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File  
Tucson Office

October 2, 1972

John E. Kinnison  
Tucson Office

File  
Blue

Western Maricopa County  
Reconnaissance

Early in 1971 Mr. Mel See conducted a reconnaissance of several areas where color anomalies had been seen by aerial reconnaissance, or for which other reasons existed to warrant examination. His report and sketch maps are herewith placed in the file for record. The results were reported at the time in our monthly reports.

The area study around the Dixie Mine and south into Arlington Valley was made largely to check possibilities existing in a property submittal, data on which is contained in our files under the Dixie Mine file. The area between the Dixie south to the railroad was optioned to Norandex, who reportedly has dropped the property a few months ago. Mr. See's reconnaissance and report also include an area around the Waiva Hills and Tabletop Mountain in Pinal County, which is cross referenced to this file.

Claims which have been recently staked south of Harqua <sup>Station</sup> ~~Street~~ on the railroad by Lloyd Frost and associates have been placed September 28, 1972. On the basis of chalcopryite in drill core, the area appears worth examination, particularly as it lies just west of Mr. See's former reconnaissance. Data on this submittal is filed under the file for the Frost Copper Prospect.

/fn

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/fn

## FIELD WORK SUMMARY

by

Melville See

### MariCopa County:

Field work was undertaken February 23, 1971, through February 26, 1971, to check possible alteration zones observed by John Kinnison from aerial reconnaissance. Negative results were obtained from the ground examinations. The following summarizes the findings:

The Buckeye Hills (Sketch Map No. 1) are composed of a fresh fine-grained leucocratic granite, generally gneissic and locally pegmatitic. Numerous prospect pits and cuts bisect the granite showing where muscovite mica pods have been mined. Immediately to the west, between Highway 80 and the Powerline road, small elongated red-color zones occur in probable laramide granite. The red color is confined to fracture zones within the granite where iron migration has taken place. These red zones are not attributed to the presence of former sulphide mineralization and no alteration was observed. Copper geochemical values were low and further work does not seem warranted.

Several miles west of Buckeye Hills, another possible alteration area (Sketch Map No. 2) was examined. The area, composed of granite and gneiss, was not found to be altered and copper geochemical values were low.

A traverse by a four-wheel vehicle was made across the Arlington Valley (Sketch Map No. 3) from east to west to check for any alteration. In addition, the following prospects in the area--shown on the 15-minute quadrangle map--were examined:

The Buckeye copper mine occurs in slate and schist with pyrite mineralization occurring along north-south fractures, dipping 60° east. No potential for exploration exists.

The Harcan mine, one half mile west, evidenced weak pyrite mineralization in gneiss with no potential.

At the Idazona mine, traces of copper staining occur in arkoses, quartzite and argillite with no evidence of alteration or former sulphides.

Further west along the Arlington Valley, post-mineral volcanics cover the valley floor. The remnants of a basalt flow, such as Black Butte, rise above the valley. Immediately to the north and east of Black Butte, small knolls of granite barely crop out through the alluvial cover. The granite is fine-grained and fractured along a northeast direction. Small quartz veins, with copper oxides, occur in some of these fracture zones, such as at the Butte mine. However, geochemical sampling of the few granite exposures gave consistently low copper values, indicating the

mineralization to be restricted with barren granite between. Possible extension of the granite beneath the volcanics is probable, but no further work is warranted on the basis of the sampling done.

Further west, along the Aqua Caliente Road, copper mineralization occurs in volcanics (Sketch Map No. 4). At the Jackpot Mine, copper carbonates occur with calcite and some silicification of the volcanics, but the mineralized area appears very restricted, with little or no tonnage potential.

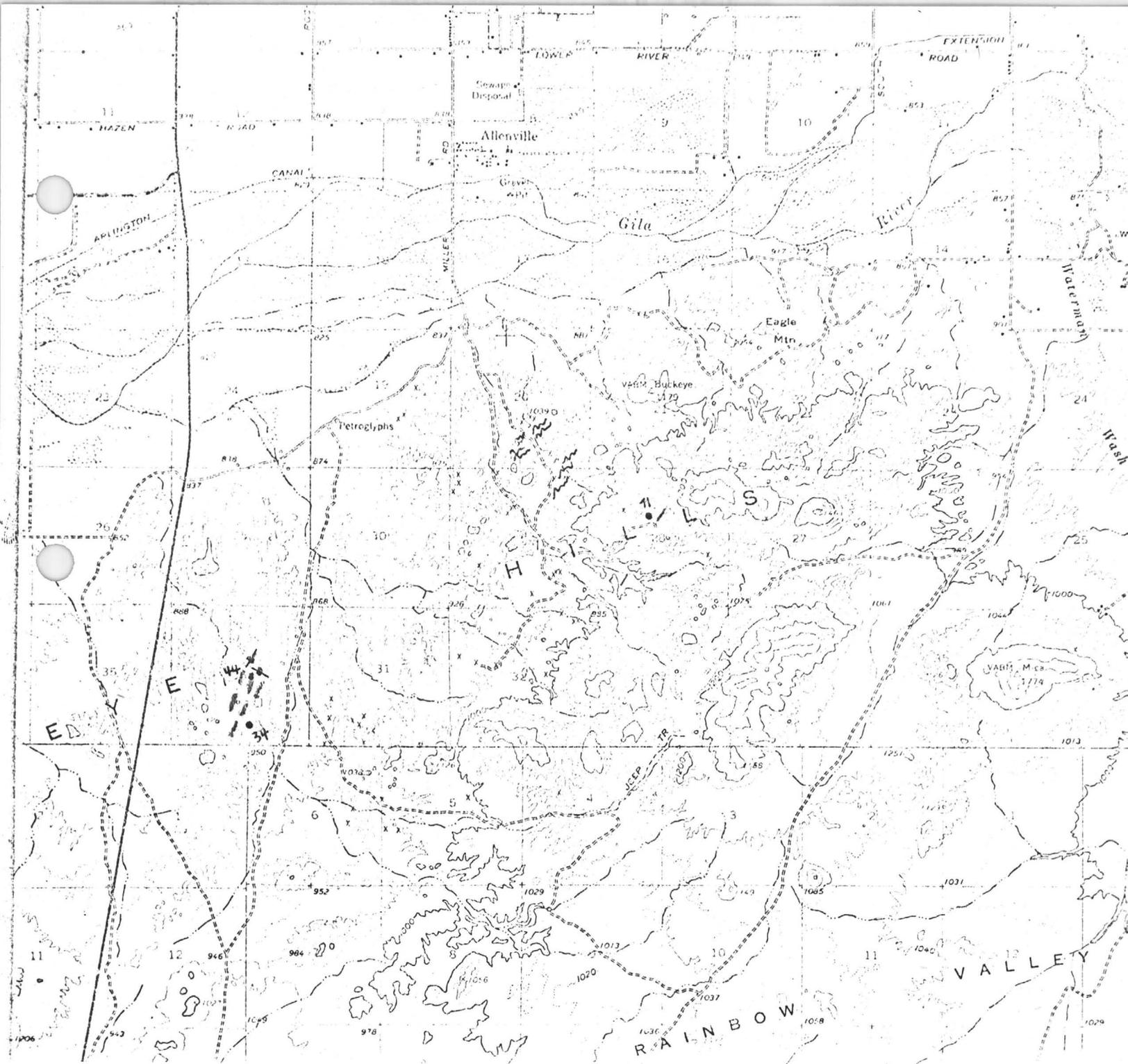
One mile west of the Jackpot mine, the Dixie mine shows copper oxide mineralization in and along a rhyolite dike (one foot wide) which has intruded a volcanic along a fault. The dike-volcanic contact dips about 30° to the south. A volcanic breccia, exposed by a recent roadcut, was sampled and gave a very low copper value. Although the Dixie mine area has recently been bulldozed and restaked, the mineralization appears to be limited to the immediate zone of the rhyolite dike-volcanic contact, and hence has a very small tonnage potential.

Saddle Mountain (Sketch Map No. 5) is composed of gently-dipping volcanics flanked on the north and east by deeply-dipping gneiss. In the immediate area of the Palo Verde mine, there is a red-color zone, several hundred feet wide in the gneiss. The gneiss here is highly silicified, almost jasperoidal in appearance. However, there is no evidence of disseminated sulphide mineralization or alteration other than silicification. The Palo Verde shaft shows copper oxide mineralization along an eastward-dipping, narrow quartz vein in the gneiss. The small size of the color zone and its poor appearance do not warrant further investigation.

#### Pinal County:

On March 3rd and 4th, 1971, the Vaiva Hills area on the Papago Reservation in Pinal County was examined to find if more altered pre-E granite might exist exposed under the post-mineral volcanic cover. No more leads were found.

A brief reconnaissance was also made of the copper prospects on the west flank of the Table Top Mountains adjacent to the Papago Indian Reservation. A fracture zone, several hundred feet wide, trending northeast over a strike length of about 1000 feet was found cutting the gneissic country rock. Strong folding and numerous fracture sets, striking northeast, northwest and eastwest characterize the zone. Here, bulldozer cuts have exposed sporadic copper oxide showings in the gneiss along the fractures and in small quartz veinlets. A geochemical sample, in the fracture zone, between copper showings gave 6 ppm copper. It is concluded that strong structural control has localized weak secondary copper showings with no exploration potential. Adjacent gneissic country rock appears fresh with little or no silicification.



Sketch Map # 1



Laramide granite



Fe staining



Cu oxide along fracture



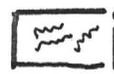
Prospect pit (for mica)



Vertical Joint



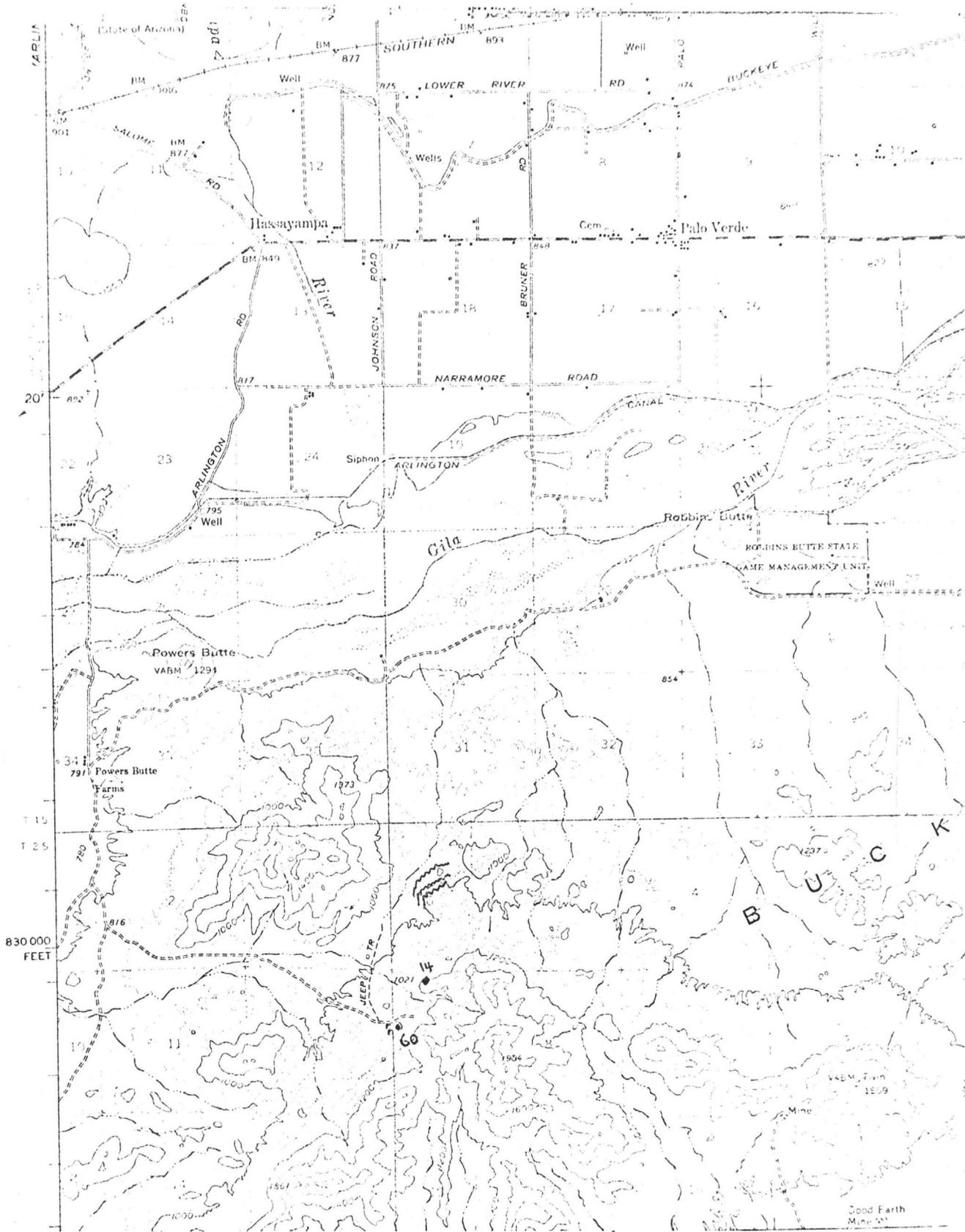
Geochemical rock chip sample  
w/ copper value in ppm



Gneiss zones



1" = 1 mile



Sketch Map # 2



granite



gneiss

- geochemical rock chip sample with value of copper in ppm



1" = 1 mile



Sketch Map # 3

-  Alluvial gravels etc.
-  Post-mineral volcanics
-  Arkoses, quartzite
-  Granite (Pre e ?)
-  Gneiss & schist

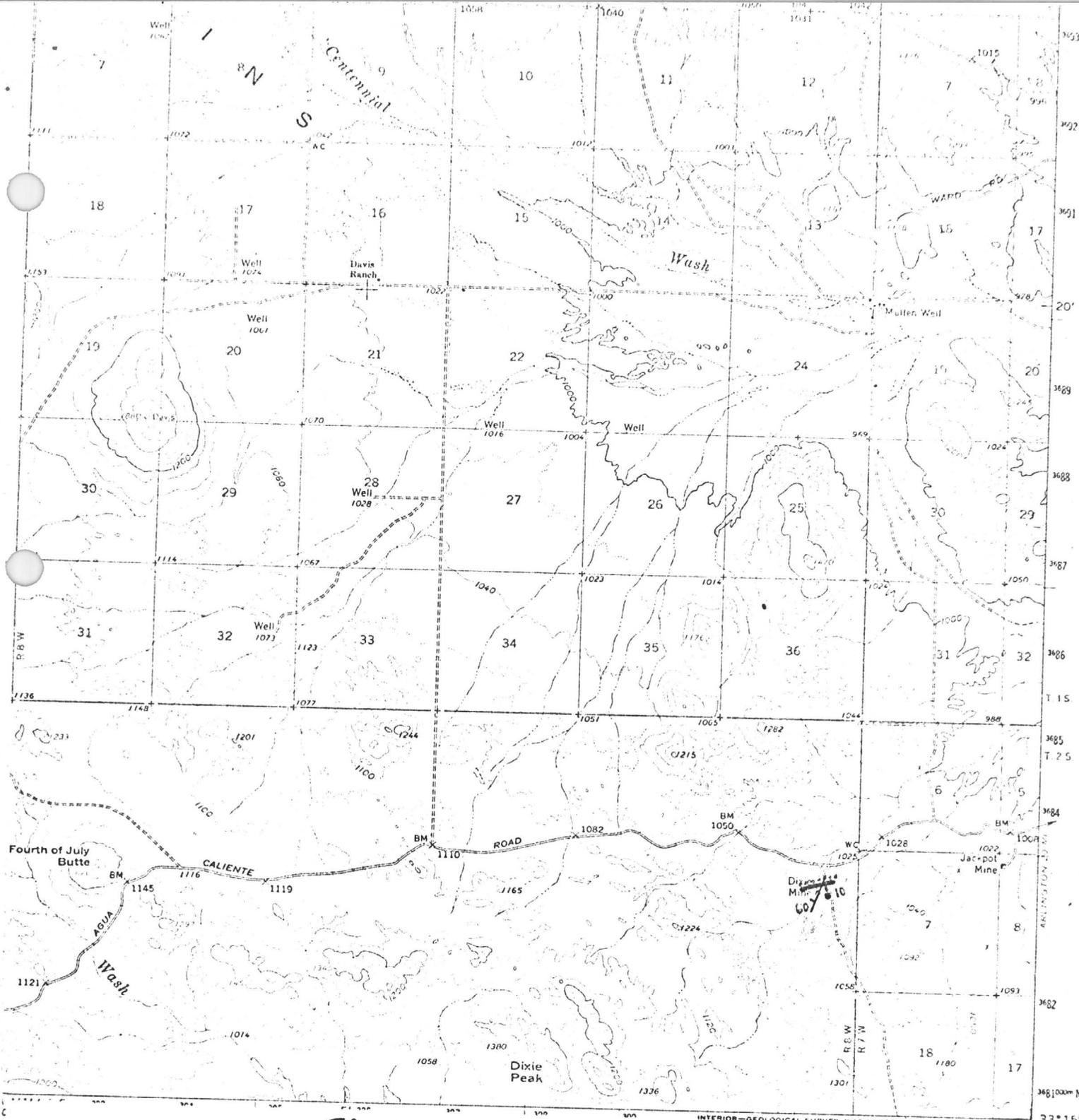
 Fracture

 Geochemical rock chip sample with Cu value in ppm

 Fracture with Cu oxide



1" = 1 mile



Sketch Map # 4

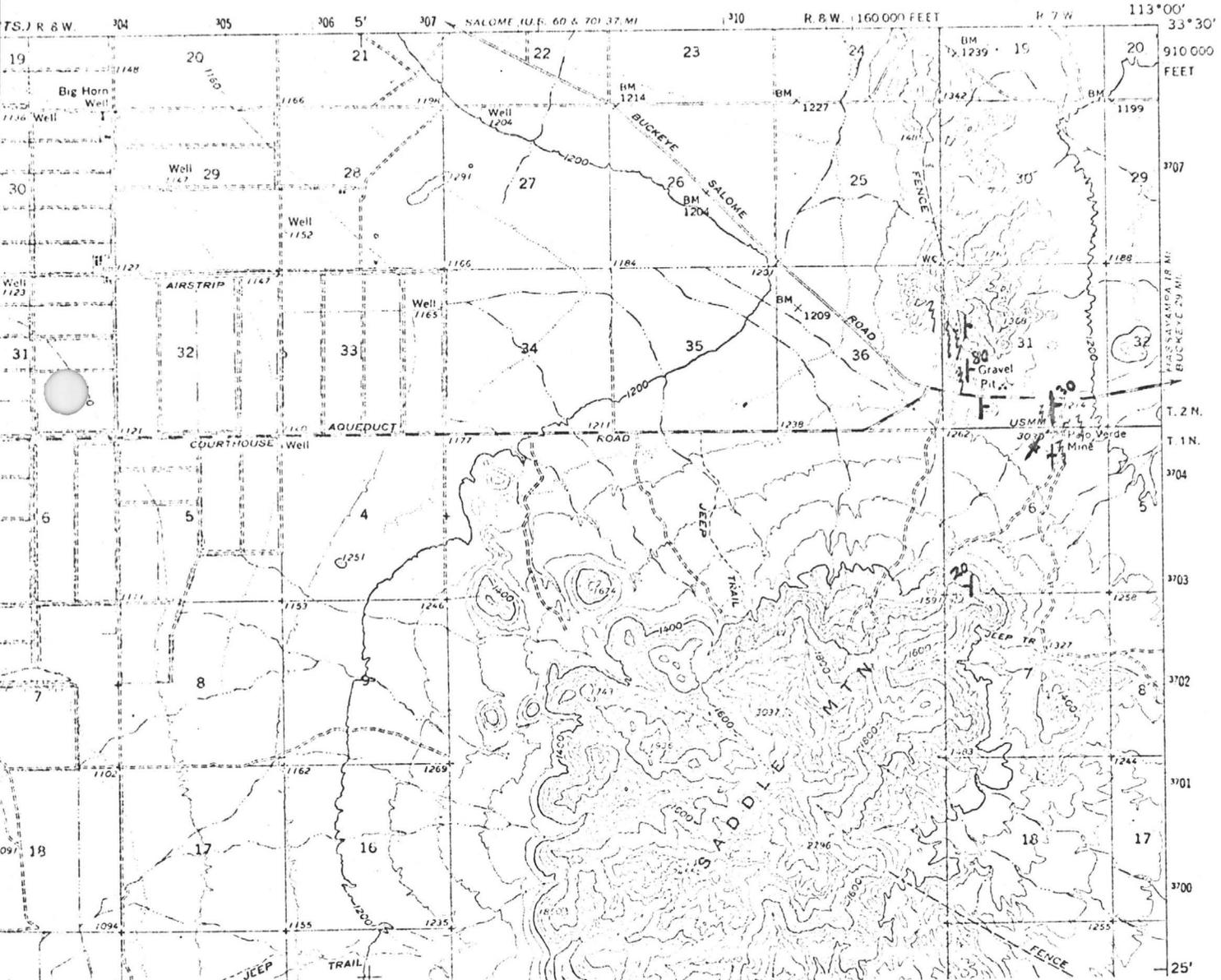
- Volcanic rock
- Rhyolite dike
- Fault
- Cu oxide
- Geochemical rock chip sample with Cu value in ppm



1" = 1 mile

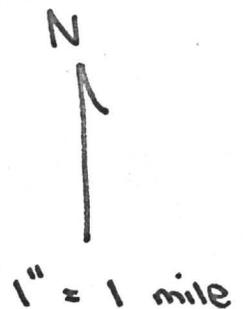
CORTEZ PEAK QUADRANGLE  
 ARIZONA—MARICOPA CO.  
 15 MINUTE SERIES (TOPOGRAPHIC)

3-5-31  
 (BELMONT MTS.)



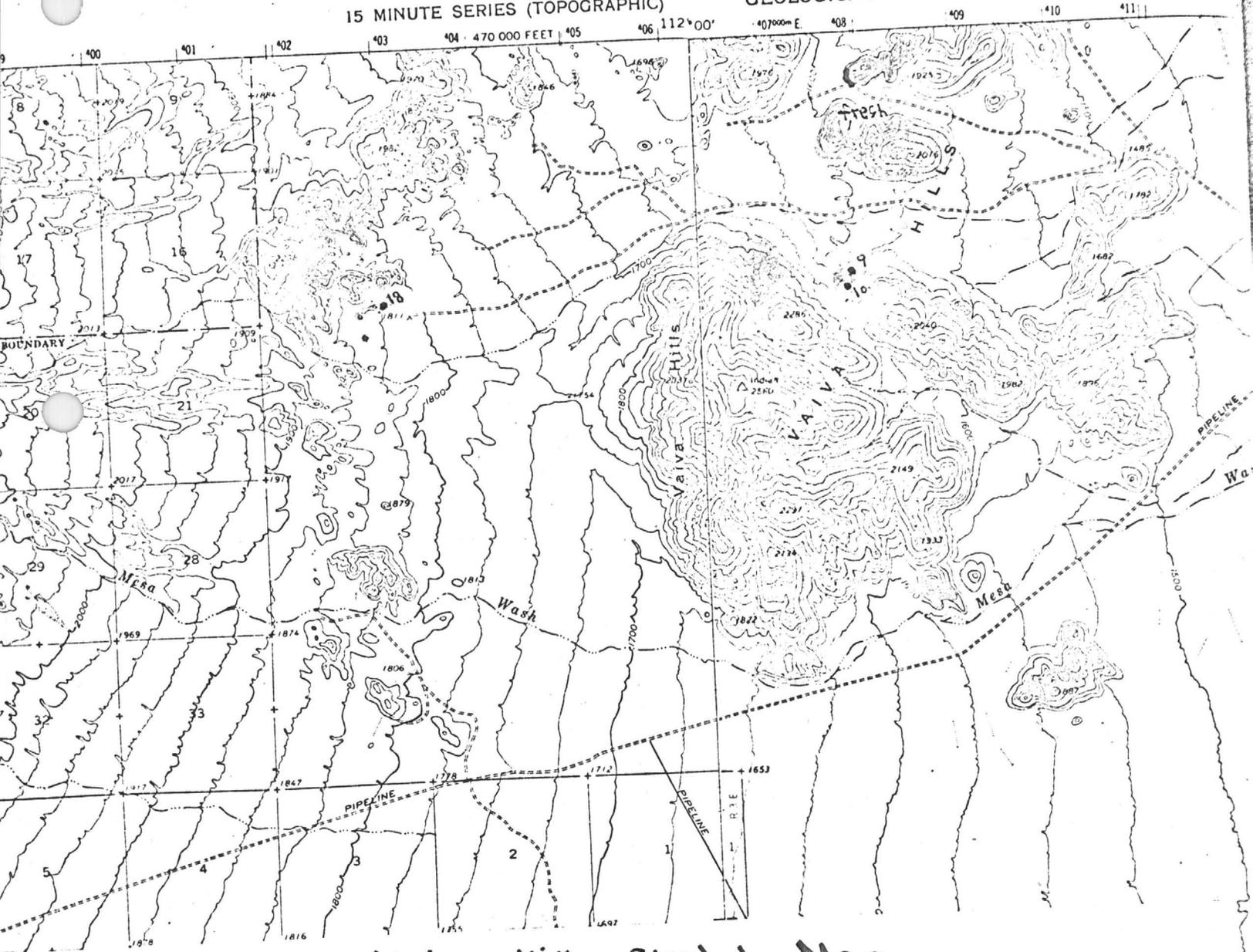
Sketch Map # 5

-  Volcanic rock
-  Quartz vein with Cu oxide
-  Fe stain & silicification
-  dip symbol
-  Gneiss
-  joint



VEKOL MOUNTAINS QUADRANGLE  
ARIZONA  
15 MINUTE SERIES (TOPOGRAPHIC)

UNITED STATES  
DEPARTMENT OF THE INTERIOR  
GEOLOGICAL SURVEY



Vaiva Hills Sketch Map

-  Post mineral volcanics
-  Apache Group
-  Pre E granite
-  Alteration

• Geochemical rock chip  
sample w/ copper value  
in ppm

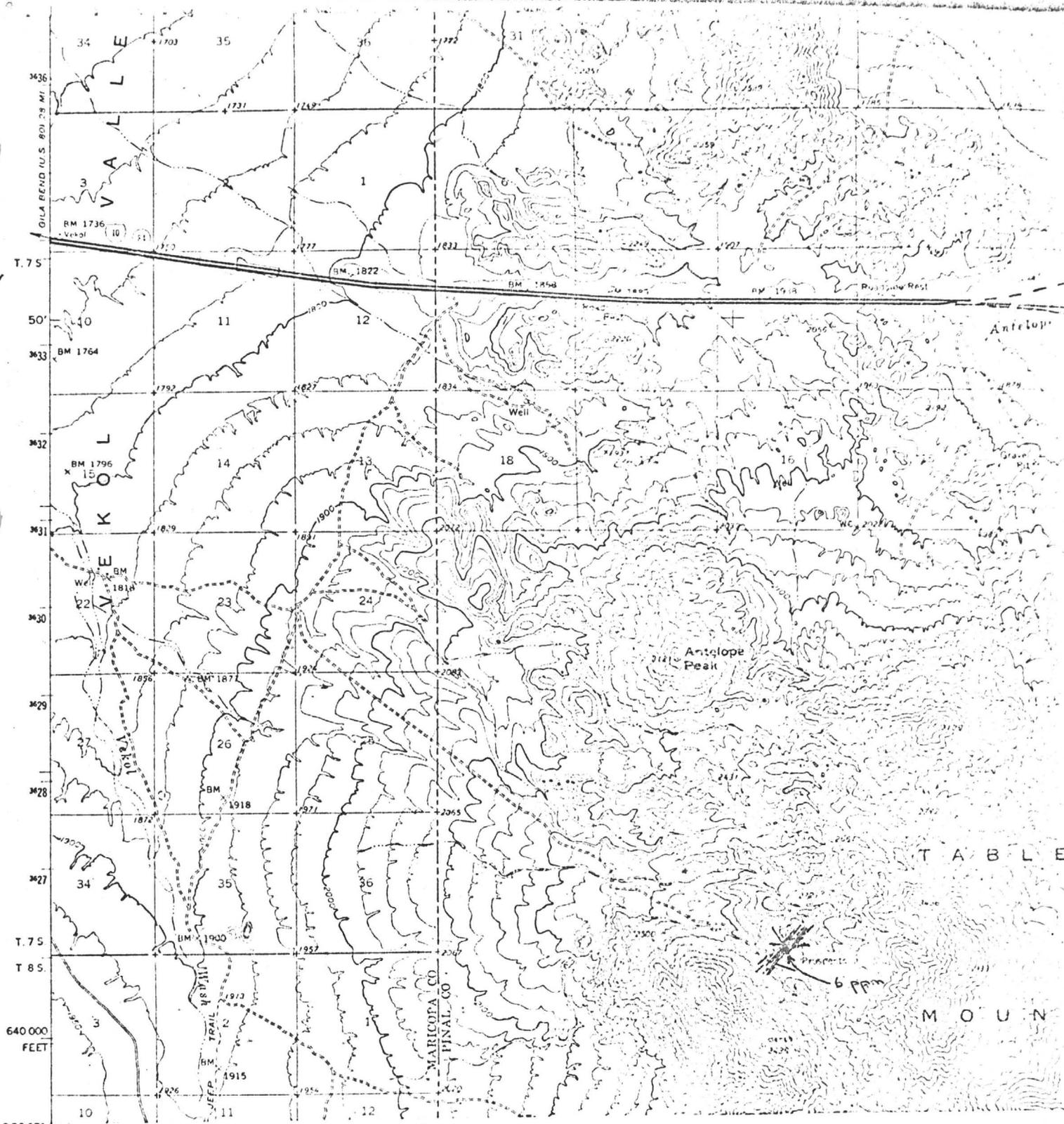


Table Mt Sketch Map

-  Gneiss
-  Silicified Zone
-  Shear Zone
-  Cu oxide

o Geochemical rock  
chip sample with  
Cu value in ppm



1" = 1 mile

PORPHYRY COPPER EXPLORATION  
SAND TANK VOLCANIC FIELD

J. E. Kimmison

8/16/66

3-7-21.1  
Sand Tank Porphyry Copper  
(Report)  
Maricopa County  
Arizona

AMERICAN SMELTING AND REFINING COMPANY  
Tucson Arizona

September 28, 1966

Mr. K. E. Richard, Chief Geologist  
American Smelting and Refining Company  
120 Broadway  
New York, N. Y. 10005

Dear Sir:

Enclosed is Mr. Kinnison's compilation of geological reconnaissance map coverage in the Sacaton-Sand Tank Mountain region and his recommendations for extending the field work southwesterly into land withdrawn for military use and into Papago Reservation land.

These areas lie within a broad southwest trending belt of porphyry copper occurrences which Kinnison has labeled the "Ray-Miami zones" (see map accompanying JEK memo).

Ground reconnaissance on the Papago Reservation southwest of the old Reward and Greenback Mines is currently being carried out by Mr. Sell. Later he will work north of the Papago Reservation in the military reserve wherever access can be gained. Should a prospect of definite interest be turned up, then an attempt to acquire the necessary land could be initiated.

Yours very truly,

  
J. H. COURTRIGHT

JHC/kw

Enclosure

cc: WESaegart

JDSell

JEKinnison ✓

AMERICAN SMELTING AND REFINING COMPANY  
Tucson Arizona

August 16, 1966

MEMORANDUM TO J. H. COURTRIGHT

PORPHYRY COPPER EXPLORATION  
SAND TANK VOLCANIC FIELD

Porphyry copper exploration in Arizona has been generally limited in recent years to particular "mineral zones" which contain the known copper deposits. These zones, which we have discussed verbally, and which I sketched on the Sacaton memorandum of 2/13/61 (Blucher and Kinnison to Richard), serve to give priority in exploration. Three of particular note in company exploration are: two which trend northeast--the Miami and Ray zones--and the Silver Bell zone which trends northwest. The Miami and Ray mineral zones are close together and parallel, so that they have been treated as one during recent exploration. On the attached map (A), I have plotted the limits of reconnaissance mapping which has been done near these mineral zones by company geologists.

The Ray and Miami zones (combined), if projected southwest, pass through the region of Ajo. Between Sacaton and Ajo there are no operating mines, and most of the mountain ranges in that region are made of post-ore volcanics.

The subject region, which I here call the Sand Tank Volcanic Field for convenient use, is formed of connected plateaus and peaks. The terrain has been formed principally by erosion of flat-lying post-ore volcanic rocks. Erosion has incised beneath these in many places, and thus creating numerous small exposures of pre-mineral bedrock. I believe the chances to find a virgin porphyry copper deposit in this region to be very good. My reasons for this belief have been summarized above, and are: (1) that the Sand Tank region lies along a major mineral belt between Sacaton and Ajo, and (2) that although the volcanic cover dominates, erosion has produced small outcrops of pre-ore rock.

Mr. Sell initiated reconnaissance on the east side of the Sand Tank region (Attachment A), at Table Top Mountain, and has extended his mapping into most of the Sand Tank Mountains. Other reconnaissance has been made along the eastern part, where Newmont's new prospect is currently being drilled, but much more has not yet been mapped or seen.

The land status is not appealing, but neither do I regard it as a status which is completely final. The Papago Indian land is currently in a state of policy change. The military withdrawals are final, insofar as any federal executive order may be so considered. Part of the military withdrawal may be entered for reconnaissance (as shown on Attachment A).

August 16, 1966

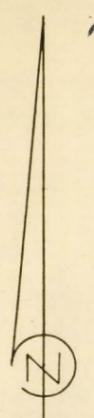
Mr. Whaley has made a preliminary investigation in regard to military land access, and his memoranda are appended for reference. His inquiries were avoided each time with a "you can't do this" attitude. The local military base commanders do not have authority to do other than follow the appropriate executive orders now existing, nor do they appear to have legal knowledge of any exceptions which might exist. To my knowledge no one has ever placed a request for ammendment to the existing executive orders through legislative or executive channels in Washington.

JOHN E. KINNISON 

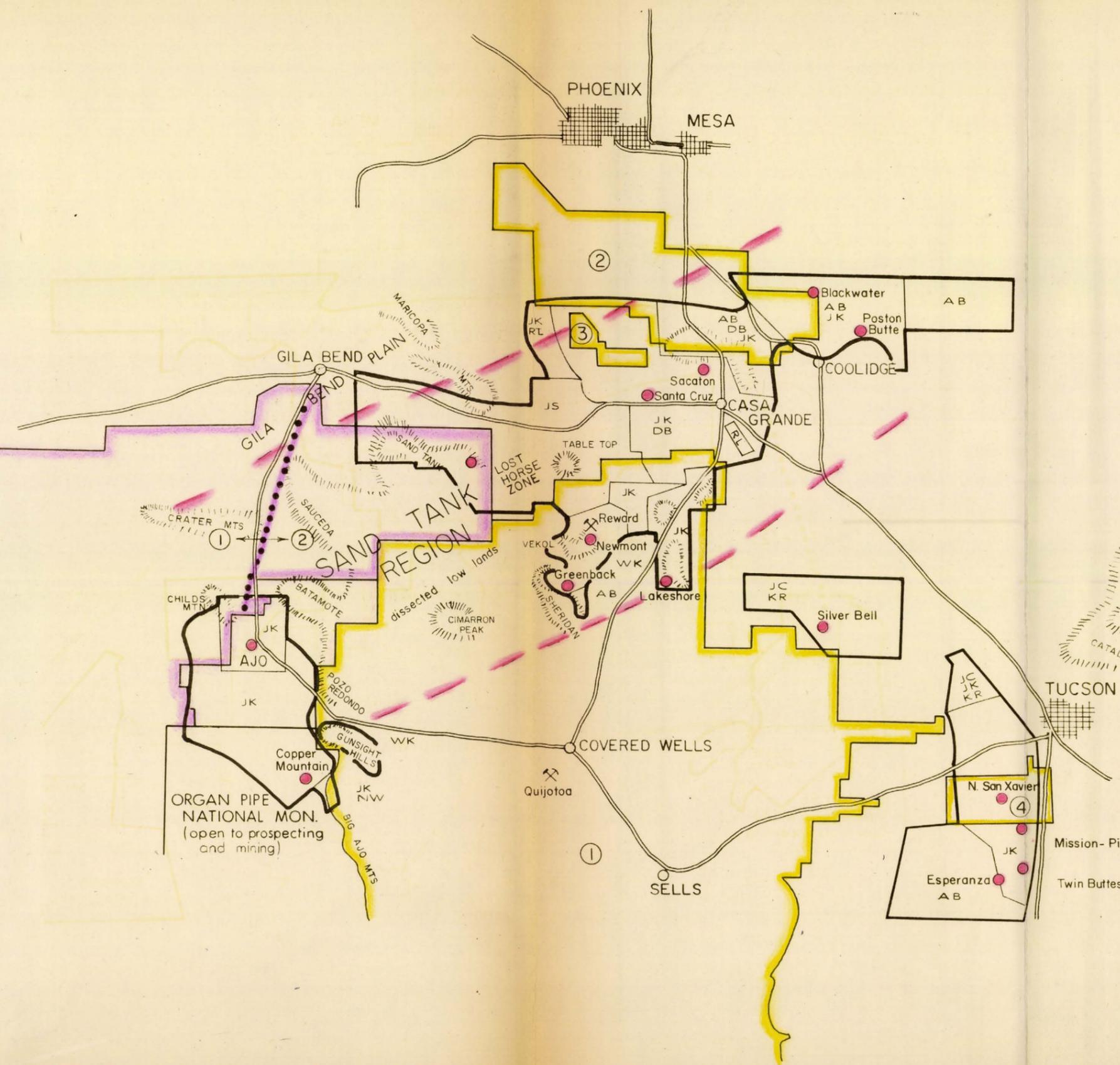
JEK/pjc

Attachments

cc: JHCourtright, 2X  
WESaegart, w/ attachments



- Porphyry Copper Deposit
- ⌘ Mine or District of General Significance
- Limits of Prospective Zone (Ray and Miami Zones Combined)
- Mapped by ASARCO (Initials for file ref.)
- Military Land
  - ① Bombing and Gunnery
  - ② Air Practice (permission to enter parts)
- Indian Reservation
  - ① Papago
  - ② Gila
  - ③ Maricopa
  - ④ San Xavier



Reference for Initials	
Geologist	Abbreviation
David Beck	DB
A. G. Blucher	AB
J. H. Courtright	JC
J. E. Kinnison	JK
W. L. Kurtz	WK
Robert Lunning	RL
J. D. Sell	JS
Kenyon Richard	KR
N. P. Whaley	NW

MAPPING STATUS  
 SAND TANK VOLCANIC FIELD  
 Scale 1" = 15 miles approx.  
 JEK June '66

AMERICAN SMELTING AND REFINING COMPANY  
Tucson Arizona

April 2, 1964

MEMORANDUM TO J. E. KINNISON *JK*

SOUTHWESTERN ARIZONA  
ACCESS INVESTIGATIONS

Since your original interest in this area stimulated my desire to see it and prompted the subsequent investigations of accessibility I thought you might be interested in a resume of the inquires to date.

March 11, 1964: Call to Col. Moore, Base Condr., Luke AF Base. Col. Moore was absent so consequent conversation w/Col. R. B. Cypert (ci'prit), Vice Comdr. My affiliation was identified and a request for permission for access made. Although he was cooperative, he stated he could not grant such permission. However, he would present the request to Col. Moore and their legal advisors. Suggested I call back in a few days.

March 16, 1964: Visit to Col. Cypert at Luke AF Base. Pleasant discussion, w/my stated position that of desiring to observe local structural relationships for support of regional studies.

Col. Cypert contended he had been informed by their legal advisors that they (at the base) did not have the authority to grant permission for access. A formal request would have to be made through AF Hqqs. in Washington, D. C. I was given the intentional impression that AF Hqqs. had always supported the policy of exclusion.

The most negative aspect was the number of training programs being accommodated by the gunnery complex. Not only was Luke AF Base conducting a number of them, but the area was being used by Marana, Davis Monthan AF Base, and the Arizona Air Nat'l. Guard. Chances of coordinating entry with demands of these programs seemed improbable.

During the return trip to Tucson possibilities inherent in one of Col. Cypert's remarks crystallized. He had said that the only exception to this policy of exclusion was the Arizona Game & Fish Dept. when making their annual game population-distribution surveys.

Since I knew a number of their men and had one good friend in their Phoenix office the possibility of accompanying one of their technicians was not too remote.

March 17, 1964: Visit to Mr. Ted Knipe of the Tucson office of the Arizona Game & Fish Dept.

Mr. Knipe was only academically familiar with the area, but introduced me to one of their young technicians, Dave Brown, who had been involved in their past surveys throughout SW Arizona.

April 2, 1964

Mr. Brown seemed to feel that there was no problem of access any time of the year throughout at least most of the Cabeza Prieta Wildlife Refuge. This however, was a generalization and for more specific information he referred me to the following:

Norman Simmons  
U.S. Fish & Wildlife Ser.  
Cabeza Prieta Game Range  
1116 2nd Avenue  
Ajo, Arizona

Paul Le Roux  
Arizona Game & Fish Dept.  
Gila Bend, Arizona Tel: 683-2674

Don Smith  
Arizona Game & Fish Dept. (Regional Office)  
907 East 25th Place  
Yuma, Arizona

Lynn Cool (Guide)  
Ask around Gila Bend, Arizona for whereabouts

March 19, 1964: Trip to Ajo and Gila Bend.

Both Mr. Simmons of the U.S. Fish & Wildlife Ser. and Mr. Le Roux of the Arizona Game & Fish Dept. were in the field. Via telephone Mrs. Le Roux reported her husband was on a sheep survey (possibly in the restricted area, since Mr. Simmons was also out).

By this time I had begun to suspect that Col. Cypert may have been too inclusive in our conversation re Restricted Area R-2301, and that some of this area, while restricted for air traffic, might be accessible via ground vehicle.

With this in mind I stopped at Gila Bend AF Base identified by an elev. of 858 on the Phoenix Sectional Aeronautical Chart, Jan. 9, 1964, and had a discussion w/a Lt. Crock.

Again my affiliation was identified, and a request made to have the boundaries of their gunnery complex specifically located for the purpose of avoiding intrusion while looking at as much of the country as possible.

He referred me to an aerial mosaic (Scale 1"=3NM) w/a plastic overlay containing a boundary outline which, with the exception of extensions to the west and southwest, appeared to coincide w/that shown on the Land Status, Arizona, Dept. of Agriculture, S.C.S., 1942, map in our files.

April 2, 1964

Uncertainty of the exact boundaries of these extensions in conjunction w/Lt. Crock's statement that the Marine air station in Yuma was utilizing an unknown portion of the country to the west indicated that it might be wise to visit the Bureau of Land Management in Phoenix to resolve the question of legal withdrawals for military use.

March 20, 1964: Trip to Phoenix and the Bureau of Land Management.

Presented a private citizen's desire to establish land status.

This status has been established by a series of EO (Executive Order) and PLO (Public Land Order) decrees.

In part, at least, they are listed below:

Cabeza Prieta Game Range  
EO 8038, 25 Jan., 1939.

EO 8892, 5 Sept., 1941.

PLO 56, 6 November, 1942.

PLO 96, 16 March, 1943.

To date I have not had the opportunity to plot the descriptions in detail, nor determine whether they include the entire area of R-2301.

As soon as this is done, I will prepare a copy of the descriptions and an index map for you.

*N. P. Whaley*

N. P. WHALEY

NPW/jk

AMERICAN SMELTING AND REFINING COMPANY  
Tucson Arizona

May 1, 1964

*gcr*

MEMORANDUM TO J. E. KINNISON

LAND WITHDRAWALS FOR  
MILITARY PURPOSES -  
SOUTHWESTERN ARIZONA

Am attaching a list describing lands withdrawn for military purposes in southwestern Arizona.

I do not believe that these are all of the withdrawals by any means, but they do represent all that I have been able to locate to date.

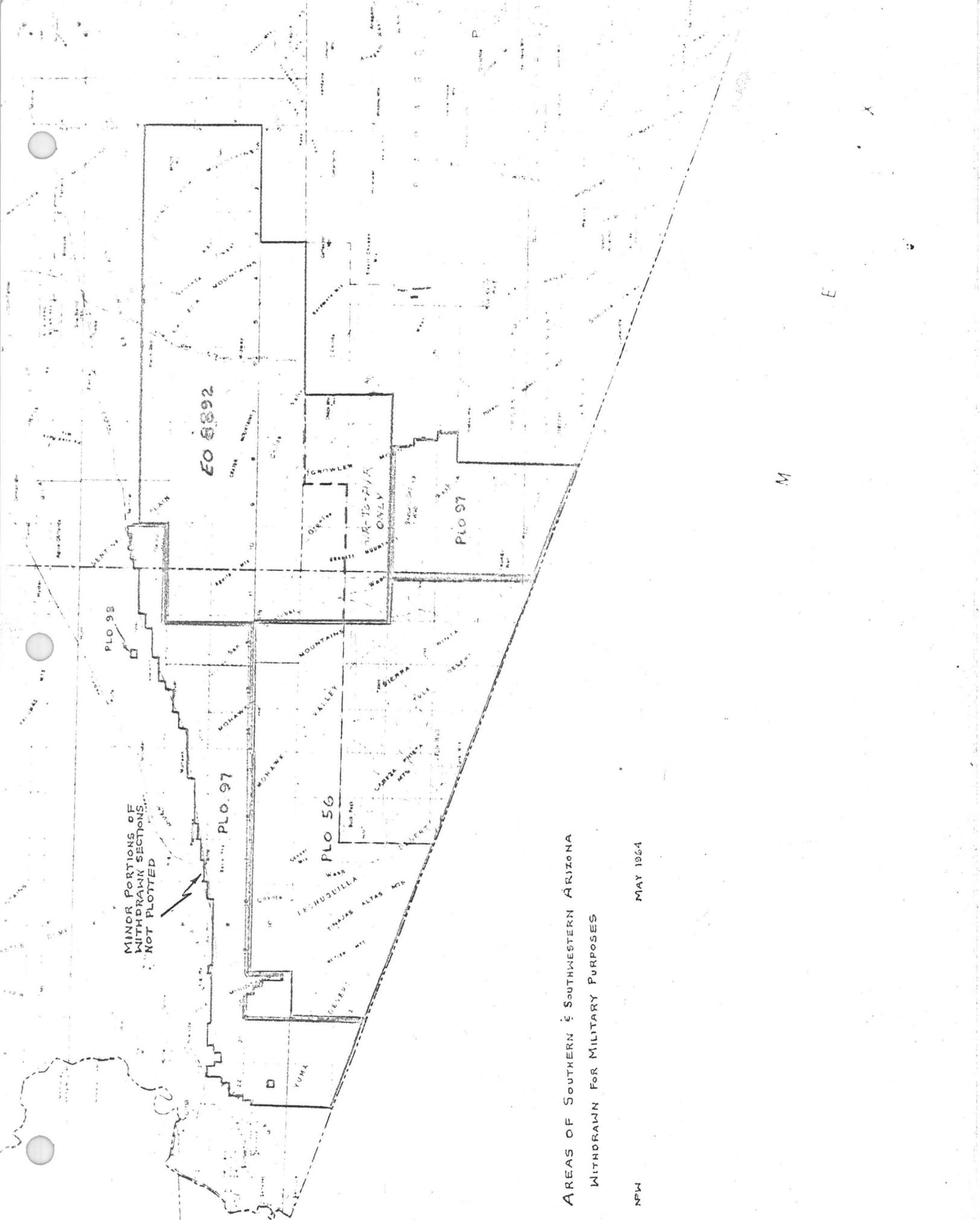
The Cabeza Prieta Game Range is not shown, since it is outlined on many maps.

A hastily prepared sketch map shows these areas graphically.

*Norman P. Whaley*

NORMAN P. WHALEY

NPW/jk



MINOR PORTIONS OF  
WITHDRAWN SECTIONS  
NOT PLOTTED

PLO 98

EO 6892

PLO 97

PLO 56

PLO 97

AREAS OF SOUTHERN & SOUTHWESTERN ARIZONA  
WITHDRAWN FOR MILITARY PURPOSES

MAY 1964

NPW

M

E

X

EO 8892 Gila & Salt River Meridian

T. 7 S., R. 1 W., Sec. 13 to 36 inclusive  
Tps. 8 & 9 S., R. 1 W., all  
T. 7 S., R. 2 W., Sec. 13 to 36 inclusive  
T. 8 and 9 S., R. 2 W., all  
T. 7 S., R. 3 W., Sec. 13 to 36 inclusive  
Tps. 8 & 9 S., R. 3 W., all  
T. 10 S., R 3 W., Sec. 4 to 9, 16-21 & 28 to 33 inclusive  
T. 7 S., R. 4 W., Sec. 13 to 36 inclusive  
Tps. 8, 9, & 10 S., R. 4 W., all  
T. 7 S., R 5 W., Sec. 13-36 inclusive  
T. 8, 9 & 10 S., R. 5 W., all  
T. 7 S., R. 6 W., Sec.13-36 inclusive  
Tps. 8, 9, & 10 S., R. 6 W., all  
T. 7 S., R. 7 W., Sec. 13-36 inclusive  
Tps. 8 to 12 S., R. 7 W., all  
T. 7 S., R. 8 W., Sec. 13-36 inclusive  
Tps. 8 to 12 S., R. 8 W., all  
T. 7 S., R. 9 W., Sec. 13-36 inclusive  
Tps. 8 to 12 S., R. 9 W., all  
Tps. 8 to 12 S., R. 10 W., all  
Tps. 8 to 12 S., R. 11 W., all  
Tps. 8 & 9 S., R. 11½ W., all

The areas described, including both public & non-public lands, aggregate approx. 1,077,500 acres.

The lands in T. 11 S., Rs. 7 & 8 W., T. 12 S., Rs. 7 to 11 W., shall be used by the War Dept. for aerial gunnery and tow-target firing and for no other type of firing.

PLO 56 Gila & Salt River Meridian

Tps. 13 to 16 S., R. 11 W.,  
10 to 15            12  
10 to 15            13  
10 to 15            14  
10 to 14            15  
10 to 14            16  
10 to 14            17  
10 to 13            18  
10 to 13            19  
Tps. 11 to 13 S., R. 20 W.

The areas described aggregate approx. 949,000 acres.

...shall designate at least 2 dys/mo on which there will be no firing affecting the lands in Tps. 13 to 16 S., R. 11 W., Tps. 12 to 15 S., Rs. 12 to 14 W., and Tps. 12 to 14 S., Rs 15 & 16 W., to enable field personnel of the Fish & Wildlife Ser. to carry out normal patrol & maintenance activities.

PL0 56 (cont'd.)

On the lands in Tps. 13 to 16 S., R. 11 W., Tps. 12 to 15 S., Rs. 12 to 14 W., and Tps. 12 to 14 S., Rs. 15 & 16 W. bombing shall be confined...to the valley floors, and shall not be permitted in the mountain areas...nor within a one-mile radius of all water holes, springs, wells, or tanks, including the Tule Wall, Cabeza Prieta Tanks, & the Tinajas Altas Tanks.

PL0 96

Not found as of 4-28-64.

PL0 97

Photocopy attached - U. of A., 4-28-64.

PL0 98

Photocopy attached - U. of A., 4-28-64.

punishable by a fine of not more than \$5,000 or by imprisonment for not more than one year, or by both such fine and imprisonment.

Dated, March 24th, 1943.

**T. R. SAYERS,**  
Director.

[P. R. Doc. 43 4591, Filed, March 25, 1943;  
11:44 a. m.]

General Land Office.

[Public Land Order 97]

ARIZONA

WITHDRAWING PUBLIC LANDS FOR USE OF THE  
WAR DEPARTMENT AS AN AERIAL GUNNERY  
AND BOMBING RANGE

By virtue of the authority vested in the President and pursuant to Executive Order No. 9146 of April 24, 1942, and to section 1 of the act of June 28, 1934, as amended, 48 Stat. 1269 (U. S. C., title 43, sec. 315), and also to section 3 of the act of June 17, 1902, 32 Stat. 388 (U. S. C., title 43, sec. 416), It is ordered, As follows:

Subject to valid existing rights, the public lands in the following-described areas are hereby withdrawn from all forms of appropriation under the public-land laws, including the mining and mineral-leasing laws, and reserved for the use of the War Department as an aerial gunnery and bombing range:

YUMA AND SALT RIVER MERIDIAN

- T. 14 S., R. 7 W.,  
Secs. 6, 7, and 18
- T. 14 S., R. 8 W.,  
Secs. 2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, 20, 21, 22, 23, 24, 25, 26, 27, 28, 29, 30, 31, 32, 33, 34, 35, 36, 37, 38, 39, 40, 41, 42, 43, 44, 45, 46, 47, 48, 49, 50, 51, 52, 53, 54, 55, 56, 57, 58, 59, 60, 61, 62, 63, 64, 65, 66, 67, 68, 69, 70, 71, 72, 73, 74, 75, 76, 77, 78, 79, 80, 81, 82, 83, 84, 85, 86, 87, 88, 89, 90, 91, 92, 93, 94, 95, 96, 97, 98, 99, and 100, inclusive, and  
Secs. 1, 2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, 20, 21, 22, 23, 24, 25, 26, 27, 28, 29, 30, 31, 32, 33, 34, 35, 36, 37, 38, 39, 40, 41, 42, 43, 44, 45, 46, 47, 48, 49, 50, 51, 52, 53, 54, 55, 56, 57, 58, 59, 60, 61, 62, 63, 64, 65, 66, 67, 68, 69, 70, 71, 72, 73, 74, 75, 76, 77, 78, 79, 80, 81, 82, 83, 84, 85, 86, 87, 88, 89, 90, 91, 92, 93, 94, 95, 96, 97, 98, 99, and 100, inclusive, unsurveyed.
- T. 14 S., R. 8 W.,  
Secs. 1 to 21, inclusive, and  
Secs. 28 to 33, inclusive, unsurveyed.
- T. 15 S., R. 8 W.,  
Secs. 4 to 6, inclusive;  
Secs. 9 to 11, inclusive, and  
Secs. 14 to 16, inclusive, unsurveyed.
- T. 16 S., R. 6 W.,  
Secs. 4 to 6, inclusive;  
Secs. 16 to 21, inclusive, and  
Secs. 26 to 33, inclusive, unsurveyed.
- T. 17 S., R. 8 W.,  
Secs. 4, 5, 6, and 9, unsurveyed.
- Tps. 13 to 17 S., R. 9 W., unsurveyed.
- T. 7 S., R. 10 W.,  
Sec. 1, lots 1, 5, 6, and 7, SW $\frac{1}{4}$ NE $\frac{1}{4}$ ,  
SE $\frac{1}{4}$ NW $\frac{1}{4}$ , SW $\frac{1}{4}$ , and W $\frac{1}{2}$ SE $\frac{1}{4}$ ;  
Sec. 2, SE $\frac{1}{4}$ NE $\frac{1}{4}$ , SE $\frac{1}{4}$ NW $\frac{1}{4}$ , and S $\frac{1}{2}$ ;  
Sec. 3, SE $\frac{1}{4}$ ;  
Sec. 4, S $\frac{1}{2}$ SW $\frac{1}{4}$ , and SE $\frac{1}{4}$ ;  
Sec. 5, SE $\frac{1}{4}$ ;  
Sec. 7 to 36, inclusive
- Tps. 12 S., to 16 S., R. 10 W., unsurveyed.
- T. 7 S., R. 11 W.,  
Sec. 7, S $\frac{1}{2}$ SE $\frac{1}{4}$ ;  
Sec. 8, S $\frac{1}{2}$ SE $\frac{1}{4}$ ;  
Sec. 9, S $\frac{1}{2}$ ;  
Sec. 10, S $\frac{1}{2}$ ;  
Sec. 11, S $\frac{1}{2}$ N $\frac{1}{2}$  and S $\frac{1}{2}$ ;  
Sec. 12, NE $\frac{1}{4}$ , SE $\frac{1}{4}$ NW $\frac{1}{4}$ , and S $\frac{1}{2}$ ;  
Secs. 13 to 26, inclusive.
- T. 14 S., R. 12 W.,  
Secs. 14, S $\frac{1}{2}$ N $\frac{1}{2}$ , and S $\frac{1}{2}$ ;  
Sec. 15, S $\frac{1}{2}$ NE $\frac{1}{4}$ , and S $\frac{1}{2}$ ;  
Sec. 16, S $\frac{1}{2}$ ;  
Sec. 17, S $\frac{1}{2}$ ;  
Sec. 18, S $\frac{1}{2}$ SE $\frac{1}{4}$ , S $\frac{1}{2}$ SW $\frac{1}{4}$ , and S $\frac{1}{2}$ ;  
Sec. 19, NE $\frac{1}{4}$ , S $\frac{1}{2}$ SW $\frac{1}{4}$ , and S $\frac{1}{2}$ ;  
Sec. 21, NE $\frac{1}{4}$ , and S $\frac{1}{2}$ ;  
Secs. 22 to 36, inclusive

- Tps. 8 and 9 S., R. 12 W.,  
T. 7 S., R. 13 W.,  
Sec. 25,  
Sec. 26, S $\frac{1}{2}$ ;  
Sec. 27, S $\frac{1}{2}$ NE $\frac{1}{4}$  and SE $\frac{1}{4}$ ;  
Sec. 32, S $\frac{1}{2}$ SE $\frac{1}{4}$ ;  
Sec. 33, S $\frac{1}{2}$ NE $\frac{1}{4}$  and S $\frac{1}{2}$ ;  
Secs. 34, 35, and 36.
- T. 8 S., R. 13 W.,  
Secs. 1, 2, 3, and 4;  
Sec. 5, lot 1 and S $\frac{1}{2}$ ;  
Sec. 6, SE $\frac{1}{4}$ SE $\frac{1}{4}$ ;  
Sec. 7;  
Secs. 8 to 36, inclusive.
- T. 9 S., R. 13 W.,  
T. 8 S., R. 14 W.,  
Sec. 11, S $\frac{1}{2}$ SE $\frac{1}{4}$ ;  
Sec. 12, S $\frac{1}{2}$ NE $\frac{1}{4}$  and S $\frac{1}{2}$ ;  
Secs. 13 and 14;  
Sec. 15, S $\frac{1}{2}$ NE $\frac{1}{4}$  and S $\frac{1}{2}$ ;  
Sec. 16, S $\frac{1}{2}$ SW $\frac{1}{4}$ , and SE $\frac{1}{4}$ ;  
Secs. 19 to 36, inclusive.
- T. 9 S., R. 14 W.,  
T. 8 S., R. 15 W.,  
Sec. 19, S $\frac{1}{2}$ ;  
Sec. 20, S $\frac{1}{2}$ N $\frac{1}{2}$  and S $\frac{1}{2}$ ;  
Secs. 21 to 36, inclusive.
- T. 8 S., R. 15 W.,  
T. 8 S., R. 16 W.,  
Sec. 23, S $\frac{1}{2}$ S $\frac{1}{2}$ ;  
Sec. 24, S $\frac{1}{2}$ ;  
Secs. 25 to 28, inclusive;  
Sec. 29, S $\frac{1}{2}$ NE $\frac{1}{4}$  and S $\frac{1}{2}$ ;  
Sec. 30, S $\frac{1}{2}$ ;  
Secs. 31 to 36, inclusive.
- T. 9 S., R. 16 W.,  
T. 8 S., R. 17 W.,  
Sec. 25, S $\frac{1}{2}$ ;  
Sec. 26, S $\frac{1}{2}$ SE $\frac{1}{4}$ ;  
Sec. 41, S $\frac{1}{2}$ S $\frac{1}{2}$ ;  
Sec. 42, S $\frac{1}{2}$ ;  
Sec. 43, S $\frac{1}{2}$ NE $\frac{1}{4}$  and S $\frac{1}{2}$ ;  
Secs. 44, 45, and 46.
- T. 9 S., R. 17 W., partly unsurveyed.
- T. 9 S., R. 18 W.,  
Secs. 1 and 2;  
Sec. 3, S $\frac{1}{2}$ N $\frac{1}{2}$ , and S $\frac{1}{2}$ ;  
Sec. 4, S $\frac{1}{2}$ N $\frac{1}{2}$ , and S $\frac{1}{2}$ ;  
Sec. 5, S $\frac{1}{2}$ ;  
Secs. 7 to 36, inclusive.
- T. 9 S., R. 19 W.,  
Sec. 1, S $\frac{1}{2}$ SW $\frac{1}{4}$  and SE $\frac{1}{4}$ ;  
Sec. 2, S $\frac{1}{2}$ SW $\frac{1}{4}$ ;  
Sec. 6, S $\frac{1}{2}$ ;  
Secs. 7 to 36, inclusive.
- T. 9 S., R. 20 W.,  
Sec. 1, SW $\frac{1}{4}$ SW $\frac{1}{4}$  and S $\frac{1}{2}$ ;  
Sec. 2, lot 4, S $\frac{1}{2}$ N $\frac{1}{2}$ , and S $\frac{1}{2}$ ;  
Sec. 3, lots 1 and 2, S $\frac{1}{2}$ N $\frac{1}{2}$ , and S $\frac{1}{2}$ ;  
Sec. 4, E $\frac{1}{2}$ SE $\frac{1}{4}$ ;  
Secs. 7 to 36, inclusive.
- T. 10 S., R. 20 W.,  
Secs. 1, 2, 3, 11, 12, 13, 24, and 26, unsurveyed.
- T. 9 S., R. 21 W.,  
Sec. 7, W $\frac{1}{2}$ ;  
Sec. 8, NE $\frac{1}{4}$ , N $\frac{1}{2}$ NW $\frac{1}{4}$ , and SE $\frac{1}{4}$ ;  
Secs. 9, 10, and 11;  
Sec. 12, S $\frac{1}{2}$ ;  
Secs. 13 to 17, inclusive;  
Sec. 18, NE $\frac{1}{4}$ , S $\frac{1}{2}$ NW $\frac{1}{4}$ , and S $\frac{1}{2}$ ;  
Secs. 19 to 36, inclusive
- Tps. 10, 11, and 12 S., R. 21 W.,  
T. 9 S., R. 22 W.,  
Sec. 11;  
Sec. 12, W $\frac{1}{2}$ , and W $\frac{1}{2}$ E $\frac{1}{2}$ ;  
Secs. 13 and 14;  
Sec. 15, SE $\frac{1}{4}$ ;  
Sec. 21, E $\frac{1}{2}$  and E $\frac{1}{2}$ SW $\frac{1}{4}$ ;  
Secs. 22 to 29, inclusive;  
Secs. 31 to 36, inclusive.
- T. 10 S., R. 22 W.,  
Secs. 1 to 8, inclusive;  
Sec. 9, S $\frac{1}{2}$ ;  
Secs. 7 to 20, inclusive;  
Sec. 21, W $\frac{1}{2}$ ;  
Sec. 22, E $\frac{1}{2}$ ;  
Secs. 23 to 36, inclusive.

Tps. 11 and 12 S., R. 22 W.

The areas described, including both public and nonpublic lands, aggregate approximately 705,300 acres.

This order shall be subject to (1) the reservation made by the Proclamation of May 27, 1907, reserving all public lands within 60 feet of the international boundary between the United States and the Republic of Mexico, and (2) the transmission line withdrawal under Federal Power Commission Project No. 482, so far as such reservations affect any of the above-described lands.

This order shall take precedence over, but shall not rescind or revoke, (1) the withdrawal for classification and other purposes made by Executive Order No. 6910 of November 26, 1934, as amended, (2) the withdrawal made by Executive Order No. 8038 of January 25, 1939, establishing the Cabeza Prieta Game Range, (3) the order of the Secretary of the Interior of March 14, 1929, withdrawing certain lands for reclamation purposes, and (4) the order of the Secretary of the Interior of July 14, 1938, establishing Arizona Grazing District No. 3, so far as such orders affect any of the above-described lands. After the present national emergency has been officially terminated, this order, so far as it affects lands heretofore withdrawn for reclamation purposes, shall be ineffective upon notice to the War Department by the Secretary of the Interior that such lands are needed for reclamation purposes; and it is intended that all of the above-described public lands shall be returned to the administration of the Department of the Interior, when they are no longer needed for the purposes for which they are reserved.

The Commanding Officer, Yuma Aerial Gunnery Range, will, after consultation with the local representatives of the Fish and Wildlife Service, Department of the Interior, designate at least two days each month on which there will be no firing affecting the lands in T. 14 S., R. 7 W., Tps. 13 to 17 S., R. 8 W., Tps. 13 to 16 S., Rs. 9 and 10 W., to enable the field personnel of the Fish and Wildlife Service to carry out normal patrol and maintenance activities.

On the lands in T. 14 S., R. 7 W., Tps. 13 to 17 S., R. 8 W., Tps. 13 to 16 S., Rs. 9 and 10 W., bombing shall be confined by the War Department to the valley floors, and shall not be permitted in the mountain areas, which are the important mountain sheep habitats, nor within a one-mile radius of all water holes, springs, wells, or tanks. Any roads and trails on such lands which may be damaged by War Department use shall be restored to good condition by the War Department upon return of the lands to the administration of the Department of the Interior.

ARF. FORTAS,

Acting Secretary of the Interior.

MARCH 16, 1943.

[P. R. Doc. 43 4592, Filed, March 25, 1943;  
11:44 a. m.]

[Public Land Order 98]

ARIZONA

WITHDRAWING PUBLIC LAND FOR USE OF THE WAR DEPARTMENT FOR AVIATION PURPOSES

By virtue of the authority vested in the President and pursuant to Executive Order No. 9136 of April 2, 1942, and to section 3 of the act of June 17, 1902, 32 Stat. 388 (U. S. C., title 43, sec. 416), *It is ordered*, As follows:

Subject to valid existing rights, the following-described public land is hereby withdrawn from all forms of appropriation under the public-land laws, including the mining and mineral-leasing laws, and reserved for the use of the War Department for aviation purposes:

GILA AND SALT RIVER MERIDIAN

T. 7 S., R. 12 W., sec. 7

The area described contains 627.90 acres.

This order shall take precedence over, but shall not rescind or revoke, the order of March 14, 1929, of the Secretary of the Interior, withdrawing certain lands for reclamation purposes, so far as such order affects the above-described land. After the expiration of the six months' period following the termination of the unlimited national emergency declared by Proclamation No. 2487 of May 27, 1941 (55 Stat. 1647), this order shall become ineffective upon notice to the War Department by the Secretary of the Interior that the land is needed for reclamation purposes.

ABE FORTAS,

*Acting Secretary of the Interior.*

MARCH 17, 1943.

[F. R. Doc. 43-4593; Filed, March 25, 1943; 11:45 a. m.]

[Public Land Order 99]

CALIFORNIA

WITHDRAWING PUBLIC LANDS FOR USE OF THE NAVY DEPARTMENT AS A NAVAL SUPPLY DEPOT

By virtue of the authority vested in the President and pursuant to Executive Order No. 9146 of April 24, 1942, *It is ordered*, As follows:

Subject to valid existing rights and to the transmission-line withdrawal under Federal Power Project No. 882, the following-described public lands are hereby withdrawn from all forms of appropriation under the public-land laws, including the mining and mineral-leasing laws, and reserved for the use of the Navy Department as a naval supply depot:

SAN BERNARDINO MERIDIAN

T. 2 N., R. 1 W.,

secs. 14, 15,

sec. 16, E. 1/4 NE 1/4 NE 1/4.

The areas described aggregate 310 acres.

This order shall take precedence over, but shall not rescind or revoke, the withdrawal for classification and other purposes made by Executive Order No. 6910 of November 26, 1941, as amended, so far as such order affects the above-described lands.

It is intended that the land described herein shall be returned to the administration of the Department of the Interior, when they are no longer needed for the purpose for which they are reserved.

ABE FORTAS,

*Acting Secretary of the Interior.*

MARCH 17, 1943

[F. R. Doc. 43-4594; Filed, March 18, 1943; 11:44 a. m.]

[Public Land Order 100]

MONTANA

WITHDRAWING PUBLIC LANDS FOR USE OF THE WAR DEPARTMENT FOR MILITARY PURPOSES

By virtue of the authority vested in the President and pursuant to Executive Order No. 9146 of April 24, 1942, *It is ordered*, As follows:

Subject to valid existing rights, the public lands in the following-described areas are hereby withdrawn from all forms of appropriation under the public-land laws, including the mining and mineral-leasing laws, and reserved for the use of the War Department for military purposes:

PRINCIPAL MERIDIAN

T. 25 N., R. 4 E.

Secs. 11 to 14, inclusive

T. 27 N., R. 6 E.

Secs. 4, 5, 6, 9, 16, 17, 20, and 21

T. 28 N., R. 8 E.

Secs. 28, 29, 32, and 33

The areas described, including both public and non-public lands, aggregate 10,241.20 acres.

This order shall take precedence over, but shall not rescind or revoke, the withdrawal for classification and other purposes made by Executive Order No. 6910 of November 26, 1941, as amended, so far as such order affects the above-described lands.

It is intended that the public lands herein described shall be returned to the administration of the Department of the Interior, when they are no longer needed for the purpose for which they are reserved.

ABE FORTAS,

*Acting Secretary of the Interior.*

MARCH 17, 1943.

[F. R. Doc. 43-4595; Filed, March 23, 1943; 11:45 a. m.]

Office of the Solicitor.

[Order No. 1799]

COMMISSIONER OR ASSISTANT COMMISSIONER OF GENERAL LAND OFFICE

AUTHORIZATION TO ACT IN CERTAIN MATTERS

MARCH 19, 1943.

Pursuant to sections 161, 453 and 2478 Rev. Stat. (5 U. S. C. sec. 22 and 43 U. S. C. sec. 2, and 1301 respectively), *It is hereby ordered*, As follows:

I. The Commissioner or Assistant Commissioner of the General Land Office

may hereafter act in relation to the following classes of matters without obtaining Secretarial approval, unless the Secretary in any particular matter determines otherwise, subject in any event to an appeal to the Secretary according to the rules of practice and subject to the provisions of Part II of this order:

(a) Applications to lease public lands for public airports under the act of May 24, 1928 (45 Stat. 773, 43 U. S. C. sec. 211-214), and the issuance, assignment, modification or cancellation of such leases.

(b) Applications to lease public lands for a home, cabin, camp, health, convalescent, recreational, or business site under the act of June 1, 1933 (52 Stat. 609; 43 U. S. C. sec. 682a), and the issuance, assignment, modification or cancellation of such leases.

(c) Applications to lease public lands in Alaska for fur farms under the Act of July 3, 1926 (44 Stat. 821; 48 U. S. C. sec. 360, 361), and the issuance, assignment, modification or cancellation of such leases.

(d) Applications to lease public lands in Alaska for grazing purposes under the act of March 4, 1927 (44 Stat. 1452; 48 U. S. C. sec. 471, 471a-471b), and the issuance, assignment, modification or cancellation of such leases.

(e) Applications by States, counties or municipalities to lease public lands for recreational use under the act of June 14, 1926 (44 Stat. 741; 43 U. S. C. sec. 869), or the act of April 13, 1928 (45 Stat. 429; 43 U. S. C. sec. 869a), and the issuance, modification or cancellation of such leases.

(f) Applications to use public lands under right-of-way permits for tramroads under the act of January 21, 1895 (28 Stat. 635; 43 U. S. C. sec. 955), and the issuance, assignment, modification or cancellation of such permits.

(g) Applications to use public lands under permits for rights-of-way under the act of February 15, 1901 (31 Stat. 790; 43 U. S. C. sec. 959 and 16 U. S. C. sec. 79), and the issuance, assignment, modification or cancellation of such permits: *Provided, however*, That cancellation shall be only in the circumstances specifically prescribed in regulations of the Secretary. The authority herein prescribed shall not relate to applications or permits involving lands within national parks, Indian or other reservations of the United States.

(h) Applications to use public lands under right-of-way easements under the act of March 4, 1911 (36 Stat. 1235, 1253-54; 43 U. S. C. sec. 961), and the issuance and assignment of such easements. The authority herein prescribed shall not relate to applications or permits involving lands within national parks, Indian or other reservations of the United States, nor to the modification or revocation of any easements granted under the act of March 4, 1911.

(i) Approvals of clear lists of State selections under the act of February 28, 1891 (26 Stat. 796, 43 U. S. C. sec. 851), and section 2449, Rev. Stat. (43 U. S. C. sec. 859).