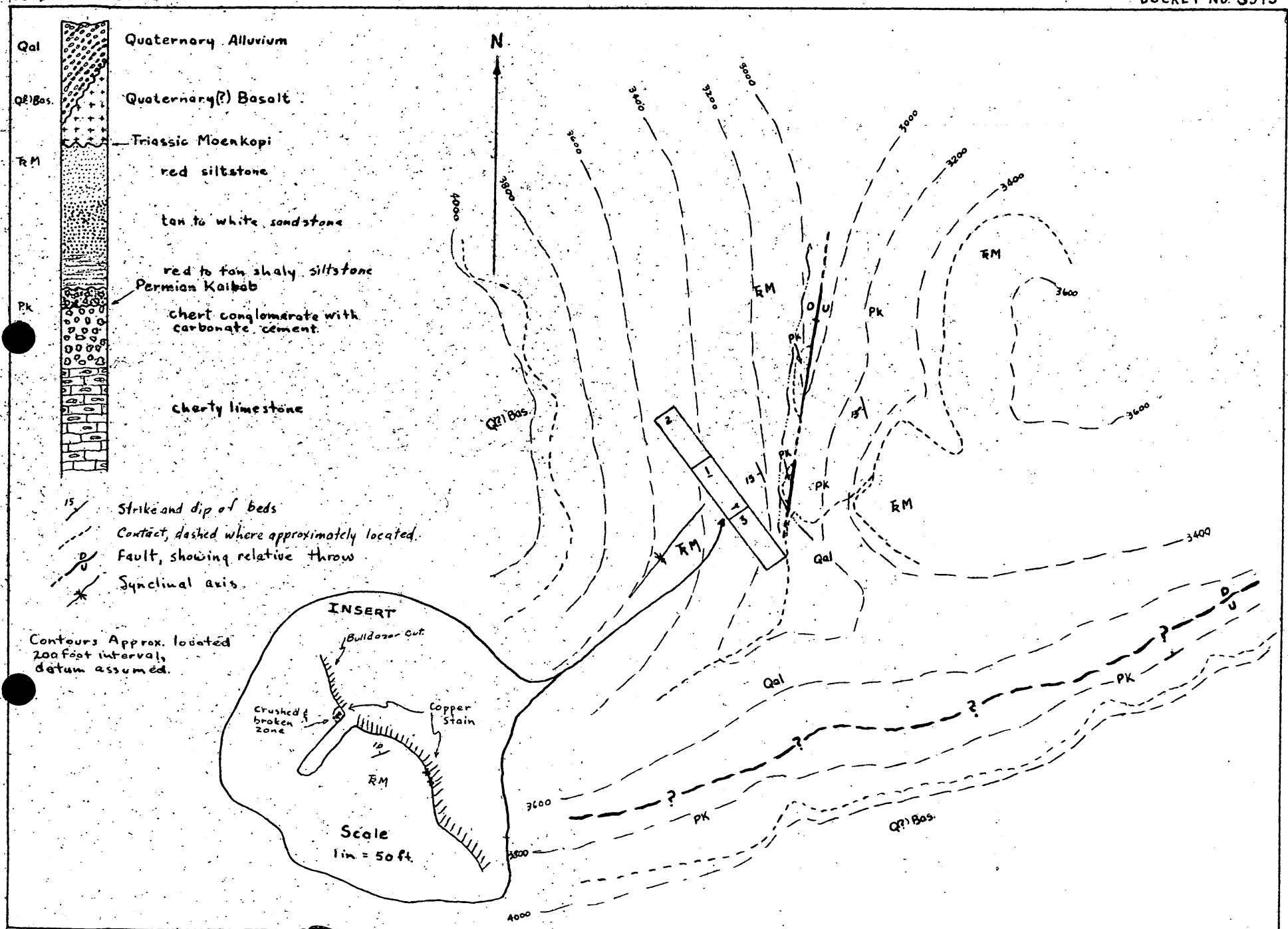


FIG. 2 GEOLOGIC SKETCH MAP OF WINDY JIM CLAIMS, NOS. 1, 2, & 3
MOJAVE COUNTY, ARIZONA

RECEIVED
JAN 12 1956

UNITED STATES
DEPARTMENT OF THE INTERIOR
DEFENSE MINERALS EXPLORATION ADMINISTRATION
WASHINGTON 25, D. C.

RECEIVED
OCT 21 1955

October 19, 1955

[illegible] New Customhouse
Denver 2, Colorado

Memorandum

To: S. R. Wilson
J. W. Kadler

From: Executive Officer, DMEA Field Team, Region III

Subject: DMEA Docket 3975 (Uranium-Copper), Joseph Page Leavitt, et al., Windy Jim claims, Mohave County, Arizona

Attached for your information is a copy of a letter from the Chairman of the Operating Committee with attached memoranda from John E. Crawford and N. E. Nelson, members of the Commodity Committee.

W. M. Traver
W. M. Traver

Enclosures
HMC:ab
cc: Sec. Op. Comm. (2)
Harshman
Docket 3975
Charon.

UNITED STATES
DEPARTMENT OF THE INTERIOR
DEFENSE MINERALS EXPLORATION ADMINISTRATION
WASHINGTON 25, D. C.

RECEIVED
OCT 21 1955

October 19, 1955

22d New Customhouse
Denver 2, Colorado

Memorandum

To: S. R. Wilson
J. W. Hasler

From: Executive Officer, DMEA Field Team, Region III

Subject: DMEA Docket 3975 (Uranium-Copper), Joseph Page Lemritt, et al., Windy Jim claims, Mohave County, Arizona

Attached for your information is a copy of a letter from the Chairman of the Operating Committee with attached memoranda from John E. Crawford and E. E. Nelson, members of the Commodity Committee.

W. M. Traver

Enclosures
HMC:ab
cc: Sec. Op. Comm. (2)
Harshman
Docket 3975
Chron.

Surname copy

700

Ching
Ellis
Gehan
Kulgaard
Selfridge

UNITED STATES
DEPARTMENT OF THE INTERIOR
DEFENSE MINERALS EXPLORATION ADMINISTRATION
WASHINGTON 25, D. C.

OCT 13 1955

Mr. Joseph Page Leavitt
1339 So. 3rd East
Salt Lake City, Utah

Re: Docket No. DMEA-3975
(Uranium and Copper)
Joseph Page Leavitt, et al.
Windy Jim Claims
Mohave County, Arizona

Dear Mr. Leavitt:

The application for assistance in exploring the subject property under the captioned docket number has been reviewed by the Rare and Miscellaneous Metals Division.

The DMEA Field Team, Region III, Mr. W. M. Traver, Executive Officer, 22h New Customhouse Building, Denver 2, Colorado, will schedule a field examination of your property in the near future if it has not already done so.

Any assistance you may give the members of the Field Team will be appreciated.

Sincerely yours,

Frank E. Johnson

Acting Administrator

MChing/gla
10-12-55
cc to: Admr.'s Reading File
Docket
Code 700
Mr. Ching
DMEA Field Team, Region III (2)

R.C.L.

Surname copy

700

Ching
Ellis
Selfridge
Hyman

UNITED STATES
DEPARTMENT OF THE INTERIOR
DEFENSE MINERALS EXPLORATION ADMINISTRATION
WASHINGTON 25, D. C.

OCT 13 1955

Mr. W. M. Traver
Executive Officer
DMEA Field Team, Region III
224 New Customhouse Building
Denver 2, Colorado

Re: Docket No. DMEA-3975
(Uranium and Copper)
Joseph Page Leavitt, et al.
Windy Jim Claims
Mohave County, Arizona

Dear Mr. Traver:

This is with reference to your memoranda of September 7 and September 26, 1955, and enclosures, relating to the subject application.

Enclosed are two copies each of memoranda from John E. Crawford, BSFM, dated October 3, and N. E. Nelson, USGS, dated October 7, 1955.

Sincerely yours,

George C. Selfridge

Chairman, Operating Committee (GCS)

Enclosures

MChing/gla
10-12-55
cc to: Admr.'s Reading File
Operating Committee
Docket
Messrs. JECrawford, Rm. 3641
THKiilsgaard, Rm. 5224
JOHosted, Rm. 3210, GSA
Code 700
Mr. Ching

APPROVED:

/s/ Robert W. Geehan (GCS)
Member, Bureau of Mines

Thor H. Kiilsgaard (GCS)
Member, Geological Survey

R.C.S.

10/10/55 - gla

IN REPLY REFER TO:

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY
WASHINGTON 25, D. C.

RECEIVED
OCT 10 1955

October 7, 1955

Re: DMEA 3975
J. P. Leavitt & Partners
Windy Jim Claims
Mohave Co., Ariz.
$43,919.53 - Uranium

Memorandum

To: E. W. Ellis, Defense Minerals Exploration Administration

From: N. E. Nelson, U. S. Geological Survey

Subject: Review of application

The Field Team has recommended that an examination of this property be made.

The application is not readily understood, but from the assay certificate and the description the impression is gained that float of value has been recovered from the surface and in a "fault" zone. Whether or not the applicant has arrived at the right solution must be shown. Probably the proposed program is too ambitious.

I concur with the recommendation of the Field Team that an examination be made.

N. E. Nelson

N. E. Nelson

IN REPLY REFER TO:

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY
WASHINGTON 25, D. C.

October 7, 1955

Re: DMEA 3975
J. P. Leavitt & Partners
Windy Jim Claims
Mohave Co., Ariz.
$43,919.53 - Uranium

Memorandum

To: E. W. Ellis, Defense Minerals Exploration Administration

From: N. E. Nelson, U. S. Geological Survey

Subject: Review of application

The Field Team has recommended that an examination of this property be made.

The application is not readily understood, but from the assay certificate and the description the impression is gained that float of value has been recovered from the surface and in a "fault" zone. Whether or not the applicant has arrived at the right solution must be shown. Probably the proposed program is too ambitious.

I concur with the recommendation of the Field Team that an examination be made.

N. E. Nelson

N. E. Nelson

Copy to: DMEA (3)

10/5/55 gla

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF MINES
WASHINGTON 25, D. C.

October 3, 1955

Memorandum

To: Ernest William Ellis, DMEA Member
Uranium Commodity Committee, Room 4445

From: John E. Crawford, Bureau of Mines Member
Uranium Commodity Committee

Subject: Application for assistance, DMEA Docket 3975, Joseph Page Leavitt and Partners, Windy Jim claims, Mohave County, Ariz.

I have reviewed the application of Joseph Page Leavitt and Partners, DMEA Docket 3975, and I have discussed it with Joseph O. Hosted, Washington representative of the Atomic Energy Commission.

The information contained in the application is difficult to comprehend fully. It is apparent, however, that some uranium-copper mineralization has been discovered on the Windy Jim claims. An assay report indicating values of 8.1 percent copper and 0.39 percent U_3O_8 was attached. The material analyzed is presumed to have been taken from the property.

It is doubtful that more comprehensive data might be obtained from applicant upon request, and since W. M. Traver's memorandum of September 26 to the chairman of the Operating Committee indicates that a field examination will be made there is no alternative but to agree. Mr. Hosted recommends that the Field Team consult with E. E. Thurlow, Atomic Energy Commission, Salt Lake City, Utah.

John E. Crawford
John E. Crawford

Attachment

September 29, 1955

Memorandum

To: S. R. Wilson

From: Superintendent, Denver Experiment Station, Reg. III

Subject: Docket DMRA 3975 (Uranium), Joseph Page Leavitt and Partners, Windy Jim Claims, Mohave County, Arizona

The subject application in the amount of $43,919.53 is enclosed herewith. The brochure consists of:

1. Form NF-103 and supplementary information
2. Sketch maps (2)
3. Copy of Executive Officer's memo of transmittal to this office
4. Assay sheet from Black & Deason

A field examination and suitable report are required. The completed report should be sent directly to the Executive Officer, with a copy of the memo of transmittal to this office.

W. H. KING

W. H. King

Enclosures

Copy to: E. N. Harshman
R. W. Osterstock
W. M. Traver (3)
Sec. Op. Comm. (2)

September 29, 1955

Memorandum

To: S. R. Wilson

From: Superintendent, Denver Experiment Station, Reg. III

Subject: Docket DMEA 3975 (Uranium), Joseph Page Leavitt and Partners, Windy Jim Claims, Mohave County, Arizona

The subject application in the amount of $43,919.53 is enclosed herewith. The brochure consists of:

1. Form MF-103 and supplementary information
2. Sketch maps (2)
3. Copy of Executive Officer's memo of transmittal to this office
4. Assay sheet from Black & Deason

A field examination and suitable report are required. The completed report should be sent directly to the Executive Officer, with a copy of the memo of transmittal to this office.

W. H. KING

W. H. King

Enclosures

Copy to: E. N. Harshman
R. W. Caterstock
W. M. Traver (3)
Sec, Op. Comm. (2)

9/28/55 gla

UNITED STATES
DEPARTMENT OF THE INTERIOR
DEFENSE MINERALS EXPLORATION ADMINISTRATION
WASHINGTON 25, D. C.

RECEIVED
SEP 28 1955

September 26, 1955

224 New Customhouse
Denver 2, Colorado

Memorandum

To: Chairman of the Operating Committee, DMEA

From: Field Team, Region III

Subject: Docket DMEA 3975 (Uranium), Joseph Page Leavitt and Partners, Windy Jim Claims, Mohave County, Arizona

Enclosed are four copies of a review made by the Grand Junction Office on the subject application. We concur in the recommendation that a field examination be made.

Our copy of the application is being forwarded for use of the examining engineer.

W. M. Traver
W. M. TRAVER

E. N. Harshman
E. N. HARSHMAN

Enclosures

DMEA
Date Rec'd
SEP 23
BUREAU OF MINES
Denver, Colorado

September 22, 1955

Memorandum

To: W. M. Traver, Executive Officer, DMEA Field Team Region III

From: J. W. Hasler USGS
M. H. Salsbury USBM

Subject: DMEA 3975, (uranium) Joseph Page Leavitt and Partners, Windy Jim claims, Mohave County, Arizona

The above referenced applicant has applied for Government assistance to explore for uranium on three unpatented mining claims in Mohave County, Arizona.

There is not too much information available on the ore potential of this region. The applicant does not seem to be able to express himself clearly in the report, therefore the properties merits cannot be judged solely on the information in the application.

The property may have enough potential to merit a small amount of exploration.

Therefore it is recommended that a field examination be made.

J. William Hasler
J. William Hasler
Geologist

M. H. Salsbury by Hatt
M. H. Salsbury
Mining Engineer

JWH/vll

UNITED STATES
DEPARTMENT OF THE INTERIOR
DEFENSE MINERALS EXPLORATION ADMINISTRATION
WASHINGTON 25, D. C.

RECEIVED
SEP 26 1955

September 26, 1955

224 New Customhouse
Denver 2, Colorado

Memorandum

To: Chairman of the Operating Committee, DMEA

From: Field Team, Region III

Subject: Docket DMEA 3975 (Uranium), Joseph Page Leavitt and Partners, Windy Jim Claims, Mohave County, Arizona

Enclosed are four copies of a review made by the Grand Junction Office on the subject application. We concur in the recommendation that a field examination be made.

Our copy of the application is being forwarded for use of the examining engineer.

W. M. Traver
W. M. TRAVER

E. N. Harshman
E. N. HARSHMAN

Enclosures

DMEA
Date Rec'd.
SEP 23 1955
BUREAU OF MINES
Denver, Colorado

September 22, 1955

Memorandum

To: W. M. Traver, Executive Officer, DMEA Field Team Region III

From: J. W. Hasler USGS
M. H. Salsbury USBM

Subject: DMEA 3975, (uranium) Joseph Page Leavitt and Partners, Windy Jim claims, Mohave County, Arizona

The above referenced applicant has applied for Government assistance to explore for uranium on three unpatented mining claims in Mohave County, Arizona.

There is not too much information available on the ore potential of this region. The applicant does not seem to be able to express himself clearly in the report, therefore the properties merits cannot be judged solely on the information in the application.

The property may have enough potential to merit a small amount of exploration.

Therefore it is recommended that a field examination be made.

J. William Hasler
J. William Hasler
Geologist

M H Salsbury by JWH
M. H. Salsbury
Mining Engineer

JWH/vll

UNITED STATES
DEPARTMENT OF THE INTERIOR
DEFENSE MINERALS EXPLORATION ADMINISTRATION
WASHINGTON 25, D. C.

RECEIVED
SEP 26 1955

September 26, 1955

224 New Customhouse
Denver 2, Colorado

Memorandum

To: W. H. King

From: Executive Officer, DMEA Field Team, Region III

Subject: Docket DMEA 3975 (Uranium), Joseph Page Leavitt and Partners, Windy Jim Claims, Mohave County, Arizona

Enclosed is the subject application in the amount of $43,919.53. The application consists of Form MF-103 and accompanying answer sheets including two rough sketches and one Certificate of Assay.

A field examination and suitable report are required.

W. M. Traver
W. M. Traver

Enclosure

HMC:ab
cc: Sec. Opr. Comm. (2)
Harshman
Hasler
Docket 3975
Chron.

UNITED STATES
DEPARTMENT OF THE INTERIOR
DEFENSE MINERALS EXPLORATION ADMINISTRATION
WASHINGTON 25, D. C.

RECEIVED
SEP 3 1955

September 26, 1955

224 New Customhouse
Denver 2, Colorado

Memorandum

To: W. H. King

From: Executive Officer, DMEA Field Team, Region III

Subject: Docket DMEA 3975 (Uranium), Joseph Page Leavitt and Partners, Windy Jim Claims, Mohave County, Arizona

Enclosed is the subject application in the amount of $43,919.53. The application consists of Form MF-103 and accompanying answer sheets including two rough sketches and one Certificate of Assay.

A field examination and suitable report are required.

W. M. Traver

W. M. Traver

Enclosure

HMC:ab
cc: Sec. Opr. Comm. (2)
Harshman
Hasler
Docket 3975
Chron.

September 13, 1955

Subject: DMEA 3975
Re: Exploration Assistance

Mr. Joseph Page Leavitt
1339 South 3rd East
Salt Lake, Utah

Dear Mr. Leavitt:

The receipt of your application dated September 3, 1955 for exploration assistance under the Defense Production Act of 1950, as amended, is hereby acknowledged.

Your application has been assigned Docket Number DMEA 3975 and referred to the Rare & Miscellaneous Division.

Kindly identify all future correspondence relating to your application by this docket number.

Sincerely yours,

Robert E. Adams, Chief
Operations Control and
Statistics Division

60932

September 13, 1955

Memorandum

To: Executive Officer, DMEA Field Team, Region III

From: Chief, Operation's Control and Statistics Division

Subject: Assignment of Docket Number

There is listed below the assigned docket number to an application recently received from Region III.

DMEA-3975 Joseph Page Leavitt, et al

Robert E. Adams,
Chief, Operation's Control
and Statistics Division

UNITED STATES
DEPARTMENT OF THE INTERIOR
DEFENSE MINERALS EXPLORATION ADMINISTRATION
WASHINGTON 25, D. C.

RECEIVED
SEP 12 1956

September 7, 1955

224 New Customhouse
Denver 2, Colorado

Memorandum

To: Secretary to The Operating Committee, DMEA

From: Executive Officer, DMEA Field Team, Region III

Subject: Application for DMEA aid (Uranium), Joseph Page Leavitt and partners, Windy Jim Mine Area, Mohave County, Arizona

Enclosed are two copies of the subject application in the amount of $43,919.53.

One copy of the application has been forwarded to the Grand Junction office for study and recommendations.

W. M. Traver

W. M. Traver

Enclosures

UNITED STATES
DEPARTMENT OF THE INTERIOR
DEFENSE MINERALS EXPLORATION ADMINISTRATION
WASHINGTON 25, D. C.

RECEIVED
SEP 12 1955

September 7, 1955

224 New Customhouse
Denver 2, Colorado

Memorandum

To: J. W. Hasler

From: Executive Officer, DMEA Field Team, Region III

Subject: Application for DMEA aid (Uranium), Joseph Page Leavitt and partners, Windy Jim Mine area, Mohave County, Arizona

Enclosed is a copy of the subject application in the amount of $43,919.53.

Please study this application and discuss it with the AEC and Bureau of Mines representatives in Grand Junction and forward this office eight copies of your recommendations regarding a field examination of the property.

W. M. Traver

Enclosures

Jc:ab
cc: Sec. Oper. Comm. (4)
Harshman
Docket
Chron.

MF-103
(Revised April 1952)

UNITED STATES DEPARTMENT OF THE INTERIOR
DEFENSE MINERALS EXPLORATION ADMINISTRATION

DMEA
Date Rec'd.
SEP 6 1955

Form Approved.
Budget Bureau No. 42-R1035.2.

RECEIVED
SEP 12 1955
BUREAU OF MINES
Denver, Colorado

APPLICATION FOR AID IN AN EXPLORATION PROJECT, PURSUANT TO DMEA ORDER 1, UNDER THE DEFENSE PRODUCTION ACT OF 1950, AS AMENDED

Not to be filled in by applicant

Docket No. DMEA-3975 copper
Metal or Mineral Uranium
Date Received 9-12-55
Estimated Cost 43,919.53
Participation (Government %)

INSTRUCTIONS

1. *Name of applicant.*—(*a*) State here your full legal name, in the form in which you will wish to contract, and your mailing address: Joseph Page Leavitt, 1339 So. 3rd East, Salt Lake City, Utah. In Partnership with Lee Cox, St. George, Utah. Anthony Berumen, 2217 Taylor Ave, Ogden, Utah, and William Martin and Pat Wilson of 657 West, 3rd north, Salt Lake Utah.

(*b*) If other than an individual, add to your name above whether a corporation, partnership, etc., and the name of the State in which incorporated or otherwise organized. Partnership.

(*c*) If a corporation, add to above statement, titles, names and addresses of officers.

(*d*) If a partnership, add to the above statement the names and addresses of all partners. Seperate statemnnt under title.

2. *General.*—Read DMEA Order 1, "Government Aid in Defense Exploration Projects," before completing this application. Submit this application and all accompanying papers in quadruplicate (four copies), with your name and address on each sheet of the application and on all accompanying papers. Where sufficient space is not provided on the form for all required information, state it on an accompanying paper, with a reference in each case to the instruction to which it refers by number. Comply with all applicable instructions; or, if not applicable, so state. File the application with Defense Minerals Exploration Administration, Department of the Interior, Washington 25, D. C., or with the nearest field executive officer thereof.

3. *Applicant's property rights.*—(*a*) State the legal description of the land upon which you wish to explore, including all land which you possess or control that may be benefited by the exploration, and excluding any land or interest in land which is not to be included in the exploration project contract "The Windy Jim" Mining Claims #1,2 and 3 are located approx. 18 miles air line S.40° E. of St. George Utah. They extend end to end 4500 ft., long, 600 ft. wide running in a northerly andsoutherly direction.

(*b*) State any mine name by which the property is known. "The Windy Jim"

(*c*) State your interest in the land, whether owner, lessee, purchaser under contract, or otherwise Owners

(*d*) If you are not the owner, submit with this application a copy of the lease, contract, or other document under which you control the property.

(*e*) If you own the land, describe any liens or encumbrances on it None

(*f*) If the land consists of unpatented claims, add to the description above, the book and page numbers for each recorded location notice. "Windy Jim"#1 recorded 4-H book of mines, page 320. #2 Book 4-Q of mines page 167. #3 Book 4-Q of mines page 166, at Kingman, Mohave County, Arizona.

4. *Physical description.*—(*a*) Describe in detail any mining or exploration operations which have been or now are being conducted upon the land, including existing mine workings and production facilities. State your interest, if any, in such operations. Also describe accessibility of mine workings for examination purposes. Seperate report.

(*b*) State past and current production, and ore reserves, if any, giving quantities and grades. 2 ton ,not sold.

(*c*) Describe the geologic features of the property, including mineralization, type of deposit (vein, bedded, etc.), and your reasons for wishing to explore. Illustrate with maps or sketches. Send with your application (but not necessarily as a part of it) any geologic or engineering report, assay maps, or other technologic information you may have, indicating on each whether you require its return to you. Seperate report

(*d*) State the facts with respect to the accessibility of the project: Access roads, distances to shipping, supply and residence points. seperate report

(*e*) State the availability of manpower, materials, supplies, equipment, water, and power. seperate report.

16—66551-1

5. *The exploration project.*—(*a*) State the mineral or minerals for which you wish to explore Uranium and Copper

(*b*) Describe fully the proposed work, including a map or sketch of the property showing a plan (and cross sections if needed) of any present mine workings, and the location of the proposed exploration work as related to such features as contacts, veins, ore-bearing beds, etc. Seperate map showing proposed workings

(*c*) The work will start within 30 days and be completed within 18 months from the date of an exploration project contract.

(*d*) State the operating experience and background of the applicant with relation to the ability to carry out such exploration project, and also that of the person or persons who will supervise the operations. seperate report

6. *Estimate of costs.*—Furnish a detailed estimate of the costs of the proposed work (you will have to use a separate sheet), under the following headings. Add the totals under all headings to give the estimated total cost of the project: sept.rept.

(*a*) *Independent contracts.*—(Note.—If the applicant does not intend to let any of the work to contractors, write "none" after this item. To the extent that the work is to be contracted, do not repeat the cost of the contract-work in subsequent items.) State the cost of any proposed independent contracts for the performance of all or any part of the work, expressed in terms of units of work (such as per foot of drilling, per foot of drifting, per hour of bulldozer operations, per cubic yard of material moved, etc.). None

(*b*) *Labor, supervision, consultants.*—Include an itemized schedule of numbers, classes and rates of wages, salaries or fees for necessary labor, supervision and engineering and geological consultants. seperate report.

(*c*) *Operating materials and supplies.*—Furnish an itemized list, including items of equipment costing less than $50 each, and power, water and fuel. seperate report

(*d*) *Operating equipment.*—Furnish an itemized list of any operating equipment to be rented, purchased, or which is owned and will be furnished by the Operator, with the estimated rental, purchase price, or suggested use-allowance based on present value, as the case may be. seperate report

(*e*) *Rehabilitation and repairs.*—Furnish a detailed list showing the cost of any necessary initial rehabilitation or repairs of existing buildings, installations, fixtures, and movable operating equipment, now owned by the Operator and which will be devoted to the exploration project. None

(*f*) *New buildings, improvements, installations.*—Furnish a detailed list showing the cost of any necessary buildings, fixed improvements, or installations to be purchased, installed or constructed for the benefit of the exploration project. sept. rept.

(*g*) *Miscellaneous.*—Furnish a detailed list showing the cost of repairs to and maintenance of operating equipment (not including initial rehabilitation or repairs of the Operator's equipment), analytical work, accounting, workmen's compensation and employers' liability insurance, and payroll taxes. seperate report.

(*h*) *Contingencies.*—Give an estimate of any necessary allowances for contingencies not included in the costs stated above.

NOTE.—No items of general overhead, corporate management, interest, taxes (other than payroll and sales taxes), or any other indirect costs, or work performed or costs incurred before the date of the contract, should be included in the estimate of costs.

7. (*a*) Are you prepared to furnish your share of the cost of the proposed project in accordance with the regulations on Government participation (Sec. 7, DMEA No. 1)? yes

(*b*) How do you propose to furnish your share of the costs?

[x] Money [x] Use of equipment owned by you [x] Other Labor

Explain in detail on acompanying paper. seperate report

CERTIFICATION

The undersigned, whether as an individual, corporate officer, partner, or otherwise, both in his own behalf and acting for the applicant, certifies that the information set forth in this form and accompanying papers is correct and complete, to the best of his knowledge and belief.

Dated 3rd day of Sept., 1955

J. P. Leavitt
(Applicant)

By

Title 18, U. S. Code (Crimes), Section 1001, makes it a criminal offense to make a willfully false statement or representation to any department or agency of the United States as to any matter within its jurisdiction.

U. S. GOVERNMENT PRINTING OFFICE 16—66551-1

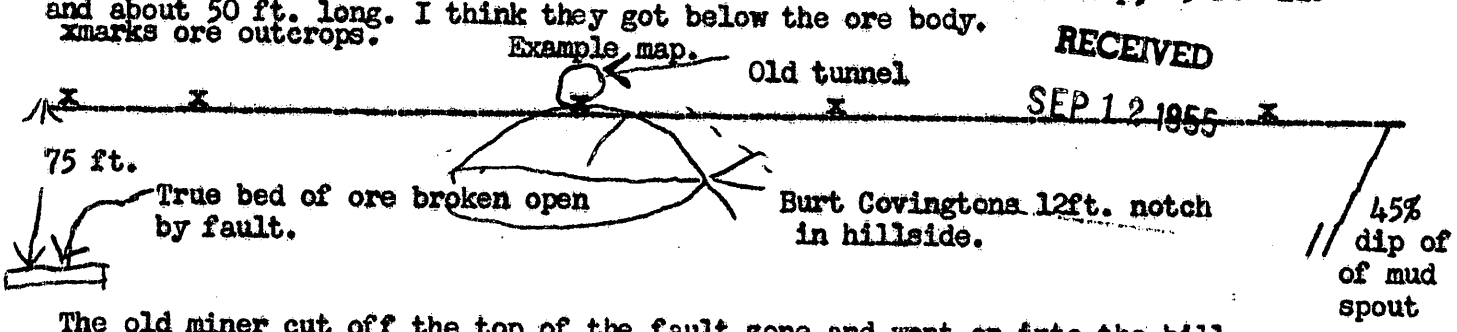
Application for [redacted] in an exploration project toD[redacted],,ORDER 1
J.P.Leavitt,[redacted]339 south, 3rd east, Salt Lake City, Utah.

#1 under instructions and b-c-d all answered on orignal instruction sheet. Also #2 and #3 Applicants propertys rights. Please note answer under Title on engineers report 1-d. #3-a -b-c-d-e all answered on orignal sheet.#3-f the land consists of three unpatented claims named the "Windy Jim" #1-2 and 3. "Windy Jim" #1 is recorded in book 4-H of mines,page#### 320. #2 is recorded in book 4-Q of mines page 167 and #3 is recorded in book 4-Q of mines on page 166. All recorded in Mohave County recorders office, Kingman Arizona.

#4 Physical description—

An old prospector, years ago drove a tunnel into the hill for about 35ft. It is my belief that he got above the ore zone. This year Burt Covington and Associates took took an option to buy, on the claims and had a bull-dozer brought in. They made a road into the claims and cut a notch in the hill-sideabout 12ft deep, 25 ft wide and about 50 ft. long. I think they got below the ore body.

RECEIVED
SEP 12 1955



The old miner cut off the top of the fault zone and went on into the hill, leaving a few pieces of ore, one of which I have had assayed and am sending you the report. Burt Covington cut up to the fault zone but did not cut into it much with the bulldozer. He did however, scratch into it enough so that it appears to me to be an ancient mud spout that carried with it large pieces of ore. This ore was evidently knocked off the sides of a fault and carried to the surface by the mud. What appears to me to have been the mud zoneis about 8 ft wide and about 500 ft long. The mud zone is slightly darker color than the surrounding clays and not strat--afied. While the surrounding clays are slightly stratafied. But they are so near the same color that no one has noticed that they are not of the same material, except myself. The mine is easily accessable.

#4-b there has been no ore shipped as yet. What ore has been found (about a small truck load or 2 tons) has been bulldozed off the mountainside.

#4c Geologic features of the property are fully explained in accompaning engineers report. My desire for further developement are explained by sketch above.

#4-d Access roads are built into the project. It is roughly about 68 miles from Cedar City and about 125 miles from Marysvale Utah.

#4-e Local manpower is plentiful. Material, supplies and equipment, may be either purchased or rented at Salt Lake, Utah. All equipment must be Gasoline powered. Water must be hauled from washington canals or St. George, in wooden barrels or iron ones.

#5-b It is my plan to go down the hill 75 ft. below the present tunnel and drift in with an open 5'x7' tunnel until the mud zone is incountered. Then sink with the fault zone until the solid ore vein is incountered. Then discover what type of ore body it is and notify the DMEA.

Application for aid i[illegible]n exploration project, pursuan[illegible]o DMEA 1,
J.P.Leavitt, 1339 So. [illegible]rd East, Salt Lake City, Utah.

RECEIVED
SEP 12 1955

SUMMARY

The "Windy jim" claims are located approximately 18 miles air line S.40° E. of St. George, Utah. In northern Mohave County, Arizona. A fairly good dirt road for 18 miles leads nearly to the claims and then by easy grade for 2 miles by rough jeep road that could be easily and cheaply improved to the claim site where high grade copper-uranium ore float has been found in fault zone but no ### ore can be found in place and therefore no recommendations have been made regarding this project.

TITLE #1-d

The Windy Jim claims are located and recorded under the name of J.P.Leavitt. Assessment work was done and recorded by J.P.Leavitt. He has however, sold one fourth intrest to Lee Cox of St. George Utah. One third intrest to Anthony Barumen 2217 Taylor Ave., Ogden Utah. and 4% intrest each to Pat Wilson and William Martin of 657 west 3rd North, Salt Lake Ut. All these have bought their way in either by work or money or both and are all agreed to the proposed project for discovery work.

GEOLOGY

Two faults of considerable displacement are evidenced. Limestone(possibly Twin Creek of Jurassic Age) shows in canyon to the northeast where faulting shows up. Trend of this fault may be through the area where the copper-uranium float is found.

On the southwestern side of the canyon there is considerable overburden and wash with lots of lava boulders littering the slope and little or no outcrops of rock formation exposed in place.

At the point where discovery of large pieces of rich copper float were found a tunnel was driven southwest for about 35 ft. and discloses a crushed zone showing slickensides. In the drag of this presumed fault zone-sandstone and pebbly conglomerate chucks and peices are found that are rich in copper. It is estimated that these will assay from 10% to 15% copper.

All of this copper ore float will give a good reading on both geiger counter and scintillator. No estimate was made of the uranium content. Now none of the copper bearing rock was found in place. The zone is in line with the major faulting system running southerly (and slightly S.E.) from the village of Washingtom, Utah, into Arizona and possibly converging in or near this area with the major Hurricane fault that trends southerly(and slightly S.W.) for over 120 miles.

The faulting at this property is part of the above major fault system and it is also probably that there has been some cross faulting.

THE SUMMARY AND GEOLOGY OF THIS REPORT HAVE BEEN COPPIED FROM AN UNKNOWN ENGIONEERS REPORT THAT WAS GIVEN TO BURT COVINGTON AT THE TIME HE TOOK AN OPTION(NOW EXPIRED) TO BUY. THE PARAGRAPH UNDER TITLE IS MY OWN.

Abull-dozer was hired by Burt Covington to bull-doze some of the looserubble off the hillside to expose the vein. A shelf was cut in the hill about 25ft. wide, 50 ft. long and about 12ft. deep. It is my belief that he got below where the vein should be and it is my desire to drift into the hill until the ore fault is found. And also drift along the fault when found until suficient ore is found in place to warrant discovery and developement and begin to ship ore.

Application for aid in and exploration project to DMEA order 1.
J.P.Leavitt, 1339 south 3rd east Salt Lake Utah.

#5-d Operating experience. J.P.Leavitt will be directing all activities. I have had 20 years experience in mining and prospecting in California, Nevada, and Utah. Although I have not worked continously at mining and prospecting as a trade, I feel that I am throughly competent to handle the work.

RECEIVED
SEP 12 1955

#6

Estimate of cost

Labor per month--$2210.00 estimated 18 months	$39780.00
Material and equipment	4139.53
Total Maximum Costs, plus operating	$43919.53

6-a none. operating costs.

6-b J.P.Leavitt, at $35.00 per day and one extra helper at $25.00 per day. An occasional second helper at$25.00 per day plus a geologist for a report would average out about the same as myself and 2 helpers at $25.00 per day. This would bring the labor cost to about$2210.00 per month. Total cost for 18 months woudl be $39780.00

6-c Operating materials and suplies.

Estimated cost of explosives per foot of 5'x 7' drift in sandstone and shale rock--drilling 5ft. rounds, including cost of powder and fuse and caps.	$2.70
Ventilation cost for fuel per hour	$ .30
Cost of carbide per day	$ .25
Cost of water and fuel haulage per day	$1.50

6-d OPERATING EQUIPMENT.

1 gasoline driven rock drill	$1000.00
1 geep ½ ton truck---used good condition	$750.00
3 picks	13.50
3 shovels	13 .00
1 wheelborrow	30 .00
100 lbs 40% powder	24.50
Caps per 100	2.63
Fuse per 100 ft roll	1.35
3 carbide lights	6.25
Carbide per 100 lbs	9.25
1 mine saw	3 .00
1 axe	4.65
50 lbs nails of misc. sizes	10.00
1 level	6.00
Cap crimpers	1.90
1 tamping stick	1.50
First aid kit, small,	6.50
Misc. tools and equipment	100.00
1 dozen samples sacks	6.00
1 scintillator	498.00
1 sample pick	3.75
1 gasoline operated blower fan 12" size, 1500 c.f.m. capacity	425.00
300 ft. flexable tubing 12"	270.00
600 ft messenger wire for hanging vent tubing.	10.00
cost of assay	$4139.53

3196.78

6-f

1 new building 10 by 15ft. for sleeping quarters requiring 1000 ft of rough lumber $125.00 1 roll of tar paper 5.25 $ $30.25

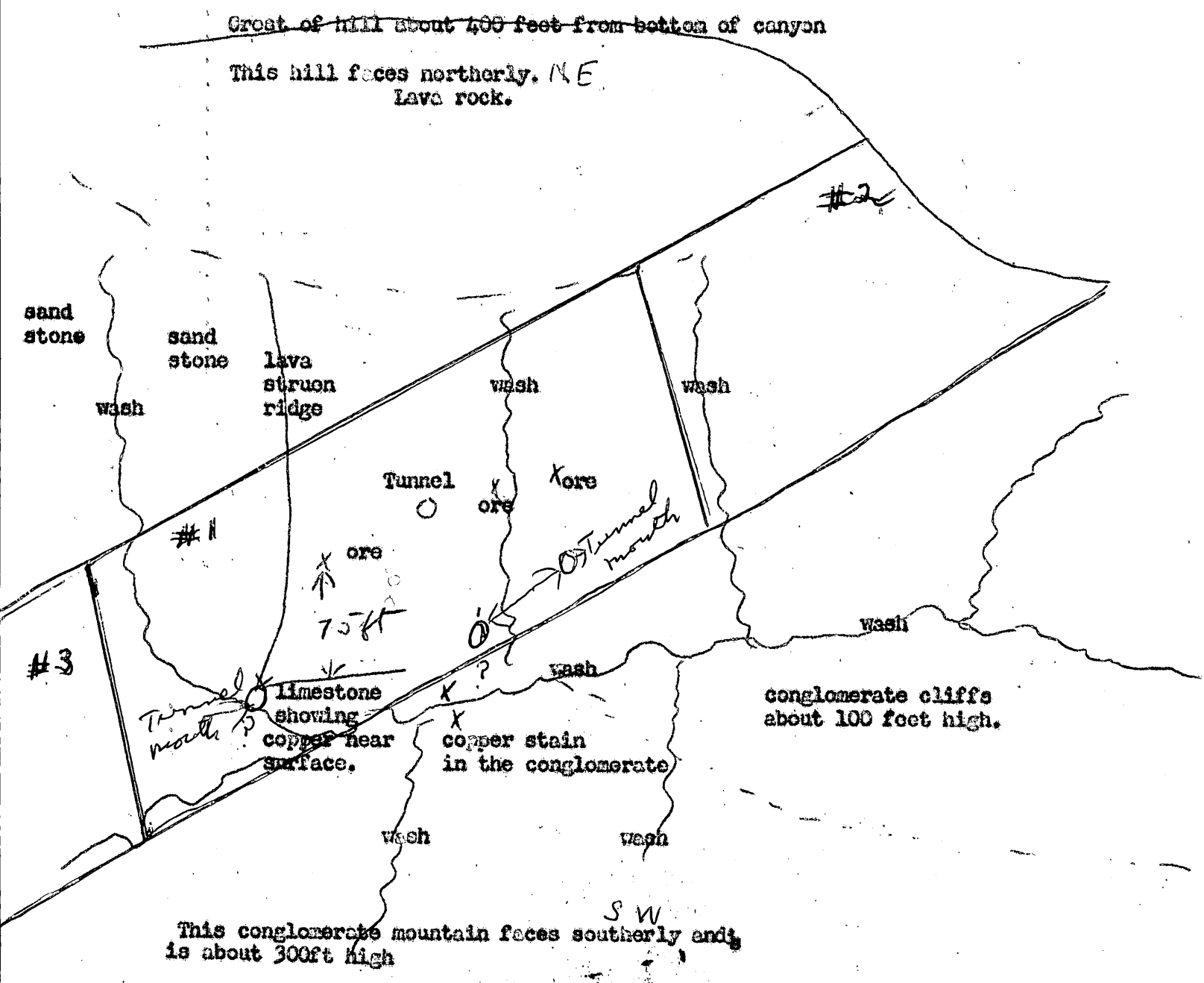
6-g Misc. maintenance

Jeep repair 20.00 per month.
Drill sharpening and replacement $15.00 per Week.
Assay work $15.00 per week.
Accounting $20.00 per month
Workmans compensation incurance and employees liability $125.00 per mo.
Payroll taxes $1.50 per week.

Application for aid in an exploration project, pursuant to DMEA order 1,.
J.P.Leavitt, 1339 South 3rd East, Salt Lake City, Utah.

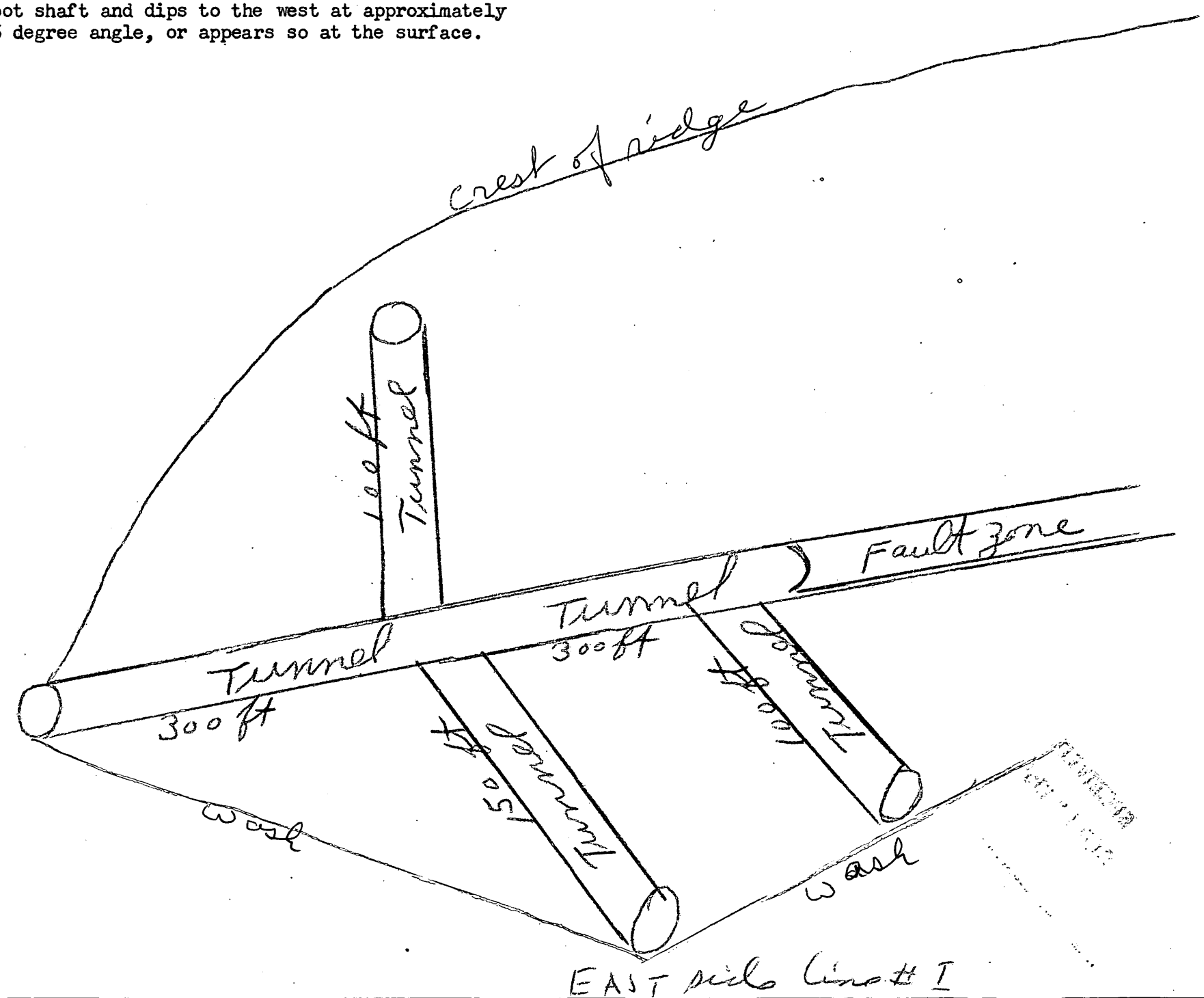
RECEIVED
SEP 12 1955

7-a
The five owners will furnish all labor, under the direction of J.P.Leavitt. Each will contribute at least one third of the money they earn as laborers to the cost of the project. Also any and all equipment they possess will be used, which is very little. Possibly one hundred dollars worth. It is possible that they may be able to contribute the use of one jeep truck if it is still in our possession at that time.
We feel that if we contribute one third to one half of the labor costs, this will more than make up our 25% contrubution. Lee Cox is a contractor and has a bulldozer and truck. His share will be made up by such bulldozing as is needed finishing the road and clearing ramps for tunnels.
This list of equipment is furnished assuming that at no time a probing tunnel will reach beyond a distance 300 feet into the hill side. Beyond this distance a difrent list of equipment would be needed and is sent along in single copy form. However it must be taken into consideration that shippable ore may be incountered before any tunnel is driven even one foot. The map below will explain.



WEST Side Line of #1 Claim

Map shows east side of hill cut away.
Fault zone shows at top of proposed 100
foot shaft and dips to the west at approximately
45 degree angle, or appears so at the surface.



NORTH end line #1

South END line #1

RECEIVED
SEP 12 1955

P. O. BOX 1888
WEST TEMPLE ST.

CERTIFICATE OF ASSAY

RECEIVED SEP 12 1955

TELEPHONE 3-2563

BLACK & DEASON

ASSAYERS AND CHEMISTS

P. Leavitt

SALT LAKE CITY 10, UTAH, July 27, 1955

1339 South 3rd East City

ASSAY PER TON OF 2000 POUNDS

NAME	NO.	OUNCES GOLD	VALUE GOLD PER TON	SILVER OUNCES	WET LEAD %	COPPER %	INSOLUBLE %	ZINC %	Uranium % (U_3O_8)	IRON %	%
						8.10			0.39		

Paid 8/1/55

CHARGES $ 6.00

B. W. Deason Dock

DMEA
Date Rec'd.
SEP 23 1955
BUREAU OF MINES
Denver, Colorado

September 22, 1955

Memorandum

To: W. M. Traver, Executive Officer, DMEA Field Team Region III

From: J. W. Hasler USGS
M. H. Salsbury USBM

Subject: DMEA 3975, (uranium) Joseph Page Leavitt and Partners, Windy Jim claims, Mohave County, Arizona

The above referenced applicant has applied for Government assistance to explore for uranium on three unpatented mining claims in Mohave County, Arizona.

There is not too much information available on the ore potential of this region. The applicant does not seem to be able to express himself clearly in the report, therefore the properties merits cannot be judged solely on the information in the application.

The property may have enough potential to merit a small amount of exploration.

Therefore it is recommended that a field examination be made.

J. William Hasler
J. William Hasler
Geologist

M. H. Salsbury by JWH
M. H. Salsbury
Mining Engineer

JWH/vll

UNITED STATES
DEPARTMENT OF THE INTERIOR
DEFENSE MINERALS EXPLORATION ADMINISTRATION
WASHINGTON 25, D. C.

RECEIVED
SEP 28 1955

September 26, 1955

224 New Customhouse
Denver 2, Colorado

Memorandum

To: Chairman of the Operating Committee, DMEA

From: Field Team, Region III

Subject: Docket DMEA 3975 (Uranium), Joseph Page Leavitt and Partners, Windy Jim Claims, Mohave County, Arizona

Enclosed are four copies of a review made by the Grand Junction Office on the subject application. We concur in the recommendation that a field examination be made.

Our copy of the application is being forwarded for use of the examining engineer.

W. M. Traver
W. M. TRAVER

E. N. Harshman
E. N. HARSHMAN

Enclosures

MF-103
(Revised April 1952)

UNITED STATES DEPARTMENT OF THE INTERIOR
DEFENSE MINERALS EXPLORATION ADMINISTRATION

DMEA
Date Rec'd
SEP 6 1955
BUREAU OF MINES

Form Approved.
Budget Bureau No. 42-R1035.2.

RECEIVED
SEP 12 1955

APPLICATION FOR AID IN AN EXPLORATION PROJECT, PURSUANT TO DMEA ORDER 1, UNDER THE DEFENSE PRODUCTION ACT OF 1950, AS AMENDED

Not to be filled in by applicant

Docket No. DMEA 3975
Metal or Mineral Uranium
Date Received 9-12-55
Estimated Cost 43,919.53
Participation (Government %)

INSTRUCTIONS

1. *Name of applicant.*—(*a*) State here your full legal name, in the form in which you will wish to contract, and your mailing address: Joseph Page Leavitt, 1339 So. 3rd East, Salt Lake Utah. In Partnership with Lee Cox, St. George, Utah. Anthony Berumen, 2217 Taylor Ave, Ogden Utah and William Martin and Pat Wilson of 657 west, 3rd. north. Salt Lake, Utah.

(*b*) If other than an individual, add to your name above whether a corporation, partnership, etc., and the name of the State in which incorporated or otherwise organized: Partnership

(*c*) If a corporation, add to above statement, titles, names and addresses of officers.

(*d*) If a partnership, add to the above statement the names and addresses of all partners. seperate statement under title.

2. *General.*—Read DMEA Order 1, "Government Aid in Defense Exploration Projects," before completing this application. Submit this application and all accompanying papers in quadruplicate (four copies), with your name and address on each sheet of the application and on all accompanying papers. Where sufficient space is not provided on the form for all required information, state it on an accompanying paper, with a reference in each case to the instruction to which it refers by number. Comply with all applicable instructions; or, if not applicable, so state. File the application with Defense Minerals Exploration Administration, Department of the Interior, Washington 25, D. C., or with the nearest field executive officer thereof.

3. *Applicant's property rights.*—(*a*) State the legal description of the land upon which you wish to explore, including all land which you possess or control that may be benefited by the exploration, and excluding any land or interest in land which is not to be included in the exploration project contract "The Windy Jim" Mining Claims #1,2 and 3 are are located approx. 18 miles air line S.40° E. of St. George Utah. They extend end to end 4500 ft. long, 600 ft. wide running in a northerly and southerly direction.

(*b*) State any mine name by which the property is known. "The Windy Jim"

(*c*) State your interest in the land, whether owner, lessee, purchaser under contract, or otherwise Owners

(*d*) If you are not the owner, submit with this application a copy of the lease, contract, or other document under which you control the property.

(*e*) If you own the land, describe any liens or encumbrances on it None

(*f*) If the land consists of unpatented claims, add to the description above, the book and page numbers for each recorded location notice. "Windy Jim"#1 recorded 4-H book of mines, page 320. #2 Book 4-Q of mines page 167 #3 Book 4-Q of mines page 166, At Kingman, Mohave County, Arizona.

4. *Physical description.*—(*a*) Describe in detail any mining or exploration operations which have been or now are being conducted upon the land, including existing mine workings and production facilities. State your interest, if any, in such operations. Also describe accessibility of mine workings for examination purposes. Seperate Report

(*b*) State past and current production, and ore reserves, if any, giving quantities and grades.

(*c*) Describe the geologic features of the property, including mineralization, type of deposit (vein, bedded, etc.), and your reasons for wishing to explore. Illustrate with maps or sketches. Send with your application (but not necessarily as a part of it) any geologic or engineering report, assay maps, or other technologic information you may have, indicating on each whether you require its return to you. Seperate report

(*d*) State the facts with respect to the accessibility of the project: Access roads, distances to shipping, supply and residence points. Seperate report,

(*e*) State the availability of manpower, materials, supplies, equipment, water, and power.

Seperate report.

16—66551-1

5. *The exploration project.*—(*a*) State the mineral or minerals for which you wish to explore Copper and Uranium and copper

(*b*) Describe fully the proposed work, including a map or sketch of the property showing a plan (and cross sections if needed) of any present mine workings, and the location of the proposed exploration work as related to such features as contacts, veins, ore-bearing beds, etc. Seperate map showing proposed workings

(*c*) The work will start within 30 days and be completed within 18 months from the date of an exploration project contract.

(*d*) State the operating experience and background of the applicant with relation to the ability to carry out such exploration project, and also that of the person or persons who will supervise the operations. seperate report

6. *Estimate of costs.*—Furnish a detailed estimate of the costs of the proposed work (you will have to use a separate sheet), under the following headings. Add the totals under all headings to give the estimated total cost of the project: sept.rept.

(*a*) *Independent contracts.*—(Note.—If the applicant does not intend to let any of the work to contractors, write "none" after this item. To the extent that the work is to be contracted, do not repeat the cost of the contract-work in subsequent items.) State the cost of any proposed independent contracts for the performance of all or any part of the work, expressed in terms of units of work (such as per foot of drilling, per foot of drifting, per hour of bulldozer operations, per cubic yard of material moved, etc.). None

(*b*) *Labor, supervision, consultants.*—Include an itemized schedule of numbers, classes and rates of wages, salaries or fees for necessary labor, supervision and engineering and geological consultants. seperate report

(*c*) *Operating materials and supplies.*—Furnish an itemized list, including items of equipment costing less than $50 each, and power, water and fuel. seperate report

(*d*) *Operating equipment.*—Furnish an itemized list of any operating equipment to be rented, purchased, or which is owned and will be furnished by the Operator, with the estimated rental, purchase price, or suggested use-allowance based on present value, as the case may be. seperate report

(*e*) *Rehabilitation and repairs.*—Furnish a detailed list showing the cost of any necessary initial rehabilitation or repairs of existing buildings, installations, fixtures, and movable operating equipment, now owned by the Operator and which will be devoted to the exploration project. None

(*f*) *New buildings, improvements, installations.*—Furnish a detailed list showing the cost of any necessary buildings, fixed improvements, or installations to be purchased, installed or constructed for the benefit of the exploration project. sept. rept.

(*g*) *Miscellaneous.*—Furnish a detailed list showing the cost of repairs to and maintenance of operating equipment (not including initial rehabilitation or repairs of the Operator's equipment), analytical work, accounting, workmen's compensation and employers' liability insurance, and payroll taxes. seperate report.

(*h*) *Contingencies.*—Give an estimate of any necessary allowances for contingencies not included in the costs stated above.

NOTE.—No items of general overhead, corporate management, interest, taxes (other than payroll and sales taxes), or any other indirect costs, or work performed or costs incurred before the date of the contract, should be included in the estimate of costs.

7. (*a*) Are you prepared to furnish your share of the cost of the proposed project in accordance with the regulations on Government participation (Sec. 7, DMEA No. 1)? Yes

(*b*) How do you propose to furnish your share of the costs?

[x] Money [x] Use of equipment owned by you [x] Other Labor

Explain in detail on acompanying paper. seperate report.

CERTIFICATION

The undersigned, whether as an individual, corporate officer, partner, or otherwise, both in his own behalf and acting for the applicant, certifies that the information set forth in this form and accompanying papers is correct and complete, to the best of his knowledge and belief.

Dated 3rd day of Sept., 1955

J. P. Leavitt
(Applicant)

By

Title 18, U. S. Code (Crimes), Section 1001, makes it a criminal offense to make a willfully false statement or representation to any department or agency of the United States as to any matter within its jurisdiction.

U. S. GOVERNMENT PRINTING OFFICE 16—66551-1

Application for aid [redacted] an exploration project toDMEA [redacted]DER 1
J.P.Leavitt, 13[redacted] south, 3rd east, Salt Lake City, Utah.

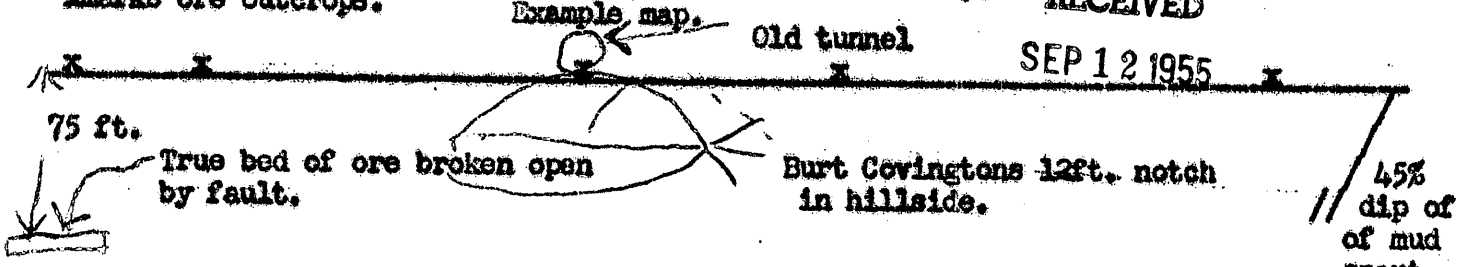
#1 under instructions and b-c-d all answered on orignal instruction sheet. Also #2 and #3 Applicants propertys rights. Please note answer under Title on engineers report 1-d. #3-a -b-c-d-e all answered on orignal sheet. #3-f the land consists of three unpatented claims named the "Windy Jim" #1-2 and 3. "Windy Jim" # 1 is recorded in book 4-H of mines, page#### 320. #2 is recorded in book 4-Q of mines page 167 and #3 is recorded in book 4-Q of mines on page 166. All recorded in Mohave County recorders office, Kingman Arizona.

#4 Physical description—

An old prospector, years ago drove a tunnel into the hill for about 35ft. It is my belief that he got above the ore zone. This year Burt Covington and Associates took took an option to buy, on the claims and had a bull-dozer brought in. They made a road into the claims and cut a notch in the hill-sideabout 12ft deep, 25 ft wide and about 50 ft. long. I think they got below the ore body.

xmarks ore outcrops.

RECEIVED
SEP 12 1955



The old miner cut off the top of the fault zone and went on into the hill, leaving a few pieces of ore, one of which I have had assayed and am sending you the report. Burt Covington cut up to the fault zone but did not cut into it much with the bulldozer. He did however, scratch into it enough so that it appears to me to be an ancient mud spout that carried with it large pieces of ore. This ore was evidently knocked off the sides of a fault and carried to the surface by the mud. That appears to me to have been the mud zoneis about 8 ft wide and about 500 ft long. The mud zone is slightly darker color than the surrounding clays and not strat--afied. While the surrounding clays are slightly stratafied. But they are so near the same color that no one has noticed that they are not of the same material, except myself. The mine is easily accessable.

#4-b there has been no ore shipped as yet. What ore has been found (about a small truck load or 2 tons) has been bulldozed off the mountainside.

#4c Geologic features of the property are fully explained in accompaning engineers report. My desire for further developement are explained by sketch above.

#4-d Access roads are built into the project. It is roughly about 68 miles from Cedar City and about 125 miles from Marysvale Utah.

#4-e Local manpower is plentiful. Material, supplies and equipment, may be either purchased or rented at Salt Lake, Utah. All equipment must be Gasoline powered. Water must be hauled from washington canals or St. George, in wooden barrels or iron ones.

#5-b It is my plan to go down the hill 75 ft. below the present tunnel and drift in with an open 5'x7' tunnel until the mud zone is incountered. Then sink with the fault zone until the solid ore vein is incountered. Then discover what type of ore body it is and notify the DMEA.

Application for aid in a exploration project, pursuant t OMEA 1,
J.P.Leavitt, 1339 So. 3rd East, Salt Lake City, Utah.

RECEIVED
SEP 12 1955

SUMMARY

The "Windy jim" claims are located approximately 18 miles air line S.40° E. of St. George, Utah. In northern Mohave County, Arizona. A fairly good dirt road for 18 miles leads nearly to the claims and then by easy grade for 2 miles by rough jeep road that could be easily and cheaply improved to the claim site where high grade copper-uranium ore float has been found in fault zone but no ### ore can be found in place and therefore no recommendations have been made regarding this project.

TITLE #1-d

The Windy Jim claims are located and recorded under the name of J.P.Leavitt. Assessment work was done and recorded by J.P.Leavitt. He has however, sold one fourth intrest to Lee Cox of St. George Utah. One third intrest to Anthony Barumen 2217 Taylor Ave., Ogden Utah. and 4% intrest each to Pat Wilson and William Martin of 657 west 3rd North, Salt Lake Ut. All these have bought their way in either by work or money or both and are all agreed to the proposed project for discovery work.

GEOLOGY

Two faults of considerable displacement are evidenced. Limestone(possibly Twin Creek of Jurassic Age) shows in canyon to the northeast where faulting shows up. Trend of this fault may be through the area where the copper-uranium float is found.

On the southwestern side of the canyon there is considerable overburden and wash with lots of lava boulders littering the slope and little or no outcrops of rock formation exposed in place.

At the point where discovery of large pieces of rick copper float were found a tunnel was driven southwest for about 35 ft. and discloses a crushed zone showing slickensides. In the drag of this presumed fault zone-sandstone and pebbly conglomerate chucks and peices are found that are rich in copper. It is estimated that these will assay from 10% to 15% copper.

All of this copper ore float will give a good reading on both geiger counter and scintillator. No estimate was made of the uranium content. Now none of the copper bearing rock was found in place. The zone is in line with the major faulting system running southerly (and slightly S.E.) from the village of Washingtom, Utah, into Arizona and possibly converging in or near this area with the major Hurricane fault that trends southerly(and slightly S.W.) for over 120 miles.

The faulting at this property is part of the above major fault system and it is also probably that there has been some cross faultimg.

THE SUMMARY AND GEOLOGY OF THIS REPORT HAVE BEEN COPPIED FROM AN UNKNOWN ENGIONEERS REPORT THAT WAS GIVEN TO BURT COVINGTON AT THE TIME HE TOOK AN OPTION(NOW EXPIRED) TO BUY. THE PARAGRAPH UNDER TITLE IS MY OWN.

Abull-dozer was hired by Burt Covington to bull-doze some of the looserubble off the hillside to expose the vein. A shelf was cut in the hill about 25ft. wide, 50 ft. long and about 12ft. deep. It is my belief that he got below where the vein should be and it is my desire to drift into the hill until the ore fault is found. And also drift along the fault when found until suficient ore is found in place to warrant discovery and developement and begin to ship ore.

Application for aid in [illegible] and exploration project to DMEA. [illegible]der 1.
J.P.Leavitt, 1339 south [illegible]rd east Salt Lake Utah.

#5-d Operating experience. J.P.Leavitt will be directing all activities. I have had 20 years experience in mining and prospecting in California, Nevada, and Utah. Although I have not worked continously at mining and prospecting as a trade, I feel that I am throughly competent to handle the work.

RECEIVED

SEP 12 1955

#6

Estimate of cost

Labor per month--$2210.00 estimated 18 months ---------- $39780.00
Material and equipment ---------- $4139.53
Total Maximum Costs, plus operating ---------- $43919.53

6-a none. operating costs.

6-b J.P.Leavitt, at $35.00 per day and one extra helper at $25.00 per day. An occasional second helper at $25.00 per day plus a geologist for a report would average out about the same as myself and 2 helpers at $25.00 per day. This would bring the labor cost to about $2210.00 per month. Total cost for 18 months woudl be $39780.00

6-c Operating materials and suplies.

Estimated cost of explosives per foot of 5'x 7' drift in sandstone and shale rock--drilling 5ft. rounds, including cost of powder and fuse and caps.	$2.70
Ventilation cost for fuel per hour	$ .30
Cost of carbide per day	$ .25
Cost of water and fuel haulage per day	$1.50

6-d OPERATING EQUIPMENT.

1 gasoline driven rock drill	$1000.00
1 geep ½ ton truck--used good condition	$750.00
3 picks	13.50
3 shovels	13 .00
1 wheelborrow	30 .00
100 lbs 40% powder	24.50
Caps per 100	2.63
Fuse per 100 ft roll	1.35
3 carbide lights	6.25
Carbide per 100 lbs	9.25
1 mine saw	3 .00
1 axe	4.65
50 lbs nails of misc. sizes	10.00
1 level	4.00
Cap crimpers	1.90
1 tamping stick	1.50
First aid kit, small,	6.50
Misc. tools and equipment	100.00
1 dozen samples sacks	6.00
1 scintillator	498.00
1 sample pick	3.75
1 gasoline operated blower fan 12" size, 1500 c.f.m. capacity	425.00
300 ft. flexable tubing 12"	270.00
600 ft messenger wire for hanging vent tubing.	10.00
cost of assay	$4139.53

6-f

1 new building 10 by 15ft. for sleeping quarters requiring 1000 ft of rough lumber $125.00 1 roll of tar paper 5.25 $ 130.25

6-g Misc. maintenance

Jeep repair 20.00 per month.
Drill sharpening and replacement $15.00 per week.
Assay work $15.00 per week.
Accounting $20.00 per month
Workmans compensation incurance and employees liability $125.00 per mo.
Payroll taxes $1.50 per week.

Application for aid in an exploration project, pursuant to DMEA order 1,.
J.P.Leavitt, 1339 South 3rd East, Salt Lake City,Utah.

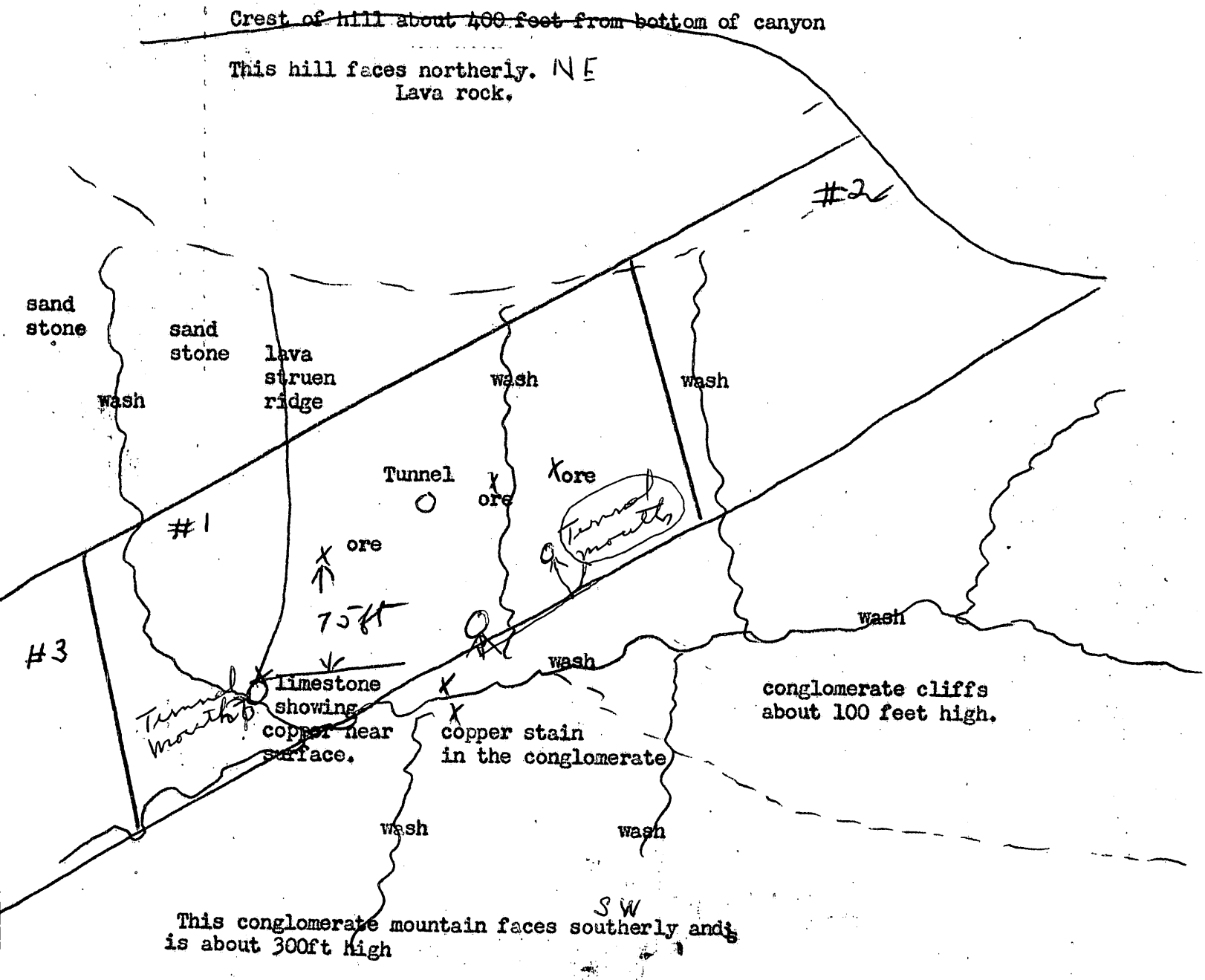
RECEIVED
SEP 12 1955

7-a

The five owners will furnish all labor, under the direction of J.P.Leavitt. Each will contribute at least one third of the money they earn as laborers to the cost of the project. Also any and all equipment they possess will be used, which is very little. Possibly one hundred dollars worth. It is possible that they may be able to contribute the use of one jeep truck if it is still in our possession at that time.

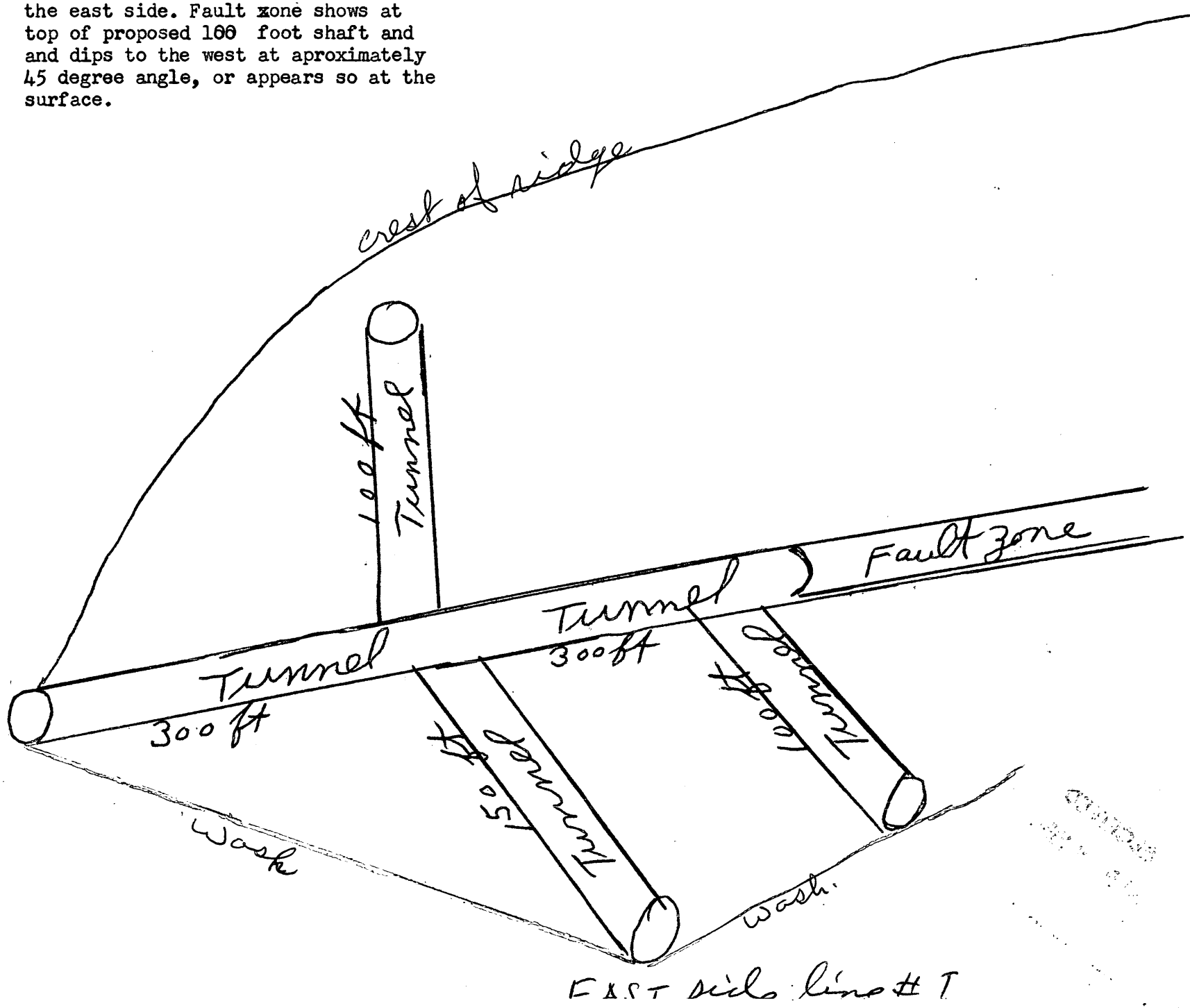
We feel that if we contribute one third to one half of the labor costs, this will more than make up our 25% contrubution. Lee Cox is a contractor and has a bulldozer and truck. His share will be made up by such bulldozing as is needed finishing the road and clearing ramps for tunnels.

This list of equipment is furnished assuming that at no time a probing tunnel will reach beyond a distance 300 feet into the hill side. Beyond this distance a difrent list of equipment would be needed and is sent along in single copy form. However it must be taken into consideration that shippable ore may be incountered before any tunnel is driven even one foot. The map below will explain.



WEST Side Line of #1 Claim

Map shows half of hill cut away on the east side. Fault zone shows at top of proposed 100 foot shaft and and dips to the west at aproximately 45 degree angle, or appears so at the surface.



NORTH end line #1

South END line #1

P. O. BOX 1888
65 SOUTH WEST TEMPLE ST.

CERTIFICATE OF ASSAY

BLACK & DEASON

ASSAYERS AND CHEMISTS

TELEPHONE 3-2563

RECEIVED
SEP 12 1955

J. P. Leavitt

SALT LAKE CITY 10, UTAH, July 27, 1955

1339 South 3rd East City

ASSAY PER TON OF 2000 POUNDS

NAME	NO.	OUNCES GOLD	VALUE GOLD PER TON	SILVER OUNCES	WET LEAD %	COPPER %	INSOLUBLE %	ZINC %	Uranium as (U_3O_8) %	IRON %	%
						8.10			0.39		

CHARGES $ 6.00

Paid 8/11/55

Black & Deason Docket

September 7, 1955

224 New Customhouse
Denver 2, Colorado

Memorandum

To: Secretary to The Operating Committee, DMEA

From: Executive Officer, DMEA Field Team, Region III

Subject: Application for DMEA aid (Uranium), Joseph Page Leavitt and partners, Windy Jim Mine Area, Mohave County, Arizona

Enclosed are two copies of the subject application in the amount of $43,919.53.

One copy of the application has been forwarded to the Grand Junction office for study and recommendations.

W. M. Traver

W. M. Traver

Enclosures

UNITED STATES
DEPARTMENT OF THE INTERIOR
DEFENSE MINERALS EXPLORATION ADMINISTRATION
WASHINGTON 25, D. C.

RECEIVED
SEP 12 1955

September 7, 1955

204 New Customhouse
Denver 2, Colorado

Memorandum

To: J. W. Hegler

From: Executive Officer, DMEA Field Team, Region III

Subject: Application for DMEA aid (Uranium), Joseph Page Leavitt and partners, Windy Jim Mine area, Mohave County, Arizona

Enclosed is a copy of the subject application in the amount of $4,919.53.

Please study this application and discuss it with the AEC and Bureau of Mines representatives in Grand Junction and forward this office eight copies of your recommendations regarding a field examination of the property.

W. M. Traver

Enclosures

Jc:ab
cc: Sec. Oper. Comm. (4)
Harshman
Docket
Chron.