DOCKET NO. DMEA 2271

COMMODITY Uranium

Idm-E387

DOCKET COPY

UNITED STATES OF AMERICA
DEPARTMENT OF THE INTERIOR
DEFENSE MINERALS EXPLORATION ADMINISTRATION

EXPLORATION PROJECT CONTRACT [1]

IT IS AGREED this 19th day of August, 1952, between the United States of America, acting through the Department of the Interior, Defense Minerals Exploration Administration, hereinafter called the "Government," and [2] a partnership consisting of R. A. Clenny and Scott M. Cutler, 704 Newhouse Building, Salt Lake City, Utah

hereinafter called the "Operator," as follows:

ARTICLE 1. *Authority for contract.*—This agreement is entered into under the authority of the Defense Production Act of 1950, as amended, pursuant to DMEA Order 1 entitled "Government Aid in Defense Exploration Projects."

ARTICLE 2. *Operator's property rights.*—With respect to that certain land situated in the State of Utah, County of Piute, described as follows: [3] the following unpatented mining claims: The J. D. C. - M. M. recorded in Book E of Location Notices Page 225; and Camel No. 1 recorded in Book E of Location Notices page 209 in the office of the County Recorder of Piute County; all located in Sec. 4, T. 27 S., R. 3 W., S. L. B. M., Durkee Mining District

the Operator represents and undertakes: [4]

[redacted]

(*b*) That the Operator is a lessee, in possession and entitled to possession, and the Owner's Consent to Lien is attached.

The Operator shall devote the land and all existing improvements, facilities, buildings, installations, and appurtenances to the purposes of the exploration project without any allowance for the use, rental value, depreciation, depletion, or other cost of acquiring, owning, or holding possession thereof.

ARTICLE 3. *Exploration project.*—The Operator, within sixty (60) days from the date of this contract shall commence work on a project of exploration for [5] uranium

in or upon the described land; and shall bring the project to completion within a period of twelve (12) months from the date of this contract. The work to be performed is more fully described in Exhibit "A" attached hereto, which, with any maps or drawings thereto attached, are made a part of this contract. The Government will contribute to the cost of this work as hereafter provided.

ARTICLE 4. *Performance of the work.*—(*a*) *Operator's responsibility.* The work shall be performed efficiently, expertly, in a workmanlike manner, in accordance with good mining standards and State regulations for health and safety and for workmens' compensation and employers' liability insurance, with suitable and adequate equipment, materials, and labor, to bring the project to completion within the time fixed. To the extent specified in Exhibit "A," attached hereto, the work may be performed by independent contractor or contractors; and work not specified in Exhibit "A" for performance by independent contractor may nevertheless be so performed upon amendment of Exhibit "A," as agreed to by the parties, to state the work to be so performed and the estimated unit costs thereof, as provided hereafter.

(*b*) *Independent contracts.*—Any independent contract for the performance of work shall be on a unit-price basis (such as per foot of drilling, per foot of drifting, per hour of bulldozer operations, per cubic yard of material moved), or on some basis that will indicate the amount due for work performed at any stage of the work to be performed under such independent contract. The Government shall not be nor be considered to be a party to any such independent contract, and the Government's right to terminate the exploration project contract under any of its provisions shall not in any manner be affected by reason of any such independent contract. If the reference in Exhibit "A" to any such independent contract states that the Government's approval thereof is required, the Government may refuse to participate in the cost thereof unless and until it has given its written approval of the independent contract.

(*c*) *Government may inspect.*—The Government shall have the right to enter and observe and inspect the work at all reasonable times, and the Operator shall provide the Government with all available means for doing so. The Government may consult with and advise the Operator on all phases of the work.

ARTICLE 5. *Estimated costs of the project.*—A statement of the estimated cost of the project is set forth in Exhibit "A," attached hereto. Except insofar as any item of requirement or the estimated cost thereof set forth in Exhibit "A" is there or elsewhere designated as an "allowable maximum," such items of requirement and of related cost are estimates only, and may be exceeded to the extent that the Government may from time to time approve for the most economic and beneficial performance of the work within the limitation of the total aggregate estimate of costs. The Government's approval of any such excess over the estimate for an item of requirement or related cost will be signified by its approval and payment of any invoice or voucher for payment which expressly calls attention to such excess. Items expressly designated in Exhibit "A" or elsewhere as "allowable maximum," and the total aggregate estimated cost are limitations, and any excess therein will be for the sole account of the Operator in which the Government will not participate.

ARTICLE 6. *Allowable costs of the project.*—(*a*) The costs of the project in which the Government will participate are limited to the following:

(1) *Independent contracts.*—Payments to independent contractors under independent contracts listed in Exhibit "A." The estimated cost of any work to be performed under an independent contract is or shall be included in the estimate of costs in Exhibit "A" in terms of the estimated numbers of units of work to be performed, the estimated amount to be paid per unit, and the estimated total amount to be paid to the independent contractor, and such estimates shall be allowable maximums above which the Government will not contribute. Regardless of the provisions of any such independent contract, the Government will participate in the payments to the independent contractor only on account of work actually performed and that conforms with the provisions of the exploration project contract, and only to the extent that the Government deems the unit prices for the work under the independent contract to be reasonable and necessary. No such independent contract shall have the effect of increasing the estimated total cost of the exploration project contract nor the maximum amount which the Government will pay as provided in the exploration project contract.

(2) *Labor, supervision, consultants.*—Labor, supervision and technical services (including engineering and geological consultants), a schedule of which is included in the estimate of costs set forth in Exhibit "A." The requirements and related estimated costs for supervision and technical services are allowable maximums.

(3) *Operating materials and supplies.*—Necessary materials and supplies including items of equipment costing less than $50.00 each, and power, water, and fuel, a schedule of which is included in the estimate of costs in Exhibit "A."

(4) *Operating equipment.*—Any operating equipment to be rented or purchased, or which is owned and will be furnished by the Operator, with the estimated rental, purchase price, or the allowable depreciation, as the case may be, a schedule of which is included in Exhibit "A." Any items listed as owned and to be furnished by the Operator, and related initial allowable depreciation, are allowable maximums.

(5) *Rehabilitation and repairs.*—Any necessary initial rehabilitation or repairs of existing buildings, installations, fixtures, and movable operating equipment, now owned by the Operator and to be devoted to the purposes of the exploration contract, a schedule of which is included in the estimate of costs set forth in Exhibit "A." These items are allowable maximums.

(6) *New buildings, improvements, installations.*—Any necessary buildings, fixed improvements, or installations to be purchased, installed, or constructed for the purposes of the exploration work, with the estimated cost of each, a schedule of which is included in the estimate of costs in Exhibit "A." All of these items are allowable maximums.

(7) *Miscellaneous.*—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.

(8) *Contingencies.*—Such other necessary, reasonable direct costs of performing the exploration work, within the limit of the total aggregate estimate of costs, whether or not included in any schedule of costs in Exhibit "A," as may be approved by the Government in the course of the work, as indicated by its approval and payment of invoices and vouchers.

[1] If sufficient space is not provided in any blank, use an extra sheet of paper and refer to it in the blank.
[2] State name, address, and nature of organization if any.
[3] Give legal description or enough to identify the property, particularly excluding any land or interest therein to which the Government's lien is not to attach or the production from which is not to be subject to the Government's percentage royalty.
[4] Strike out the provision not applicable.
[5] Name of mineral or minerals.

(*b*) The Government's payments in all cases will be based on actual, necessary costs (including contract unit prices) incurred not in excess of any "allowable maximum," and not in excess of the fixed percentage of the total aggregate estimated costs. Costs will be considered to be incurred only as they are or become due and payable.

(*c*) 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 this contract, shall be allowed as costs of the project in which the Government will participate.

ARTICLE 7. *Reports, accounts, audits.*—(*a*) *Progress reports.* The Operators shall provide the Government with monthly reports of work performed and costs (including contract unit prices) incurred under the contract, in quintuplicate (five copies), upon forms provided by the Government. These progress reports shall be certified by the Operator, and shall constitute both the Operator's invoice of costs incurred on the project during the period covered by the report and his voucher for repayment by the Government, unless the Government requires the use of a standard voucher form with invoice attached. Progress reports shall include surface and/or underground engineering-geological maps or sketches showing the progress of the exploration, with assay-reports on samples taken concurrently with the advance in mineralized ground.

(*b*) *Final report.*—Upon completion of the exploration work or termination of the contract the Operator shall provide the Government with an adequate geological and engineering report, in quintuplicate (five copies), including an estimate of ore reserves resulting from the exploration work.

(*c*) Compliance with requirements.—If, in the opinion of the Government, any of the Operator's reports are insufficient or incomplete, the Government may procure the making or completion of such reports and attachments as an expense of the exploration work; and the Government may withhold approval and payment of any vouchers depending upon insufficient or incomplete reports.

(*d*) *Accounts and audits.*—The Operator shall keep suitable records and accounts of operations, which the Government may inspect and audit at any time. The Government may at any time require an audit of the Operator's records and accounts by a certified public accountant, the cost thereof to be treated as a cost of the project. The Operator shall keep and preserve said records and accounts for at least 3 years after the completion of the project or the termination of this contract. Upon the completion of the project or termination of the contract the Operator shall render a final account as provided in Article 12.

ARTICLE 8. *Payments by the Government.*—(*a*) The Government will pay ninety (90) percent of the allowable costs incurred, as they accrue, in an aggregate total amount not in excess of $22,050.00, which is 90 percent of $24,500.00, the agreed, estimated total cost of the project in which the Government will participate; *Provided*, that until the Operator's final report and final accounting have been rendered to the Government, and any final auditing required by the Government has been made, and a final settlement of the contract has been made, the Government may withhold from the last voucher or vouchers such sums as it sees fit not in excess of ten (10) percent of the maximum total which the Government might have been called upon to pay under the terms of the contract.

(*b*) The Government may make any payment or payments direct to independent contractors and to suppliers, for the account of the Operator, rather than to the Operator.

ARTICLE 9. *Repayment by Operator.*—(*a*) If, at any time, the Government considers that a discovery or a development from which production may be made has resulted from the exploration work, the Government, at any time not later than 6 months after the Operator has rendered the required final report and final account, may so certify in writing to the Operator. The certification shall describe broadly or indicate the nature of the discovery or development. In the event of such certification, any minerals mined or produced from the land described in Article 2 within 10 years from the date of this contract, including any mined or produced before the certification, shall be subject to a percentage royalty which the Operator or his successor in interest shall pay to the Government, upon the net smelter returns, the net concentrator returns, or other net amounts realized from the sale or other disposition of any such production, in whatever form disposed of, including ore, concentrates, or metal, until the total amount contributed by the Government, without interest, is fully repaid, or said 10 years have elapsed, whichever occurs first, as follows:

(1) One and one-half (1½) percent of any such net amounts not in excess of eight dollars ($8.00) per ton.

(2) One and one-half (1½) percent of any such net amounts, plus one-half (½) percent of such net amounts for each additional full fifty cents ($0.50) by which such net amounts exceed eight dollars ($8.00) per ton, but not in excess of five (5) percent of such net amounts.

(For instance: The percentage royalty on a net amount of five dollars ($5.00) per ton would be one and one-half (1½) percent; on a net amount of ten dollars ($10.00) per ton, three and one-half (3½) percent.)

(*b*) As here used, "net smelter returns," "net concentrator returns," and "other net amounts realized from the sale or other disposition," mean gross revenue from sales; or if not sold, the market value of the material after it is mined in the form in which and the place where it is held. In the case of integrated operations in which the material is not disposed of as such, these terms mean what is or would be gross income from mining operations for percentage depletion purposes in income-tax determination.

(*c*) To secure the payment of its percentage royalty, the Government shall have and is hereby granted a lien upon the land described in Article 2 and upon any production of minerals therefrom, until the royalty claim is extinguished by lapse of time or is fully paid.

(*d*) This article is not to be construed as imposing any obligation on the Operator or the Operator's successor in interest to engage in any mining or production operations.

ARTICLE 10. *Assignment, transfer, or loss of Operator's interest.*—Without the written consent of the Government, the Operator shall not assign or otherwise transfer or hypothecate this contract or any rights thereunder. The Operator shall not make any voluntary nor permit any involuntary transfer or conveyance of the Operator's rights in the land described in Article 2, without making suitable provision for the preservation of the Government's right to a percentage royalty on production and lien for the payment thereof; *Provided*, that mere failure by the Operator to maintain the Operator's rights in the land, without any consideration running to the Operator other than relief from the cost of maintaining such rights (as by surrender of a leasehold, failure to perform assessment work, or failure to exercise an option), coupled with complete abandonment by the Operator of all interest in or operations on the land for a period of 10 years from the date of this contract, shall not constitute such a transfer or conveyance. Should the Operator make or permit any transfer or conveyance in violation of this provision, the Operator shall be and remain liable for payment to the Government of the same amounts, at the same times, as would have been paid under the terms of the percentage royalty on production. If for any reason the net smelter returns, net concentrator returns, or other net amounts realized from the sale or other disposition of such production are not available as a means of measuring the amount of the Operator's liability, the amount thereof shall be estimated as well as may be, and in the event of dispute as to such estimates, the determination thereof by the Administrator of Defense Minerals Exploration Administration or by his successor shall be final and binding upon the Operator.

ARTICLE 11. *Title to and disposition of property.*—All facilities, buildings, fixtures, equipment, or other items costing more than $50.00 each, paid for or purchased with funds contributed jointly by the Operator and the Government, although title may be taken in the name of the Operator, shall belong to the Operator and the Government jointly, in proportion to their respective contributions, and upon the completion of the work or the termination of the contract shall be disposed of promptly by the Operator for the joint account of the Government and the Operator, either by return to the vendor, by sale to others, or purchase by the Operator at a price at least as high as could otherwise be obtained, as may appear to be for the best interest of the Government, unless the Government, in writing, waives its interest in any such item. If necessary to accomplish such disposition, the Operator shall dismantle, sever from the land, and remove any such item, the cost thereof to be for the joint account of the parties in proportion to their respective interests. If the Operator, within 90 days after the receipt of written notice from the Government, fails, neglects, or refuses to dispose of such property, the Government may itself enter upon the land, take possession of, and remove and dispose of any such property as above provided.

ARTICLE 12. *Termination and completion.*—The Government may, at any time, by written notice to the Operator, terminate this contract: (*a*) If the Operator fails to provide his share of the money necessary to prosecute operations pursuant to the terms of the contract; (*b*) if the Operator, in the opinion of the Government, fails to prosecute operations pursuant to the terms of the contract; or (*c*) if in the opinion of the Government, operations up to the time of the notice have not indicated the probability of making any worth while discovery and in the opinion of the Government further operations are not justified. Upon the completion of the project or any termination of the contract the Operator shall dispose of any remaining materials, supplies, facilities, buildings, fixtures, and equipment in which the Government has an interest, for the joint account of the Operator and the Government in the proportion of their respective interests; shall render to the Government a full and final accounting of his operations under the contract and his expenditures of money; and shall pay to the Government its pro rata share of any money remaining.

ARTICLE 13. *Changes and added provisions.* The Operator's obligation to carry the project to completion continues only so long as the accumulated allowable costs of the project in which the Government will participate do not exceed the agreed total estimated cost of the project set forth in Article 8.

Executed in sextuplicate the day and year first above written.

R. A. Glens

(Operator)

Scott M. Cutler

By

THE UNITED STATES OF AMERICA

W. H. King

By Executive Officer, DMEA Field Team, Region IV

I, , certify that I am the secretary of the corporation named as Operator herein; that , who signed this contract on behalf of the Operator, was then of said corporation; that said contract was duly signed for and in behalf of said corporation by authority of its governing body, and is within the scope of its corporate powers.

[CORPORATE SEAL]

MF-203

OWNER'S CONSENT TO LIEN

WHEREAS, the undersigned, as owner, co-owner, lessor, or seller has an interest in certain property in the State of UTAH, County of PIUTE, described as follows: 1/ CAMEL NO. 1 Lode Claim, located the 1st day of May, 1949, and recorded at the County Recorder's office, Piute County, State of Utah, on May 4, 1949, in Book E of Location Notices, page 209; and J.D.G. MM Lode Claim, located the 7th day of June, 1949, and recorded at the County Recorder's office, Piute County, State of Utah, on June 8th, 1949, in Book E of Location Notices, page 225.

which is the subject of a proposed exploration project contract, hereinafter called the "contract", between the United States of America, hereinafter called the "Government", and

2/ R. A. GLENNY and SCOTT M. CUTLER

hereinafter called the "Operator"; and

WHEREAS, under certain provisions of said contract which are set forth on the reverse side hereof, the Government is entitled to a percentage royalty on production and to certain other rights and equities which do or may conflict with or be adverse to the interest of the undersigned in said property;

NOW THEREFORE, the undersigned, in consideration of said contract and as an inducement to the Government to enter into same, undertakes and agrees as follows:

1. The Government's equity in and right to dismantle, sever, take possession of, and remove and dispose of facilities, buildings, fixtures, equipment, or other items as provided in the contract, or any amendment thereof, shall prevail over and be prior and superior to any conflicting or adverse rights of the undersigned, and the Government is authorized to enter upon the land for such purposes.

2. To secure the payment to the Government of the percentage royalty on production 3/ provided for under the terms of said exploration project contract, or any amendment thereof which does not increase the maximum amount of the Government's claim here stated or alter the provisions for repayment, there is hereby granted to the Government a lien upon the land herein described and upon any production of minerals therefrom, until the royalty claim is fully paid in the amount of the Government's contribution, not in excess of 4/$ 22,050.00, or ten years have elapsed from the date of the contract.

3. The undersigned shall commit no act nor assert any claim that may contravene or conflict with the lien, claim, or rights of the Government under the provisions of said contract. This agreement shall be binding upon the heirs, executors, administrators, successors, and assigns of the undersigned.

Dated this 21st day of July, 195 2.

W. Dana Gibbs [Seal]
W. Dana Gibbs

H. Spencer Gibbs [Seal]
H. Spencer Gibbs

R. Dunsmore [Seal]
R. Dunsmore

Urban Johnson [Seal]
Urban Johnson

Western Uranium Corp.
By Claude M. Zabriskie
Claude M. Zabriskie, President

1/ Either (a) insert the legal description of the land, or (b) strike out the words "as follows" and insert "in a lease [or contract, deed, or other document] dated _____, and recorded in book _____ page _____ official records of said county." If (b) is used, the book and page of recordation cannot be dispensed with. If the space provided is insufficient, use an Annex, and refer to the Annex in the space.

2/ Insert the name of the Operator as it will appear in the exploration project contract.

3/ Mining or production from the land is not required, and in the absence of production there is no obligation to repay the Government.

4/ Insert the maximum amount of the Government's contribution.

RELEVANT CONTRACT PROVISIONS

Repayment by Operator. (a) If, at any time, the Government considers that a discovery or a development from which production may be made has resulted from the exploration work, the Government, at any time not later than six months after the Operator has rendered the required final report and final account, may so certify in writing to the Operator. The certification shall describe broadly or indicate the nature of the discovery or development. In the event of such certification, any minerals mined or produced from the land described in Article 2 within 10 years from the date of this contract, including any mined or produced before the certification, shall be subject to a percentage royalty which the Operator or his successor in interest shall pay to the Government, upon the net smelter returns, the net concentrator returns, or other net amounts realized from the sale or other disposition of any such production, in whatever form disposed of, including ore, concentrates, or metal, until the total amount contributed by the Government, without interest, is fully repaid, or said 10 years have elapsed, whichever occurs first, as follows:

(1) One and one-half (1½) per cent of any such net amounts not in excess of eight dollars ($8.00) per ton.

(2) One and one-half (1½) per cent of any such net amounts, plus one-half (½) per cent such net amounts for each additional full fifty cents ($0.50) by which such net amounts exceed eight dollars ($8.00) per ton, but not in excess of five (5) per cent of such net amounts.

(For instance: the percentage royalty on a net amount of five dollars ($5.00) per ton, would be one and one-half (1½) per cent; on a net amount of ten dollars ($10.00) per ton, three and one-half (3½) per cent.)

(b) As here used, "net smelter returns", "net concentrator returns", and "other net amounts realized from the sale or other disposition", mean gross revenue from sales; or if not sold, the market value, the market value of the material after it is mined in the form in which and the place where it is held. In the case of integrated operations in which the material is not disposed of as such, these terms mean what is or would be gross income from mining operations for percentage depletion purposes in income tax determination.

(c) To secure the payment of its percentage royalty, the Government shall have and is hereby granted a lien upon the land described in Article 2 and upon any production of minerals therefrom, until the royalty claim is extinguished by lapse of time or is fully paid.

(d) This article is not to be construed as imposing any obligation on the Operator or the Operator's successor in interest to engage in any mining or production operations.

Title to and disposition of property. All facilities, buildings, fixtures, equipment, or other items costing more than $50.00 each, paid for or purchased with funds contributed jointly by the Operator and the Government, although title may be taken in the name of the Operator, shall belong to the Operator and the Government jointly, in proportion to their respective contributions, and upon the completion of the work or the termination of the contract shall be disposed of promptly by the Operator for the joint account of the Government and the Operator, either by return to the vendor, by sale to others, or purchase by the Operator at a price at least as high as could otherwise be obtained, as may appear to be for the best interest of the Government, unless the Government, in writing, waives its interest in any such item. If necessary to accomplish such disposition, the Operator shall dismantle, sever from the land, and remove any such item, the cost thereof to be for the joint account of the parties in proportion to their respective interests. If the Operator, within 90 days after the receipt of written notice from the Government, fails, neglects, or refuses to dispose of such property, the Government may itself enter upon the land, take possession of, and remove and dispose of any such property as above provided.

EXHIBIT A

Description of the Work

The project consists of constructing a hoist building; installing a hoist; building a headframe; sinking the existing 60-foot shaft an additional 250 feet; and driving 350 feet of drift in the fault zone on the 310-foot level of the shaft. The location of the proposed work is shown on the attached map.

The estimated working time is ten months.

Estimated Costs of Project

(Items followed by an asterisk are allowable maximums)

Independent Contracts

None

Labor, Supervision, Consultants

Labor	$8,400.00	
Supervision	4,000.00*	
Consultants	None	
		$12,400.00

Operating Materials and Supplies

Gasoline, oil, grease	$2,600.00	
Explosives	1,700.00	
Timber	1,300.00	
2-inch pipe	200.00	
Mine rail	260.00	
Ventilation tubing	340.00	
Other supplies and materials necessary to complete this project	550.00	
		6,950.00

Operating Equipment

To be purchased:

None

To be rented:

None

Operating Equipment (Cont'd.)

To be furnished by Operator:

	Allowable Monthly Depreciation
220 cu. ft. truck mounted compressor	$ 60.00*
25 h.p. gasoline-engine driven hoist, cable bucket	12.00*
S73 Gardner-Denver sinker drill	10.00*
S55 Gardner-Denver jackhammer	4.00*
Water pressure tank	1.00*
Drill bar, column and saddle	2.00*
Blower and motor	4.00*
Ford pick-up truck	25.00*
Welding outfit	2.00*
1 Mine car	2.00*
Geiger counter	4.00*
Ultraviolet lamp	1.00*

Total estimated depreciation - $1,140.00

Depreciation is allowed on each of the above items only for months during which the item is used for the benefit of the project.

Initial Rehabilitation and Repairs

None

New Buildings, Improvements, Installations

Hoist Building:

Materials	$175.00	
Labor	75.00	
	Total -	$250.00*

Headframe:

Materials	350.00	
Labor	150.00	
	Total -	$500.00*

Bulldozing, 16 hours @ $10.00 per hour	160.00*
Installation of equipment	200.00*
Total -	$1,110.00*

Miscellaneous

Analytical work	$250.00	
Compensation insurance, payroll taxes	1300.00	
Maintenance of equipment	250.00	
Other	400.00	
	Total -	$2,200.00

Contingencies

Transportation of equipment and supplies	$300.00	
	400.00	
	Total -	$ 700.00

Total estimated cost	$24,500.00*
Government's participation at 90%	$22,050.00*

FILE COPY
SURNAME:

Ellis
Chandler

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

AUG 21 1953

Messrs. H. A. Glenny
and Scott M. Cutler
704 Newhouse Building
Salt Lake City, Utah

Re: Docket No. [illegible]-2271 (Uranium)
Contract No. [illegible]-8387
Glenny-Cutler Mining Co.,
Piute County, Utah

Gentlemen:

This is with reference to the subject Exploration Contract between you and the Government.

The final audit of the contract expenditures and the final reports of the Operator and of the Field Team have been received and accepted by this Administration. Of the total amount of $24,500.00 approved under the contract, the sum of $24,498.64 was expended, 90 percent of which, or $22,048.78, represented the Government's share. Disposition was made of certain supplies and materials for the joint account of the Government and the Operator in the amount of $275.15, thus reducing the total accepted cost of the project to $24,223.49, and total payment to you by the Government in the amount of $21,801.14.

The exploration work was completed in a satisfactory manner.

Because the results of the exploration were unfavorable and the Field Team indicates that no further exploration work is warranted with Government participation, it is not our intention to make a certification of discovery or development which would create a lien against the subject property. We are, therefore, closing our books and records with respect to this project. Your attention is called, however, to Article 7 (d) of the Contract which requires the Operator to "keep and preserve said records and accounts for at least 3 years after the completion of the project or the termination of this contract".

Your interest in the Exploration Program of the Defense Minerals Exploration Administration and your willingness to participate therein are appreciated.

Sincerely yours,

C. O. Mittendorf (fw)

Administrator

EWEllis/gla/db
8-19-53
cc to: Adm. Reading File
Docket
Messrs: H.D.Keiser, Rm. 3641
A.P.Butler, Jr., Rm. 3206, CBA

HHR 8-21-53

STANDARD FORM NO. 64

Office Memorandum • UNITED STATES GOVERNMENT

Department of the Interior
Defense Minerals Administration
RECEIVED
AUG 19 1953

TO : E. Wm. Ellis, DMEA Member
Uranium Commodity Committee

DATE: August 13, 1953

FROM : Arthur P. Butler, Jr., USGS Member
Uranium Commodity Committee

SUBJECT: Final Field Team Report DMEA Docket 2271 (uranium), Contract IDm-E387, R. A. Glenny and Scott M. Cutler, contractors, (Glenny-Cutler Mining Co.) J. D. G. claims, Sec. 4, T. 27 S., R. 3 W., Piute Co., Utah.

The final Field Team report on the results of exploration under the contract and at the property identified in the subject above has been reviewed and discussed with R. F. Griffith, Acting Bureau of Mines member, Uranium Commodity Committee, but not with Mr. J. O. Hosted, Atomic Energy Commmission, who is absent.

Comment

Work under this contract was to explore at moderate depth a fault zone trending about N. 10° E. along which occurrences of uranium minerals are sporadically distributed. Similar slightly richer occurrences occurred in a 60 - ft. shaft sunk by the applicant prior to the exploration with DMEA assistance. During exploration with DMEA funds shaft was sunk to the 325 feet level, and drifts were driven 166 feet NE. and 178 feet SW. along the fault zone. Assays of six samples cut in the drifts range from 0.006 to 0.026 percent U_3O_8. No commercial grade ore was discovered and no reserves are estimated.

In April the applicant submitted a request for an ammendment to the contract to permit additional exploration by drifting and crosscutting on the 325 ft level and on a new 150 ft level.

Because of the unfavorable results of the work on the contract already completed the Field Team recommends that the request for assistance in additional work be denied.

Recommendation

I concur in the Field Team's conclusion that no certifiable discovery resulted from the exploration and its recommendation that assistance for further exploration be denied.

Arthur P. Butler Jr.

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

224 New Customhouse
Denver 2, Colorado

August 3, 1953

Memorandum

To: Secretary to the Operating Committee, DMEA

From: DMEA Field Team, Region IV

Subject: Docket No. DMEA-2271 (Uranium), Contract Idm-E387, R.A. Glenny and Scott M. Cutler, a partnership, Piute County, Utah

Enclosed are the following final reports pertaining to the work performed under the subject contract:

1. Original and one copy of the operator's report.

2. Original and three copies of the final geologic report of the Geological Survey.

3. Original and three copies of the final engineering report by the Bureau of Mines.

The total funds authorized under the contract amounted to $24,500.00. The actual expenditures amounted to $24,498.64, in which the Government participated to the extent of 90 percent or the amount of $21,801.14. This is in conformance with the Report of Audit by the Contract Administration and Audit Division dated July 21, 1953.

The operator has complied with the terms of the contract and final payment to the operator was processed in this office on August 3, 1953.

The project consisted of construction of a hoist building and head frame, raising the collar of an existing 60-foot shaft 15 feet, sinking the shaft an additional 250 feet, and drifting 354 feet on the 325-foot level. No ore of commercial grade was found as a result of the exploration work and exposures indicate that no further exploration work is warranted. Therefore, no certification of a discovery is recommended.

W. H. King
W. H. King

A. H. Koschmann
A. H. Koschmann

Noted by
DMEA Operating Committee
8-12-53
(Date)

UNITED STATES
DEPARTMENT OF THE INTERIOR
DEFENSE MINERALS EXPLORATION ADMINISTRATION
WASHINGTON 25, D. C.
200 New Customhouse
Denver 2, Colorado

July 13, 1953

Memorandum

To: DMEA Field Team, Region IV

From: A. H. Koschmann

Subject: DMEA Docket 2271, Glenny-Cutler Mining Company, Marysvale, Piute County, Utah

Enclosed are 11 copies of a final geologic report by C. G. Tillman of the U. S. Geological Survey covering the above docket.

No ore has been discovered nor are the showings of uranium mineralization sufficiently encouraging to merit further exploratory work at this time.

A. H. Koschmann
Supervising Geologist
Colorado-Wyoming

Enclosures (11)

Reviewed by
DMEA OPERATING COMMITTEE
8-12-53
(date)

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY

Room 208 - 222 So. West Temple
Salt Lake City 1, Utah
July 10, 1953

Memorandum

To: A. H. Koschmann, Field Team Region IV

From: Ralph J. Roberts, Utah-Nevada District Office

Subject: DMEA 2271, Glenny-Cutler Mining Company, Marysvale, Piute County, Utah

Enclosed are eleven copies of a final geologic report on the Glenny-Cutler Mining Company, Marysvale, Piute County, Utah, DMEA 2271. The report was submitted to the U. S. Bureau of Mines to be included in their engineering report, but was inadvertantly returned to us.

The Glenny-Cutler Mining Company requested a loan to explore for uranium at depth on a strong north striking, uranium bearing fault zone on their J. D. G. claims in the Marysvale uranium district, Piute County, Utah.

An examination was made and a loan of $22,050 was granted on August 19, 1952. Work under the contract was completed in March, 1953. Exploratory work, in the area, by the AEC indicated that there may be zones of secondary enrichment of uranium at depth where the rhyolite cover has been eroded off the underlying quartz monzonite. Consequently, deepening of an existing 60 foot shaft to about the 325-foot level was completed. Drifting in the fault zone north and south for 344 feet did not find uranium of commercial grade, and the project did not reveal any increase in grade of uranium at depth on the J. D. G. claims.

There are no measurable reserves of uranium ore on the J. D. G. claim, and there has been no significant discovery of uranium on the property. It is therefore recommended that no further exploratory work be done on the J. D. G. claims under a DMEA loan at the present time.

Ralph J. Roberts

By: J. William Hasler
J. William Hasler

Reviewed by
DMEA OPERATING COMMITTEE

8-12-53
(date)

JUL 1953
RECEIVED
U.S. Geological Survey
Mineral Deposits Branch
Denver

UNITED STATES
DEPARTMENT OF THE INTERIOR
DOUGLAS McKAY, SECRETARY

DEFENSE MINERALS EXPLORATION ADMINISTRATION

REPORT OF EXAMINATION BY FIELD TEAM
REGION IV

DMEA 2271 - Glenny-Cutler Mining Company

Marysvale, Piute County, Utah

By

C. G. Tillman, Geologist
U. S. Geological Survey

July 2, 1953

Reviewed by
DMEA OPERATING COMMITTEE
8-12-53
(date)

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Fig. 1 - Index Map of Utah

2 - 325 Foot Level of the J. D. G. Mine, Glenny-Cutler Mining Company, Marysvale, Piute County, Utah

FINAL GEOLOGIC REPORT

DMEA 2271, GLENNY-CUTLER MINING COMPANY

MARYSVALE, PIUTE COUNTY, UTAH

INTRODUCTION

The Glenny-Cutler Mining Company applied for a loan, DMEA Docket 2271, to explore for uranium ore on the J. D. G. claims near Marysvale, Piute County, Utah. A field examination was made in February, 1952 by J. W. Hasler, geologist, U. S. Geological Survey, and the property appeared to merit a limited amount of exploratory work. A loan of $22,050 was granted on August 19, 1952 to aid in the completion of the exploration program described below. Work was completed in March, 1953.

Location and Accessibility

The uranium deposits of the Marysvale region are in the Durkee mining district of the Antelope Range. The J. D. G. claims are in Sec. 4, T. 27 S., R. 3 W., SLB&M, and can be reached by driving north from Marysvale, Utah for about 3 1/2 miles along a gravelled road on the east side of the Sevier River (Fig. 1).

GEOLOGY

The Marysvale, Utah region is underlain by volcanic rocks of Tertiary age. The "older" Bullion Canyon series, consisting of latite breccias, tuffs, and flows, has been intruded by stocks, dikes, and plugs of quartz monzonite, granite, and related rocks. Following a period of erosion, further volcanic activity resulted in the deposition of the "younger" Tertiary Mt. Belknap rhyolitic flows, flow breccias, and tuffs as well as the later Dry Hollow quartz latite and latite flows and the interbedded Joe Lott rhyolite and latite tuff. Olivine basalt flows of late Tertiary or Quaternary age were subsequently extruded over parts of the area.

Uranium deposits are found in the Antelope Range, and east-striking structure north of Marysvale, Utah, which extends from the Tushar Range on the west to the Sevier Plateau on the east. Tertiary rocks of the "younger" volcanic series dip north and south from the axial part of the range.

ORE DEPOSITS

Uranium minerals in the Marysvale area are largely confined to narrow veins and gouge-filled fissures in quartz monzonite. In addition, some secondary uranium minerals are found in the overlying volcanic rocks. The veins and fissures strike about N. 60° E. and are nearly vertical. The uranium minerals include pitchblende, uranophane, torbernite, and autunite; fluorite and pyrite are common associates.

At the Glenny-Cutler mine on the J. D. G. claims, a large, sparsely mineralized, fault zone in quartz monzonite strikes north to N. 10° E. and dips about 80° W. The zone measures as much as 40 feet across and contains four strong faults. The faults have gouge zones as much as 12 inches wide, and crushed zones in the footwall and hangingwall as much as 2 1/2 feet wide. The quartz monzonite throughout the fault zone has been hydrothermally altered and displays intense argillic alteration, pyritization, silicification, and contains irregular lenses of quartz. The fault zones are weakly mineralized with erratically distributed secondary uranium minerals.

Exploratory work by the A.E.C. indicates that there may be a secondary enrichment of uranium at depth where the rhyolite cover has been eroded off the quartz monzonite. Near-surface uranium minerals may have been oxidized, leached, and carried downward by circulating ground water to be redeposited at greater depth. Samples taken at the surface and at the foot of a 60 foot shaft on the J. D. G. claim at the time of the

initial examination show a slight increase in grade over that vertical interval. Assays of samples cut on the 325 foot level at this mine, however, show no significant change grade to this depth.

ORE RESERVES

There are no measurable reserves of uranium ore on the J. D. G. claims of the Glenny-Cutler Mining Company.

PROPOSED EXPLORATION

The applicant proposed to sink an existing 60 foot shaft on the J. D. G. M. M. claim an additional 250 feet to a total depth of about 310 feet, and to drive along promising uranium showings in the fault zone for a total distance of 350 feet.

EXPLORATORY WORK

The collar of the shaft was raised 15 feet after which the shaft was sunk to about the 325 foot level. Drifts were driven about 166 feet N. 30° E. and for about 178 feet S. 30° W. from the shaft (Fig. 2). Strong gouge filled faults were followed in both directions. The quartz monzonite along these faults, while often retaining its texture, is soft as a result of shearing and argillic alteration. At several places along the faults the rock is stained with iron oxide. Samples taken along fault zones showing radioactivity indicate that no uranium-bearing material of ore grade is present. The following are assays of four samples cut in the north drift (Fig. 2):

Sample No.	Length	U_3O_8 (percent)
1	4.5 ft.	0.008
2	5.0 ft.	0.016
3	6.0 ft.	0.026
4	4.5 ft	0.017

Two samples cut in the south drift assayed as follows:

5	5.0 ft.	0.015
6	5.0 ft.	0.006

Two samples cut at the bottom of the Royal Purple incline workings, (for map see original report), gave the following results:

Sample No.	Length	U_3O_8 (percent)
—	3.0 ft.	0.015 (In north drift 35 feet north of crosscut)
—	3.0 ft.	0.018 (At intersection of crosscut and north drift)

Thus, although uranium-bearing structures exist at several places on the 325 foot level, the grade is too low and the tonnage insufficient for the mineralized material to constitute ore.

ADDITIONAL WORK

On April 17, 1953 the applicant submitted a request for an amendment to the contract to provide for additional exploratory work on the J. D. G. claims as follows:

(1) Drift 100 feet north beyond present face on the 325 foot level.
(2) Drift 100 feet south beyond present face on the 325 foot level.
(3) Crosscut 200 feet easterly from a point 45 feet south of the shaft on the 325 foot level to explore a structure partially developed in the Royal Purple incline. Then drift a total of 200 feet north and south along this structure.
(4) Crosscut 100 feet westerly from a point 25 feet north of the shaft on the 325 foot level to explore a structure indicated by diamond drill hole 49 (for location see original report).
(5) Prepare a station at the 150 foot shaft level and drift north 100 feet and south 100 feet to explore possibilities of ore occurrence nearer the surface on the same structures exposed at the surface and on the 325 foot level.

The applicant's request totals 900 feet of drifting and crosscutting at an estimated cost of $22,500.

SUMMARY, CONCLUSIONS, AND RECOMMENDATIONS

On August 19, 1952 the Glenny-Cutler Mining Company received a DMEA loan of $22,050 to aid in exploration for uranium ore on the J. D. G. M. M. claim near Marysvale, Utah.

The Marysvale region is underlain by the "older" Bullion Canyon series and the "younger" Mt. Belknap series of Tertiary volcanic rocks. The rocks consist of tuffs, flow breccias, and flows that range in composition from rhyolite to latite. Late Tertiary or Quaternary basalt flows are present in part of the Marysvale area. The "older" Bullion Canyon series has been intruded by stocks and dikes of quartz monzonite, granite, and related rocks.

Uranium deposits are found in the Antelope Range, an east-striking structure north of Marysvale, Utah, which extends from the Tushar Range on the west to the Sevier Plateau on the east.

Uranium minerals in the Marysvale area are found largely in veins and gouge filled fissures in quartz monzonite. Uranium-bearing minerals include pitchblende, uranophane, torbernite and autunite. Associated minerals include fluorite and pyrite.

At the Glenny-Cutler mine on the J. D. G. claims a large fault zone in quartz monzonite strikes north to N. 10° E. and dips about 80° W. The quartz monzonite in this zone is highly altered and sheared. Weak uranium mineralization is present along some of these faults at the surface and at the foot of the original shaft. Exploration work in the Marysvale area by the A. E. C. indicated that there might be some secondary enrichment of uranium at depth in places where the rhyolite cover has been eroded off the quartz monzonite. Such enrichment has apparently not occurred at the J. D. G. mine.

There were no measurable ore reserves at the Glenny-Cutler mine at the time of the initial examination, nor have any been established

as a result of the exploratory work carried on with DMEA aid.

The Glenny-Cutler exploration project consisted of deepening a pre-existing 60-foot shaft an additional 250 feet and drifting north and south along possible ore-bearing faults. After first raising the shaft collar 15 feet, the shaft was sunk to the 325-foot level and a total of 354 feet of drift was driven. No ore bodies or zones of strong uranium mineralization were opened by this work.

The applicants now wish to amend their contract to provide for an additional 900 feet of drifting and crosscutting on this property. The geological objective of the original exploration program has been attained. Samples along the fault zone on the 325-foot level indicate that no ore has been discovered nor are the showings of uranium mineralization sufficiently encouraging to merit further exploratory work at this time.

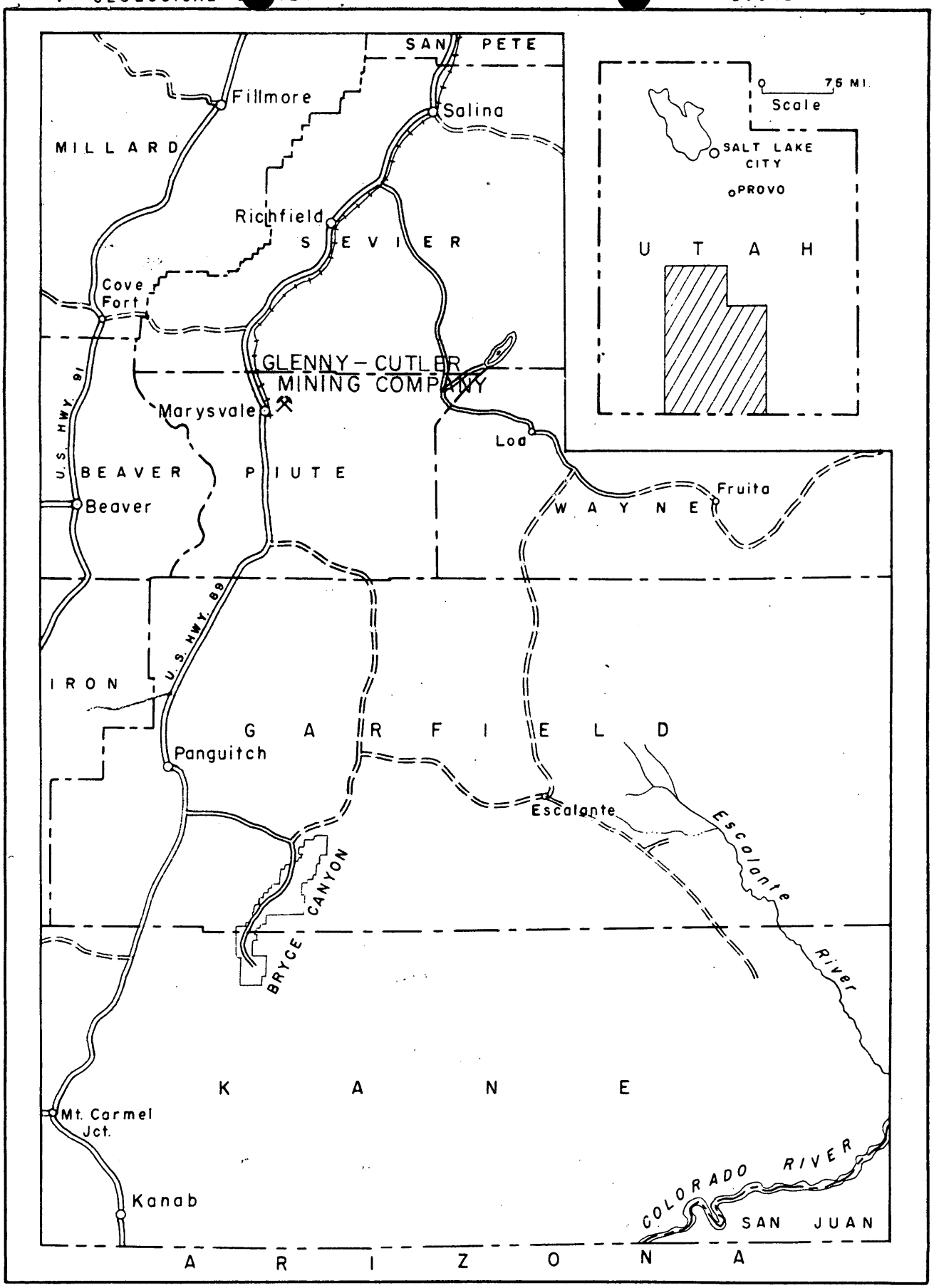

FIG. 1 INDEX MAP OF UTAH

0 5 10 15 20 MILES
Scale

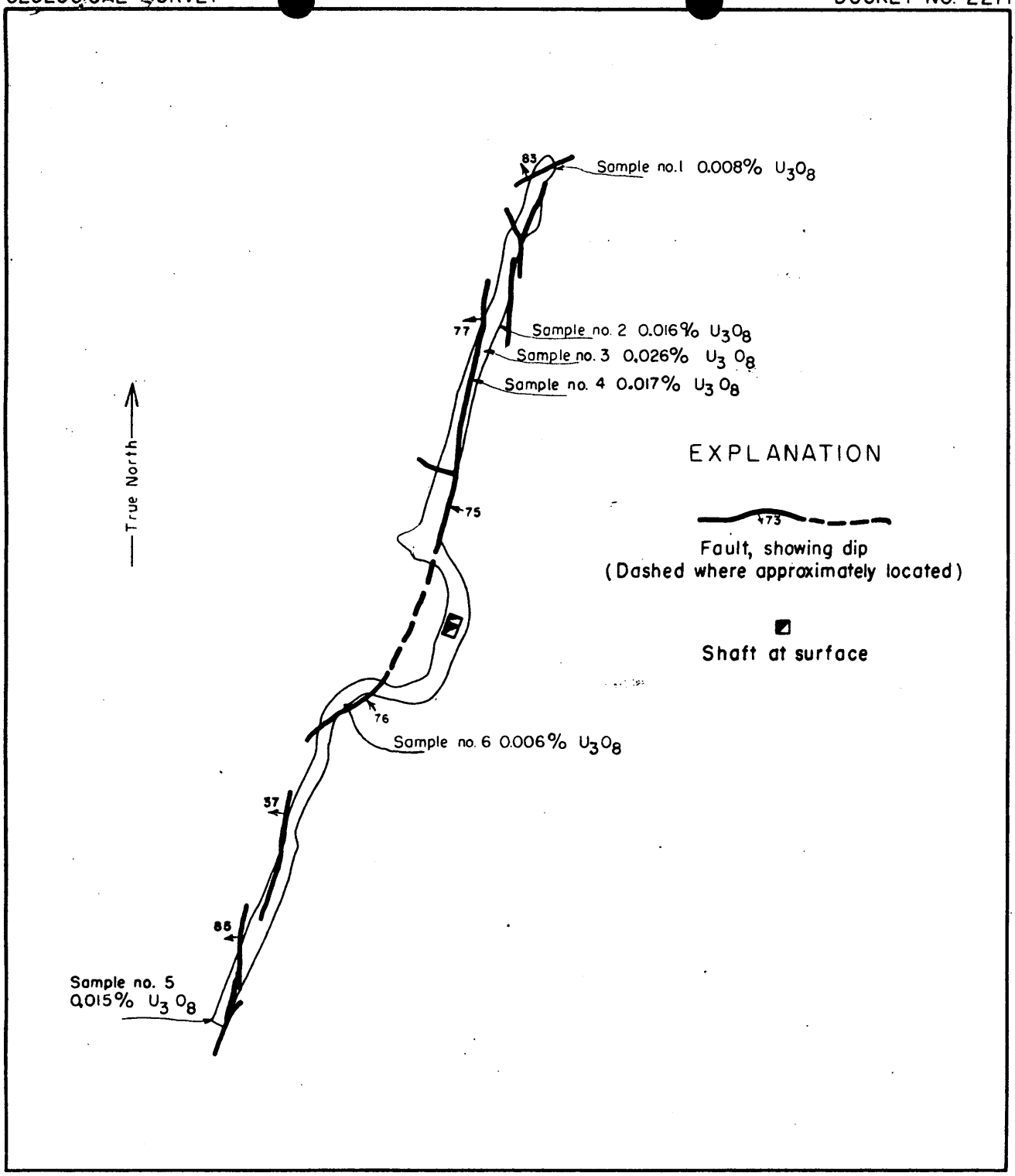

FIG. 2

Geology by J. W. Hasler and
C. G. Tillman–U. S. G. S. 4/16/53

325 FOOT LEVEL OF THE J. D. G. MINE
GLENNY–CUTLER MINING COMPANY
MARYSVALE, PIUTE COUNTY, UTAH

0 50 100 150 ft.

Scale

FILE COPY
SURNAME:

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

JUL 27 1953

Mr. T. H. Brading
DMEA Auditor
224 New Customhouse Building
Denver 2, Colorado

Re: Idm-E387, Docket 2271
R. A. Glenny and Scott M. Cutler

Dear Mr. Brading:

Reference is made to your transmittal letter of July 21, 1953, submitting copies of the Audit Reports and Certificates for the above-cited contract.

The Reports and Certificates have been accepted by this office and may be distributed in the usual manner.

Sincerely yours,

(Signed) J. L. Chambers

Jay L. Chambers, Chief
Contract Administration
and Audit Division

cc: Docket
Admr. Reading File
Mr. Chambers

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF MINES
1600 EAST FIRST SOUTH STREET
SALT LAKE CITY 1, UTAH

Mining Division
Date Rec'd.
JUN 1 - 1953
BUREAU OF MINES
Denver, Colorado

May 29, 1953

Memorandum

To: W. H. King, Chief, Mining Division, Region IV

From: Chief, Minerals Development Branch, Mining Division, Region IV

Subject: DMEA-2271, Contract Idm-E387, Glenny-Cutler Mining Co., Piute County, Utah.

Enclosed are the original and 10 copies of a final engineering report prepared by M. M. Gilkey describing the project work completed under the subject contract.

The total allotted amount for the project work was $24,500. Actual expenditures pending final audit closely approximate this figure.

Stephen R. Wilson

Stephen R. Wilson

Enclosure

Reviewed by
DMEA OPERATING COMMITTEE
8-12-53
(date)

SUMMARY, CONCLUSIONS AND RECOMMENDATIONS

By M. M. Gilkey

A DMEA loan of $22,050 to aid in exploration for uranium ore was granted the Glenny-Cutler Mining Co. on August 19, 1952. The property, situated 3½ miles northeast of Marysvale, Utah, is known locally as the J.D.G. mine. Project work was started on September 6, 1952, and completed on March 31, 1953.

No ore of commercial grade was found as a result of the work.

The project consisted of construction of a hoist building and headframe, raising the collar of an existing 60-foot shaft 15 feet, sinking the shaft an additional 250 feet, and drifting 354 feet on the 325-foot level.

In April 1953 the operator requested further Government aid in driving 900 additional feet of drifts and crosscuts.

The shaft was sunk on the predominant geological structure on the property, a highly altered fault zone in quartz monzonite. The fault zone is 5 to 40 feet wide, strikes north to N. 30° E., and dips about 85 degrees to the west. Secondary uranium minerals are erratically and sparsely distributed in the zone. Assays of six samples taken on the 325-foot level and of two samples from the nearby Royal Purple incline ranged from 0.006 to 0.026 percent U_3O_8. Geiger counter readings indicate material of comparable grade in the shaft and on the surface.

Reviewed by
DMEA OPERATING COMMITTEE

8-12-53
(date)

Pending the final audit, the cost figure for the project is $24,498.84, of which the Government's share is $22,048.96. Approved Government participation is $22,050.00. This leaves $1.04 as the Government's share unexpended.

Materials and supplies on hand at the completion of the project cost $1,299.41. Four disposition bids ranged from $232.00 to $275.15, the highest bid being that of the operator. It is recommended that the operator's bid be accepted and that the final reimbursement to the operator be adjusted accordingly.

The operator conducted the project efficiently and cooperatively.

The writer concurs with the Geological Survey member of the DMEA field team in concluding that "No ore has been discovered, nor are the showings of uranium mineralization sufficiently encouraging to merit further exploratory work at this time."

GLENNY-CUTIER MINING COMPANY
PIUTE COUNTY, UTAH
DMEA-2271
Contract Idm-E387
Uranium

Final Report

By M. M. Gilkey
Mining engineer
Bureau of Mines

Reviewed by
DMEA OPERATING COMMITTEE
8-12-53
(date)

INTRODUCTION

The Glenny-Cutler Mining Co. applied for an exploratory loan on uranium property consisting of two leased claims near Marysvale, Piute County, Utah. The property was examined by DMEA representatives February 6, 1952. On August 19, 1952, an exploratory project contract for the amount of $24,500 was entered into and on September 6, 1952, work was started. The project was completed March 31, 1953.

LOCATION

The Glenny-Cutler property is situated in Sec. 4, T. 27 S., R. 3 W., S.L.B. & M., Durkee mining district, Piute County, Utah. The property is reached by driving northeast 3½ miles on a good, graveled road from U. S. Highway 89 at Marysvale, Utah.

DESCRIPTION OF THE WORK COMPLETED

The work done under this long-form contract consisted of the following:

1. Constructing a hoist building.
2. Raising the collar of the existing 60-foot shaft 15 feet.
3. Building a wooden headframe.
4. Sinking the shaft an additional 250 feet.
5. Driving 354 feet of drift in the fault zone on the 325-foot level.

An existing 1½-compartment, 60-foot shaft had been sunk in the fault zone at an inclination of about 85 degrees westerly, and timbered with

4" x 6" cribbing. To facilitate dumping of waste, the collar of this old shaft was raised 15 feet. Under the DMEA contract the shaft was sunk an additional 250 feet in the fault zone at approximately the same angle of inclination. The timber used in this section consisted of 8" x 8" wall plates and end plates and 6" x 6" dividers. Two-inch lagging was used where needed to prevent slough-ing. The "one-half" compartment was used as a manway and pipe compartment. Two by fours attached to the footwall timber served as skids for the 900-pound bucket in the hoisting compartment.

Drifts 5' x 7' in cross section were driven in the fault zone on the 325-foot level from the bottom of the shaft. Drifting totaled 166 feet to the north and 178 feet to the south. A crosscut from the north drift was driven 10 feet to the west for the purpose of locating the hanging wall. An attempt was made to follow the footwall, in both the north and south drifts, but because of changes in strike, this was accomplished only in the north drift, for any considerable distance. No timber was used in the drifts.

ADDITIONAL WORK PROPOSED BY THE OPERATOR

In April 1953, after the above-described work was completed, the operator submitted a request for additional Government aid. He proposed further exploration as follows:

On the 325-foot level

1. Drive the north drift an additional 100 feet.

2. Drive the south drift an additional 100 feet.

3. Crosscut 100 feet west from a point in the north drift about 25 feet north of the shaft, to explore structure penetrated by Diamond Drill Hole No. 49.

4. Crosscut 200 feet east from a point 45 feet south of the shaft, to intersect the structure exposed in the Royal Purple incline.

5. Drift 100 feet north on the Royal Purple structure.

6. Drift 100 feet south on the Royal Purple structure.

At 150 feet below the collar of the shaft

1. To prepare a station at the 150-foot level.

2. Drift 100 feet north.

3. Drift 100 feet south.

This proposed work totals 900 feet of drifting and crosscutting at an estimated cost of $22,500.

DESCRIPTION OF THE DEPOSITS

The shaft was sunk on the predominant geological structure on the property, a persistent fault zone in quartz monzonite striking north to N. 30° E. and dipping about 85 degrees to the west. The fault zone, which varies in width from 5 to 40 feet, contains small amounts of secondary uranium minerals, including uranophane, torbernite, and autunite. Characteristics of the fault zone are intense alteration, pyritization, and silicification. Gouge is prominently developed.

The assays of six samples taken of radioactive material on the 325-foot level show that the uranium mineralization is too weak to constitute ore (Fig. 2).

The assays of four samples taken in the north drift are as follows:

Sample No.	Width (feet)	Percent U_3O_8
1	4.5	0.008
2	5.0	0.016
3	6.0	0.026
4	4.5	0.017

The following two samples were taken in the south drift:

5	5.0	0.015
6	5.0	0.006

Two samples cut in the drift at the bottom of the Royal Purple incline assayed as follows:

-	3.0	0.015 (In drift N. at 35' from XC)
-	3.0	0.018 (At intersection of XC and drift N.)

Geiger counter readings indicate erratic distribution of material of comparable grade in the shaft and on the surface. It is evident, therefore, that no ore approaching commercial grade is present.

EXPENDITURES

The total amount approved for the project was $24,500, of which the Government's share, at 90 percent participation, amounted to $22,050. The figure for actual expenditures, pending the final audit,

is $24,498.84, and the Government's share on this basis is $22,048.96. This leaves $1.04 as the Government's share unexpended.

No ore was produced during the operation of the project.

COMPETENCY OF OPERATOR

The operator was efficient and cooperative. Satisfactory progress was maintained during the 7 months of the project.

EQUIPMENT PURCHASED FOR PROJECT

No operating equipment was purchased with funds contributed jointly by the operator and the Government. However, at the completion of the project, there remained on hand certain categories of supplies and materials in quantities sufficient to require disposition by the operator for the joint account of the Government and the operator. These categories include ventilation tubing, track and fittings, pipe and fittings, drill steel and bits, and timber. Included in the timber item are the frame hoist building, headframe, and about 2,000 board feet of 2-inch lagging. The costs of these materials and supplies are as follows:

Item	Cost
450 feet ventilation tubing	$272.46
465 feet 12-lb. track and fittings	292.18
1230 feet 2-inch, 1¼-inch, and ½-inch pipe and fittings	217.77
16 pieces of drill steel and 200 Timken bits	180.00 (approx.)
4,000 board feet of timber	337.00
Total cost	$1,299.41

The ventilation tubing is in fair-to-poor condition and the 16 pieces of drill steel and 200 Timken bits need reconditioning. Approximately 350 feet of the track is installed underground and 115 feet on the surface. All of the pipe is installed underground. The cost for labor in salvaging the track and pipe is estimated at $200. Salvaging the timber in the headframe and lumber in the hoist building would cost possibly $100.

Three bids, on all of the materials and supplies described above, were received by the operator from the following bidders:

Bidder	Bid
Deer Trail Mines, Marysvale, Utah	$240.00
H. Spencer Gibbs, Marysvale, Utah	$232.00
Utah Bit and Steel Service Co., Midvale, Utah	$248.58
The operator submits his own bid amounting to	$275.15

It is recommended that the operator's bid of $275.15 be accepted and that this amount, less $27.52, the operator's 10 percent participation, or $247.63, be deducted from the final reimbursement to the operator.

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF MINES
1600 EAST FIRST SOUTH STREET
SALT LAKE CITY 1, UTAH

Mining Division
Date Rec'd.
JUN 1 - 1953
BUREAU OF MINES
Denver, Colorado

May 29, 1953

Memorandum

To: W. H. King, Chief, Mining Division, Region IV

From: Chief, Minerals Development Branch, Mining Division, Region IV

Subject: DMEA-2271, Contract Idm-E387, Glenny-Cutler Mining Co., Piute County, Utah.

Enclosed are the original and four copies of a final report submitted by the operator to cover all work completed under the subject contract.

Stephen R. Wilson

Stephen R. Wilson

Enclosure

TERMINATION and COMPLETION

Covering

DOCKET NO. DMEA 2271 - CONTRACT NO. Idm-E387
R. A. GLENNY and SCOTT M. CUTLER

URANIUM

The work on the above project was begun September 6, 1952 and completed March 31, 1953.

Due to the elevation of the collar of the Old Shaft, it was necessary to bulldoze and fill in to raise the collar an additional fifteen (15) feet to get the required elevation for dumping purposes.

HEADFRAME

A headframe was erected consisting of four (4) uprights, 8 x 8 x 20 feet high, plus two - 22 foot angle braces, two - 24 foot sills, plus numerous small braces and etc., including the solid cribbing and shoring for foundation. The labor consisted of the building and erecting of chute dumps, tie rods, and installation of the sheave wheel, bolting and etc.

HOIST HOUSE

The hoist house building is 14 x 16 and 10 feet high on the high side, down to 8 feet on the low side, and consists of two windows, two doors, bench and shelves, with composition roof covering.

SHAFT

The Old Shaft was timbered with 4 x 6 and round timber. The Contract Shaft sinking started at the sixty (60) foot level of the old shaft, and continued for a further distance of two hundred and fifty (250) feet and was timbered with 8 x 8 timber and lagged were needed. Bulk heads were installed on the man-way side at a distance of every thirty (30) feet, and inclination was 83 to 85 degrees to the West. This shaft was a 4 x 6 inside measurement and consisted of hoisting compartment and man-way, and ladders were installed in the man-way compartment with slides for a 900-lb. hoist bucket. On the man-way side two-inch air pipe was installed to the bottom of the shaft for a distance of 325 feet, and water lines of one-half inch were installed for the full distance of 325 feet, and eight inch ventilation tubing was installed for the full distance of 325 feet, and, in addition, bell cord signal system was installed including bells.

DRIFTS

North Drift - The North Drift was driven from the bottom of the shaft from the 325 foot level to the north for a distance of one hundred sixty six (166) feet following the footwall. Also a ten (10) foot cross cut was driven to the west to the width of the vein.

South Drift - The South Drift was driven from the bottom of the shaft from the 325 foot level to the south for a distance of one hundred seventy eight (178) feet, entirely on the fissure.

350 feet of 12-lb. Track, fittings, and ties were installed; also 300 feet of $1\frac{1}{4}$ inch air pipe, 300 feet of $\frac{1}{2}$ inch water pipe, and the necessary ventilation tubing was carried along and installed during the progress of this drift work.

GEOLOGY - SHAFT

The shaft was sunk entirely in the fault zone, and was very altered with small quantities of autunite for the first one hundred (100) feet. The Pyrites were much more abundant on the last 125 feet, showing more primary material. It appeared from the Geiger Counter readings from the 200 foot level the best count was associated with primary minerals, and our autunite disappeared from the 150 foot level. The entire structure shows intense alteration and movement.

GEOLOGY - NORTH DRIFT

Our work to the north proved disapointing due to the fact that no east or west intersections were encountered the entire distance. We expected our greatest values at these intersections. The east and west structures were not strong enough to penetrate that depth. The entire North Drift followed the footwall of the fault zone, and the best values were encountered 70 feet north of the shaft, where Geiger Counter readings showed the greatest of radioactive material.

GEOLOGY - SOUTH DRIFT

The first 70 feet in the South Drift followed the center of the structure as nearly as possible, and the remainder followed the footwall. The last 50 feet showed some fluor-spar in this drift, and this drift showed abundant pyrites and quartz the entire distance. Herewith listed is the Halross scintillometer readings as furnished by the Atomic Energy Commission covering the Shaft and North and South Drifts:

SHAFT READINGS

FT.	CPS	FT.	CPS	FT.	CPS
0	100	110	190	220	200
10	140	120	175	230	240
20	250	130	175	240	225
30	250	140	180	250	260
40	280	150	250	260	240
50	350	160	190	270	250
60	360	170	190	280	225
70	240	180	250	290	250
80	210	190	240	300	225
90	200	200	175	310	225
100	190	210	190	320	205

APPROXIMATE NORTH READINGS

10	210
20	190
30	250
40	275
50	280
60	200
70	210
80	350
90	210
100	200
110	190
120	180
130	190
140	200
150	200
160	190
166	210

APPROXIMATE SOUTH READINGS

10	230
20	260
30	250
40	210
50	240
60	110
70	130
80	90
90	70
100	90
110	100
120	130
130	125
140	125
150	120
160	120
170	120
178	120

EXPENDITURES

The total of the contract covering the above project was $24,500.00, the Government participation 90%, or $22,050.00; and the Operator's participation 10%, or $2,450.00, of which the total sum of $24,498.64 was expended on the various accounts as submitted on our Form MF-104 as herewith listed, which were distributed as follows:

Bulldozing	$		$ 160.00
Headframe - Labor		150.00	
Timber & Supplies		350.00	500.00
Hoist Building			
Labor		75.00	
Timber & Supplies		155.53	230.53
Shaft			
Labor- Installation of Equipment			200.00
Labor - Sinking		7,588.10	
Supervision		2,556.00	
Depreciation		551.19	
Timber		1,488.29	
Explosives		779.69	
Pipe		65.52	
Track		50.00	
Vent. Tubing		169.85	
Gas,Oil,Other Supl.		1,305.33	
Repairs to Equip.		417.13	
Payroll Taxes		307.21	
Liability Insurance		365.54	
Miscellaneous Exp.		9.36	
Transportation of supplies		22.51	15,675.72
Drifting			
Labor		4,090.63	
Supervision		1,134.00	
Depreciation		266.60	
Timber		18.74	
Explosives		570.88	
Pipe		152.25	
Track		242.18	
Vent. Tubing		102.61	
Gas,Oil, Other Suppl.		678.19	
Repairs to Equip.		159.75	
Payroll Taxes		110.01	
Liability Insurance		195.86	
Miscellaneous Exp.		1.22	
Transportation of supplies		9.47	7,732.39
		TOTAL	$ 24,498.64

MATERIALS AND SUPPLIES ON HAND AT COMPLETION OF PROJECT-

450 feet of Vent Tubing at a cost of	$ 272.46
12-lb. Track - 465 feet	292.18
1,230 feet of 2", 1¼", ½" Pipe & fittings	217.77
16 Pieces of Drill Steel- 200 Timken Bits	180.00
Timber (including what was used in headframe, hoist building, lagging)	
1,200 ' in headframe	
2,000 ' lagging	
800 ' hoist house	
4,000 ' of timber	337.00
	$1,299.41

The 450 feet of vent tubing is in poor condition; the 12-lb. track is in fair condition; the 1,230 feet of pipe is in fair condition; the 16 pieces of drill steel and 200 timken bits are in very poor condition. Headframe, hoist building timber and lagging are in good condition.

The estimated cost of dismantling and salvaging the pipe, track, timber, hoist house, headframe should be anywhere from sixteen to twenty man shifts, and would depend on having a hoist on the premises. Otherwise a greater expense would be involved without the use of a hoist in salvaging the underground supplies.

BIDS

The following bids have been submitted covering the above supplies on hand, to be sold to the highest bidder:

DEER TRAIL MINES	$ 240.00
H. SPENCER GIBBS	232.00
UTAH BIT & STEEL SERVICE CO.	248.58
GLENNYand CUTLER	275.15

Respectfully submitted,

R. A. GLENNY and SCOTT M. CUTLER

By R. A. Glenny
R. A. Glenny

Dated this 26th day of May, 1953.

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

DEPARTMENT OF THE INTERIOR
Defense Minerals Administration
JAN 15 1953

224 New Customhouse
Denver 2, Colorado

January 7, 1953

Memorandum

To: Secretary to the Operating Committee
Defense Minerals Exploration Administration

From: Executive Officer, Field Team, Region IV

Subject: Form MF-104, DMEA Docket 2271, Contract Idm-E387 (Uranium)
Glenny-Cutler Mining Co., Piute County, Utah

Enclosed are two copies of the Operator's Monthly Progress Report Form MF-104, and MF-104A, Operator's Narrative Report, Inspecting Engineer's Narrative Report, and other supporting data for the period of November, 1952, pertaining to DMEA Docket 2271, Contract Idm-E387, Glenny-Cutler Mining Company.

John F. Shaw for
W. H. King

Enclosures

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

DEPARTMENT OF THE INTERIOR
Defense Minerals Administration
1952

224 New Customhouse
Denver 2, Colorado

November 24, 1952

Memorandum

To: Secretary to the Operating Committee
Defense Minerals Exploration Administration

From: Executive Officer, Field Team, Region IV

Subject: Form MF-104, DMEA Docket 2271, Contract Idm-E387 (Uranium) Glenny-Cutler Mining Co., Piute County, Utah

Enclosed are two copies of the Operator's Monthly Progress Report Forms MF-104, and MF-104A, Operator's Narrative Report, Inspecting Engineer's Narrative Report, and other supporting data for the period of October, 1952, pertaining to DMEA Docket 2271, Contract Idm-E387, Glenny-Cutler Mining Company, Piute County, Utah.

W. H. King

W. H. King

Enclosures

10/22/52 gla

STANDARD FORM NO. 64

Office Memorandum • UNITED STATES GOVERNMENT

TO : E. Wm. Ellis, DMEA Member, Uranium Commodity Committee

DATE: October 21, 1952

FROM : Arthur P. Butler, Jr., USGS Member, Uranium Commodity Committee

SUBJECT: Final Report, DMEA Docket 2271, Glenny Cutler Mining Co., Marysvale Operations, Piute County, Utah.

Available evidence about this property indicates that it is less promising than other nearby properties. The degree of increase in grade downward is not impressive, and the undocumented statement that current (Feb. 1952) AEC data suggest secondary enrichment at depth on one of the major veins does not agree with published statements of the AEC (Taylor, A. O., et al, 1951, Geology and uranium deposits of Marysvale, Utah, RMO-896, p. 16) that * * * "Pitchblende-fluorite ore shoots as now exposed show no marked tendency to be richer than their overlying secondary counterparts." * * * Nevertheless, the presence of a marked-uranium-bearing structure within the same general rock mass as other productive veins, though differing from them in orientation, warrants some additional exploration to evaluate the potentialities of this particular structure and to furnish information that may be useful in appraising similarly oriented structures elsewhere in the general area. For the latter reasons, I concur in the examining team's recommendation that exploration assistance be granted for the Government's proportionate share of a total cost of $24,477.50.

Arthur P. Butler, Jr.

Arthur P. Butler, Jr.

DEPARTMENT OF THE INTERIOR
Defense Minerals Administration
RECEIVED
OCT 22 1952

10/10/52 gla

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

October 9, 1952

Memorandum

To: Ernest William Ellis, DMEA Member,
Uranium Commodity Committee, Room 4640

From: H. D. Keiser, Bureau of Mines Member,
Uranium Commodity Committee

Subject: Final Report, DMEA Docket 2271, Glenny-Cutler Mining Co.,
Piute County, Utah.

I have reviewed the subject report and discussed it with Arthur P. Butler, Geological Survey Member, and Joseph O. Hosted, representative of the Atomic Energy Commission.

It is recommended that the report be approved.

H. D. Keiser

DEPARTMENT OF THE INTERIOR
Bureau of Mines Administration
RECEIVED
OCT 10 1952

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

224 New Customhouse
Denver 2, Colorado

DEPARTMENT OF THE INTERIOR
Defense Minerals Administration
SEP 22 1952

September 15, 1952

Memorandum

To: Administrator, Defense Minerals Exploration Administration
Attention: 210

From: Field Team, Region IV

Subject: Final Report, DMEA Docket 2271, (Uranium) Glenny Cutler Mining Co., Piute County, Utah

Enclosed are the original and three copies of the final report on DMEA-2271.

The contract has been signed and is in effect.

W. H. King
W. H. King

A. H. Koschmann
A. H. Koschmann

Enclosures

Sd 9/23/52

Mining Division
Region IV

April 3, 1952

Memorandum

To: Field Team, Region IV

From: Chief, Mining Division, Region IV

Subject: Final Report, DMEA Docket 2271, Glenny Cutler Mining Co., Marysvale Operations, Piute County, Utah

Enclosed are the original and 10 copies of the subject engineering report, with a section on Summary, Conclusions and Recommendations. Also attached are 11 copies of the geologic report.

The proposed project consists of constructing surface facilities, sinking an existing 60-foot shaft an additional 250 feet, and driving 350 feet of drifts from the shaft.

The examining engineers noted that in the Marysvale district where the rhyolitic cover had been removed by erosion, uranium has been leached near the surface and redeposited at depth. These secondary enrichment deposits are usually formed 300 to 400 feet below the outcrop. They believe a fair chance exists that this exploratory work may disclose commercial grade uranium ore as secondarily enriched deposits and they recommend the application be approved.

We concur in this recommendation.

W. H. King

W. H. King

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

200 New Customhouse
Denver 2, Colorado

March 3, 1952

Memorandum

To: DMEA Field Team, Region IV

From: A. H. Koschmann

Subject: DMA Docket 2271, Glenny-Butler Mining Company, Turkey mining district, Marysvale, Piute County, Utah (Uranium).

Enclosed are 11 copies of the geologic report by J. William Hasler of the U. S. Geological Survey covering the above docket. It has been recommended that the loan be approved.

A. H. Koschmann
A. H. Koschmann
Supervising Geologist
Colorado-Wyoming

Enclosures (11)

Room 208, 222 So. West Temple
Salt Lake City 1, Utah
27 February 1958

Memorandum

To: J. R. Kaufmann, Field Team, Region IV

From: Ralph J. Roberts

Subject: DMA Docket 2271, Glenny-Cutler Mining Company, Dunkee mining district, Marysvale, Piute County, Utah (Uranium).

Enclosed are 11 copies of a geologic report on the Glenny-Cutler Mining Company, Dunkee Mining District, Marysvale, Piute County, Utah, DMA Docket 2271.

The report was prepared in response to a request from the Field Team for an examination to ascertain the geological possibilities of exploration by a proposed shaft extension of 250 feet and a subsequent 350 feet of drifting along favorable points of uranium mineralization north and south in a major fault zone containing secondary uranium minerals.

No uranium deposits of commercial grade have been found on the Glenny-Cutler property, but spot sampling on the main fault shows an increase in grade from 0.012 percent U_3O_8 at the surface to 0.036 percent U_3O_8 at the bottom of the shaft, a vertical distance of 60 feet. In the Marysvale district, there is an indication that the grade increases with depth in areas of quartz monzonite where the rhyolite cover has been removed by erosion, possibly because uranium minerals near the surface have been leached out and redeposited at depth, forming deposits of secondary enrichment 300 to 400 feet below the outcrop.

It is considered that there is a fair chance of finding deposits of commercial grade uranium ore at depth, as has been found in other parts of the district.

It is recommended that the Defense Minerals Exploration Administration enter into a contract with the applicant to do the proposed exploration work. An engineering report by the U. S. Bureau of Mines will follow this report. The geologic report is to be held in Denver pending the arrival of the engineering report; the applicant's brochure will accompany the U. S. Bureau of Mines report.

I concur with the conclusions and recommendations of the consulting geologist and engineer.

J. William Hunter
for - Ralph J. Roberts

Mining Division
Date Recd
APR 2 - 1952
BUREAU OF MINES
Denver, Colorado

March 31, 1952

Memorandum

To: W. H. King, Acting Chief, Mining Division, Region IV

From: Chief, Utah-Wyoming Branch, Mining Division

Subject: DMEA 2271, Glenny-Cutler Mining Co., Marysvale Operations, Piute County, Utah.

Enclosed are the original and 10 copies of the subject engineering report, with a section on Summary, Conclusions and Recommendations.

An original and one copy of the brochure are included. Also attached are 10 extra copies of figure 2.

I concur with the recommendations outlined in the reports.

Stephen R. Wilson

Stephen R. Wilson

Enclosures

UNITED STATES
DEPARTMENT OF THE INTERIOR
OSCAR L. CHAPMAN, SECRETARY

DEFENSE MINERALS EXPLORATION ADMINISTRATION

REPORT OF EXAMINATION BY FIELD TEAM
REGION IV

DMA Project [illegible], Glenny-Butler Mining Company

Marysvale, Piute County, Utah

(Uranium)

J. William Hassler, Geologist
U. S. Geological Survey

February 28, 1952

Reviewed by
DMEA OPERATING COMMITTEE
9/29/52
(date)

SUMMARY, CONCLUSIONS AND RECOMMENDATIONS

By R. L. Middleton and J. W. Hasler

The Glenny-Cutler uranium property in Piute County, Utah was examined by DMEA representatives during February 1952. Lessees of the property have requested a loan of $20,000 under DMEA docket 2271 to conduct underground exploratory work. The examination was made to appraise the proposals in the application.

The rocks in the Marysvale district are of Tertiary age, and include a thick series of volcanic rocks which have been intruded by quartz monzonite and granite. These rocks are overlain by younger volcanic rocks which were laid down on an old erosion surface. The volcanic rocks have been gently tilted, and both the volcanic rocks and the quartz monzonite have been cut by faults of small displacement. The uranium deposits are found in narrow veins, gouge filled fissures, and shear zones in the quartz monzonite.

At the Glenny-Cutler mine on the J.D.G. claims, a large fault zone strikes N. 15° east and dips 80° to 85° to the west. The zone is as much as 40 feet across and consists of four strong north-striking faults. The fault zone shows extreme hydrothermal alteration, and uranium mineralization is confined to small erratic deposits of autunite and schrockingerite. Spot sampling in the main fault at the surface and at the bottom of the shaft shows an increase in grade of from 0.015 to 0.036 percent U_3O_8. According to present information, there

is an increase in grade of uranium with depth in areas throughout the Marysvale district where the rhyolitic cover has been removed by erosion. In these areas, uranium has been leached near the surface and redeposited at depth, forming deposits of secondary enrichment 300 to 400 feet below the outcrop.

No minable reserves of ore are known on the Glenny-Cutler property. However, it is believed that a fair chance exists that commercial grade uranium ores may be found as secondarily enriched deposits, 300 to 400 feet below the surface. It is recommended that the exploratory program, as outlined in the engineering and geologic reports, be approved. The total estimated amount required for the proposed work is $24,477.50, an increase of $4,477.50 over that outlined in the application. The larger amount is believed necessary to complete the proposed work.

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Figure 1. Index map of Utah

2. Geologic map of a portion of the Glenny-Cutler Mining Company, Marysvale, Piute County, Utah.

3. Incline drift on Glenny-Cutler Mining Company property, Marysvale, Piute County, Utah.

4. Diagrammatic sketch of proposed exploration, Glenny-Cutler Mine, Marysvale, Piute County, Utah.

DMA Docket 2271, Glenny-Cutler Mining Company

Marysvale, Piute County, Utah

GEOLOGY

The rocks in the Marysvale district (Fig. 1) are of early Tertiary age and include two thick series of volcanic rocks which have been intruded by quartz monzonite and granite. These rocks are overlain by later Tertiary volcanic rocks, the oldest of which is the Bullion Canyon series. The Tertiary Bullion rhyolite was extruded upon an old rugged erosion surface. The flows have been gently tilted, and cut by faults of small displacement. The rocks have been cut by two sets of vertical faults; one set that strikes N. 60° - 70° contains the principal ore deposits; another fault system strikes generally north. The quartz monzonite is cut by joints which may be related to the ore bodies as they locally contain uranium minerals. Two of the more prominent vertical joint sets strike N. 65° W. and N. 35° W. The uranium deposits are found in narrow veins, gouge filled fissures, and shear zones in the quartz monzonite.

ORE DEPOSITS

The uranium deposits in the central Marysvale area are largely in narrow veins and gouge filled shear zones in the quartz monzonite. Pitchblende is the primary mineral, but it is altered to secondary uranium minerals near the surface. The vein on the J.D.G. claim of the Glenny-Cutler Mining Company has not been productive but contains various amounts of secondary uranium mineralization, reported to assay from 0.04 to 0.05 percent U_3O_8.

The primary vein minerals are pitchblende, magnetite, pyrite, fluorite, and marcasite; the gangue minerals include adularia, quartz, jarosite, and carbonates. In the upper part of the veins, pitchblende is altered to schrockingerite, autunite, torbernite, and other secondary uranium minerals.

At the Glenny-Cutler mine on the J.D.G. claims a large fault zone strikes N-S to N. 10° E. and dips 80° - 85° W. The zone is as much as 40 feet across and consists of four strong north-south faults. The faults have gouge zones as much as 12 inches thick and crushed zones in the footwall and hanging wall as much as 2 1/2 feet wide. The fault zone on the J.D.G. claims is in the Tertiary quartz monzonite intrusive. The quartz monzonite throughout the fault zone has been hydrothermally altered from its original light medium gray color to a dirty greenish yellow color with abundant limonitic stain. The shear zones display intense argillic alteration, pyritization, silicification, and irregular lenses of quartz, mainly along the footwall of the structures. The shear zones are weakly mineralized with erratically distributed autunite and schrockingerite.

Diamond drilling across these faults at depth by the Atomic Energy Commission has not proven too fruitful. Drill hole MI-DH 5-23 (fig. 2) was drilled at an angle of 60° N. 80° E. to intersect the fault zones at depth, but due to extremely poor drilling conditions, results from this hole were essentially negative. Drill hole MI-DH 47-79 was designed to cut the main shear zone at a depth of 290 feet below a surface exposure of autunite. Neither the core nor radiometric probing of the hole disclosed uranium mineralization of ore grade. Analysis of probing data indicate an estimate

grade of 0.05 to 0.08 percent U_3O_8 over a width of 6 to 8 feet. Drill hole NT 49-83 was designed to intersect the same structure 120 feet northeast along the strike. The results of this hole were essentially negative; drilling confirmed the presence of the shear zone, but no deposits of uranium minerals were found.

Spot sampling of the main fault and a strong hanging wall fault west of the shaft, and sampling in the shaft showed an increase of 0.084 percent U_3O_8. Surface samples ranged from 0.012 to 0.015 percent U_3O_8 and samples in the shaft ranged from 0.033 to 0.036 percent U_3O_8. This increase in grade was over a vertical range of approximately 40 feet.

Little is known of the distribution of the ore shoots in this fault zone, but considerable trenching, crown cutting, and shaft sinking has been done within the zone and it has been found that the distribution of uranium minerals are erratic.

The main fault zone has been explored along the strike by bulldozing for approximately 500 feet. The fault zone ranges from 1 to 40 feet in width. No uranium mineralization of commercial grade has been found, but a gradual increase in grade is indicated at depth from assays taken in the shaft and the limited information from diamond drilling the fault at depth.

Current data obtained from exploration work by the Atomic Energy Commission indicate that there may be a secondary enrichment of uranium at depth by oxidation and downward leaching by meteoric water where the quartz monzonite has been stripped of its rhyolitic cover. If true, as it appears to be shown on one of the major ore bearing veins in the district, there may well be a possibility of discovering ore of commercial grade at depth within this strong fault zone.

A limited amount of exploration at depth will prove or disprove this possibility. Exploration by sinking and drifting on the structure is preferable to diamond drilling.

ORE RESERVES

There are no measurable reserves of commercial uranium ore on the J.D.G. claims of the Glenn-Collar Mining Company. There is, however, an increase in grade of uranium bearing material from the surface to the bottom of the shaft, which indicates possible enrichment to ore at depth, similar to the increase in grade of ore with depth in similar veins in the Marysvale district.

PROPOSED EXPLORATION

The applicant proposes to sink the present shaft on the J.D.G. 101 claim (Fig. 2) an additional 250 feet to a total depth of 300 feet from the collar of the shaft, and drive along promising deposits of uranium in the fault zone for a total of 350 feet. (See fig. 4.)

SUMMARY AND CONCLUSIONS

The rocks in the Marysvale district are of Tertiary age, and include a thick series of volcanic rocks which have been intruded by quartz monzonite and granite. These rocks are overlain by younger volcanic rocks which were laid down on an old erosion surface. The volcanic rocks have been gently tilted, and both the volcanic rocks and the quartz monzonite have been cut by faults of small displacement. The uranium deposits are found in narrow veins, gouge filled fissures, and shear zones in the quartz monzonite.

At the Clancy-Cutler mine on the J.B.S. claims, a large fault zone strikes N-S to N. 10° W. and dips 60° - 85° W. The zone is as much as 40 feet across and consists of four strong north-striking faults. The fault zones show extreme hydrothermal alteration, and uranium is confined to small, erratic deposits of autunite and meta-autunite. Spot sampling in the main fault at the surface and at the bottom of the shaft shows an increase in grade of uranium from 0.015 to 0.036 percent U_3O_8. According to present information, there is an increase in grade of uranium with depth in areas throughout the Marysvale district where the rhyolitic cover has been removed by erosion. In these areas deposits of uranium have been leached near the surface and redeposited at depth, forming deposits of secondary enrichment 300 to 400 feet below the outcrop.

It is concluded that there is a fair chance of finding deposits of commercial grade uranium ore at depth. It is recommended that the exploration program outlined by the applicant be approved, but that drifting on the fault zone be confined to the lowest level of the shaft (300 feet) to fully insure the possibility of finding commercial grade ore.

GLENNY-CUTLER MINING CO., MARYSVALE OPERATIONS
PIUTE COUNTY, UTAH
DMEA-2271
Uranium

Engineering Report

By R. L. Middleton
Mining engineer
Bureau of Mines

GLENNY-CUTLER MINING CO., MARYSVALE OPERATIONS
PIUTE COUNTY, UTAH

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ILLUSTRATIONS

Fig. 1 Location map, Glenny-Cutler uranium property, Piute County, Utah.

Fig. 2 Plan and section of proposed exploration.

INTRODUCTION

The Glenny-Cutler uranium property was examined February 6, 1952, to evaluate an exploratory project, as proposed in DMEA Docket 2271. The application for uranium exploration requests approval of a $20,000 loan with Government participation of 90 percent. The proposed exploration consists of constructing surface facilities, sinking an existing 60-foot shaft an additional 250 feet, and drifting 350 feet. It is believed that $24,477.50 will be necessary to complete the exploration, as outlined in this report. This cost is agreeable to the Glenny-Cutler management. The examining field team, composed of J. W. Hasler, Geological Survey geologist, and R. L. Middleton, Bureau of Mines engineer, was accompanied to the property by R. A. Glenny and Scott M. Cutler.

ACKNOWLEDGMENTS

Data obtained from the Atomic Energy Commission Field Office at Marysvale, Utah, was used in preparation of this report.

LOCATION AND PHYSICAL FEATURES

The Glenny-Cutler property is located in Sec. 4, T. 27 S., R. 3 W., S.L.B.M., Durkee district, Piute County, Utah (fig. 1). The area of the mine is easily accessible by way of a good-conditioned graveled road which leaves U. S. Highway 89 at Marysvale, Utah. Marysvale, approximately 4 miles southwest from the property, is the nearest railroad shipping point on the Denver & Rio Grande Western Railroad. The Atomic Energy Commission has a uranium ore buying station at Marysvale.

Topography in the general area is moderately steep. The property, at an elevation of approximately 6,400 feet, is in a region of sparse vegetation. Neither water nor timber is available on the property. Climatic conditions allow year-round mining operations.

HISTORY AND PRODUCTION

The J.D.G.M.M. and Camel No. 1 claims were located as uranium claims in 1949 and have had no production, although they are situated in an active uranium mining district. The Prospector, Freedom and Bullion Monarch mines, located near the Glenny-Cutler property, reportedly have produced 28,000 tons of ores containing 0.30 percent U_3O_8 and are active at present.

Any uranium ore discovery made on the Glenny-Cutler property as a result of the proposed exploration will probably be certified by the Atomic Energy Commission as being eligible for bonus payments on the first 10,000 pounds of contained uranium oxide produced before February 28, 1954.

OWNERSHIP AND EXTENT

The Glenny-Cutler property consists of four full-dimensioned lode mining claims, J.D.G. No. 1, J.D.G.M.M., Camel No. 1, and Lucky Strike No. 9 (fig. 2). The J.D.G. No. 1 and the Lucky Strike No. 9 claims have been excluded from the terms of the application because the Lucky Strike No. 9 does not appear related to the proposed exploration, and the ownership of the J.D.G. No. 1 claim is questioned by litigation.

Descriptions of the J.D.G.M.M. and Camel No. 1 unpatented claims are recorded in Book E of Location Notices, pages 225 and 209, in the office of the County Recorder of Piute County. Owners of the property are R. Dunsmore, H. S. Gibbs, W. D. Gibbs, and U. Johnson, residents of Marysvale. Glenny and Cutler have a lease and option to purchase agreement covering the four claims.

A subordination agreement, marked Exhibit C, between the property owners and lessees, is included with the brochure. Though the agreement appears to be in order, it is suggested that form MF-202 be used if a contract is prepared.

DESCRIPTION OF THE DEPOSITS

The predominant geological structure on the Glenny-Cutler property is a strong, persistent shear zone with a strike of N. 15 E. and near vertical dip. Bulldozer trenching has exposed the shear zone 5 to 40 feet wide and several hundred feet along the strike in the quartz-monzonite. The zone has not been developed except on the Glenny-Cutler property. Uranium mineralization is chiefly autunite and schroeckingerite. The amount of mineralization is indicated by the assays of the following samples:

2½-foot chip sample	hanging wall of shear zone	0.012% U_3O_8
2-foot chip sample	footwall of shear zone	0.015% U_3O_8
2½-foot chip sample	footwall of shear zone, 39 feet down shaft	0.035% U_3O_8
Grab sample at bottom of the shaft		0.036% U_3O_8

These results disclose the uranium mineralization is weak and non-commercial under present conditions. It should be noted that the mineralization is enriched at a low increment as distance from the erosional surface is increased. Three diamond holes, drilled under the supervision of the AEC, explore the shear zone. Neither the core nor sludge from these holes was assayed for U_3O_8. Geiger counter probes of holes 47-79 and 49-83 show a radioactive high at the point the shear zone is crossed. Hole 5-23 caved before a probe could be made. The intense alteration within the shear zone, the persistence of the zone which provided avenues for ground-water leaching and migration, and the increase in uranium content with depth, suggest leaching and redistribution, with possible concentration of uranium at depth. The proposed exploratory project will intersect the shear zone at a slightly lower elevation than that of the radioactive high in hole 47-49 (fig. 2).

MINABLE ORE RESERVES

There are no minable ore reserves on the Glenny-Cutler property.

PRESENT STATUS

Workings on the Glenny-Cutler property consist of several hundred feet of bulldozer trenches; a 60-foot, 80-degree shaft; and a 170-foot, 26-degree inclined shaft with 115 feet of drifts from the bottom. The latter shaft is not accessible because of a 50-foot bulldozer trench cutting the area of the portal. The 60-foot shaft, which the applicants intend to deepen, is timbered and appears to be in good condition.

The property does not have buildings or shaft headframe serviceable for the proposed exploration. The Glenny-Cutler Co. owns mining equipment not now on the property, which will be furnished for the proposed project on a depreciation basis.

PROJECT PROPOSALS WITH COSTS

The proposed project consists of constructing surface facilities, sinking an existing 60-foot shaft 250 feet, and driving 350 feet of subsidiary drifts from the shaft. Location of the laterals will depend upon geological evidence encountered during the course of shaft sinking. Estimated time of completion is 261 8-hour shifts.

Fixtures and Improvements

It will be necessary to contract bulldozer work at an hourly rate. The purpose of the bulldozing is to level the shaft collar site and the area of the hoist and toolroom building.

Bulldozing Costs

16 hours contract bulldozing at $10 per hour	$160.00
Transportation of bulldozer	25.00
	$185.00

The shaft is not equipped with a headframe or hoist and toolroom building. The estimated costs of each are as follows:

14' x 14' wood frame building:

Lumber	$ 75.00
Nails and window	15.00
Roofing paper	30.00
Transportation	25.00
Miscellaneous	25.00
Labor - 3 workers at $12.50 per shift for 2 shifts	75.00
	$245.00

Shaft headframe:

Lumber	$ 75.00
Tie rods and bolts	75.00
Washers	10.00
Sheave wheel	45.00
Shaft and bearings	25.00
Transportation	50.00
Miscellaneous	50.00
Labor - 3 workers at $12.50 per shift for 4 shifts	150.00
	$480.00

Total cost of surface facilities:

Bulldozing	$185.00
Hoist building	245.00
Headframe	480.00
	$910.00

Shaft Costs

Estimated cost of sinking 5' x 7', 1½-compartment shaft with 3-foot advance every two shifts:

Cost per shift or 1½-foot advance:

Labor - 2 miners at $12.50 per 8-hour shift	$25.00	
1 hoistman at $12.50 per 8-hour shift	12.50	
1 supervisor at $15.00 per day	15.00	
		$ 52.50

Insurance, compensation, etc., at 10% of payroll	$ 5.25
Fuel - gasoline and lubricants	12.00
Explosives - powder, fuse and caps	6.00
Timber	7.50
Equipment depreciation (company-owned)	4.12
Repair of equipment (parts)	1.00
Transportation - supplies and equipment	2.00
Assaying	1.00
2-inch pipe	.50
Steel and bits	2.00
Ventilation tubing at $ .55 per foot	.83
Miscellaneous	.50
	$ 95.20

$\frac{\$95.20}{1.5'}$ = $63.47 per foot for shaft sinking

$63.47 x 250 = $15,867.50, cost of 250 feet shaft sinking.

Time for completion of shaft, $\frac{250}{1.5'}$ = 167 8-hour shifts.

Drift Costs

Estimated cost of drifting with 4-foot advance each shift:

Labor - 2 miners at $12.50 per 8-hour shift	$25.00	
1 hoistman at $12.50 per 8-hour shift	12.50	
1 supervisor at $15.00 per shift	15.00	
		$ 52.50
Insurance, compensation, etc., at 10% of payroll		5.25
Fuel - gasoline and lubricants		7.00
Explosives - powder, fuse and caps		8.00
Timber		.60
Equipment depreciation (company-owned)		4.12
Equipment repair parts		1.00
Transportation		.50
Assaying		1.00
2-inch pipe		1.33

Ventilation tubing at $ .55 per foot	$ 2.20
Steel and bits	1.00
Rail	3.00
Miscellaneous	.50
	$ 88.00

$\frac{\$88.00}{4'}$ = $22.00 per foot of drift

$22.00 x 350' = $7,700.00, cost of 350 feet of drifts

Time for completion of drifts, $\frac{350}{4}$ = 87½ 8-hour shifts.

Operating Equipment (mine owned)

	Fair Value
220-cu. ft. truck-mounted compressor	$3,500.00
25 h.p. gasoline-driven hoist, cable, bucket	700.00
S73 sinker, Gardner-Denver	400.00
S55 jackhammer, Gardner-Denver	250.00
Water pressure tank	50.00
Drill bar column and saddle	125.00
Ventilation equipment:	
200 feet 6-inch vent pipe, blower and motor	250.00
Ford pick-up truck	1,500.00
Tools	200.00
Welding outfit	117.00
1 mine car	120.00
Geiger counter	250.00
Ultraviolet lamp	60.00
	$7,522.00

Monthly depreciation over a 5-year period:

$\frac{\$7,522}{60}$ = $125.37

Daily depreciation with 365 working days per year:

$\frac{\$7,522}{5 \times 365}$ = $4.12

Operating Supplies (to be purchased)

Fuel	$2,616.50

Explosives	$1,702.00
Timber	1,777.50
Equipment repair parts	254.50
600 feet 2-inch pipe	200.00
Steel and bits	421.50
400 feet ventilation tubing, 6-inch	330.00
350 feet rail, 12#	262.50
Miscellaneous	127.25
Transportation	377.75
	$8,069.50

Operating Equipment (to be purchased)

Operator will furnish all operating equipment.

Labor

Classification	Maximum Wage
2 miners	$1.555 per hour
1 hoistman	$1.555 per hour
1 supervisor	$15.00 per day

Summary of Project Costs

Fixtures and improvements	$ 910.00
250 feet of shaft at $63.47	15,867.50
350 feet of drift at $22.00	7,700.00
	$24,477.50

CONCLUSIONS AND RECOMMENDATIONS

The engineering aspects of the proposed project are feasible. Experience gained by the Glenny-Cutler Co. while contracting the sinking of several shafts in the Marysvale region has earned them a good reputation for efficient and minerlike work.

If the leaching and reconcentration theory now favored by the AEC at the Marysvale Field Office is applicable to the Glenny-Cutler

property, the likelihood of discovering ore in Block A is considered promising.

It is recommended that a loan of $24,477.50 for exploration on the Glenny-Cutler property be approved.

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

224 New Customhouse
Denver 2, Colorado

September 15, 1952

Memorandum

To: Administrator, Defense Minerals Exploration Administration
Attention: 210

From: Field Team, Region IV

Subject: Final Report, DMEA Docket 2271, (Uranium) Glenny Cutler Mining Co., Piute County, Utah

Enclosed are the original and three copies of the final report on DMEA-2271.

The contract has been signed and is in effect.

W. H. King
W. H. King

A. H. Koschmann
A. H. Koschmann

Enclosures

Mining Division
Region IV

SEP 22 '52

April 3, 1952

Memorandum

To: Field Team, Region IV

From: Chief, Mining Division, Region IV

Subject: Final Report, DMEA Docket 2271, Glenny Cutler Mining Co., Marysvale Operations, Piute County, Utah

Enclosed are the original and 10 copies of the subject engineering report, with a section on Summary, Conclusions and Recommendations. Also attached are 11 copies of the geologic report.

The proposed project consists of constructing surface facilities, sinking an existing 60-foot shaft an additional 250 feet, and driving 350 feet of drifts from the shaft.

The examining engineers noted that in the Marysvale district where the rhyolitic cover had been removed by erosion, uranium has been leached near the surface and redeposited at depth. These secondary enrichment deposits are usually formed 300 to 400 feet below the outcrop. They believe a fair chance exists that this exploratory work may disclose commercial grade uranium ore as secondarily enriched deposits and they recommend the application be approved.

We concur in this recommendation.

W. H. King

W. H. King

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

200 New Customhouse
Denver 2, Colorado

March 3, 1952

Memorandum

To: DMEA Field Team, Region IV

From: A. H. Koschmann

Subject: DMA Docket 2271, Glenny-Cutler Mining Company, Burkee mining district, Marysvale, Piute County, Utah (Uranium).

Enclosed are 11 copies of the geologic report by J. William Hasler of the U. S. Geological Survey covering the above docket. It has been recommended that the loan be approved.

A. H. Koschmann
A. H. Koschmann
Supervising Geologist
Colorado-Wyoming

Enclosures (11)

Room 208, 222 So. West Temple
Salt Lake City 1, Utah
29 February 1952

Memorandum

To: A. H. Koschmann, Field Team, Region IV

From: Ralph J. Roberts

Subject: DMA Docket 2271, Glenny-Cutler Mining Company, Burkes mining district, Marysvale, Piute County, Utah (Uranium).

Enclosed are 11 copies of a geologic report on the Glenny-Cutler Mining Company, Burkes Mining District, Marysvale, Piute County, Utah, DMA Docket 2271.

The report was prepared in response to a request from the Field Team for an examination to ascertain the geological possibilities of exploration by a proposed shaft extension of 250 feet and a subsequent 350 feet of drifting along favorable points of uranium mineralization north and south in a major fault zone containing secondary uranium minerals.

No uranium deposits of commercial grade have been found on the Glenny-Cutler property, but spot sampling on the main fault shows an increase in grade from 0.012 percent U_3O_8 at the surface to 0.036 percent U_3O_8 at the bottom of the shaft, a vertical distance of 60 feet. In the Marysvale district, there is an indication that the grade increases with depth in areas of quartz monzonite where the rhyolite cover has been removed by erosion, possibly because uranium minerals near the surface have been leached out and redeposited at depth, forming deposits of secondary enrichment 300 to 400 feet below the outcrop.

It is concluded that there is a fair chance of finding deposits of commercial grade uranium ore at depth, as has been found in other parts of the district.

It is recommended that the Defense Minerals Exploration Administration enter into a contract with the applicant to do the proposed exploration work. An engineering report by the U. S. Bureau of Mines will follow this report. The geologic report is to be held in Denver pending the arrival of the engineering report; the applicant's brochure will accompany the U. S. Bureau of Mines report.

I concur with the conclusions and recommendations of the examining geologist and engineer.

J. William Hasler
for - Ralph J. Roberts

[illegible]
[illegible]
[illegible]52
[illegible] MINES
Denver, Colorado

March 31, 1952

Memorandum

To: W. H. King, Acting Chief, Mining Division, Region IV

From: Chief, Utah-Wyoming Branch, Mining Division

Subject: DMEA 2271, Glenny-Cutler Mining Co., Marysvale Operations, Piute County, Utah.

Enclosed are the original and 10 copies of the subject engineering report, with a section on Summary, Conclusions and Recommendations.

An original and one copy of the brochure are included. Also attached are 10 extra copies of figure 2.

I concur with the recommendations outlined in the reports.

Stephen R. Wilson

Stephen R. Wilson

Enclosures

UNITED STATES
DEPARTMENT OF THE INTERIOR
OSCAR L. CHAPMAN, SECRETARY

DEFENSE MINERALS EXPLORATION ADMINISTRATION

REPORT OF EXAMINATION BY FIELD TEAM
REGION IV

DMA Docket 2271, Glenny-Cutler Mining Company

Marysvale, Piute County, Utah

(Uranium)

J. William Hasler, Geologist
U. S. Geological Survey

February 28, 1952

Reviewed by
DMEA OPERATING COMMITTEE
9/29/52
(date)

SUMMARY, CONCLUSIONS AND RECOMMENDATIONS

By R. L. Middleton and J. W. Hasler

The Glenny-Cutler uranium property in Piute County, Utah was examined by DMEA representatives during February 1952. Lessees of the property have requested a loan of $20,000 under DMEA docket 2271 to conduct underground exploratory work. The examination was made to appraise the proposals in the application.

The rocks in the Marysvale district are of Tertiary age, and include a thick series of volcanic rocks which have been intruded by quartz monzonite and granite. These rocks are overlain by younger volcanic rocks which were laid down on an old erosion surface. The volcanic rocks have been gently tilted, and both the volcanic rocks and the quartz monzonite have been cut by faults of small displacement. The uranium deposits are found in narrow veins, gouge filled fissures, and shear zones in the quartz monzonite.

At the Glenny-Cutler mine on the J.D.G. claims, a large fault zone strikes N. 15° east and dips 80° to 85° to the west. The zone is as much as 40 feet across and consists of four strong north-striking faults. The fault zone shows extreme hydrothermal alteration, and uranium mineralization is confined to small erratic deposits of autunite and schrockingerite. Spot sampling in the main fault at the surface and at the bottom of the shaft shows an increase in grade of from 0.015 to 0.036 percent U_3O_8. According to present information, there

is an increase in grade of uranium with depth in areas throughout the Marysvale district where the rhyolitic cover has been removed by erosion. In these areas, uranium has been leached near the surface and redeposited at depth, forming deposits of secondary enrichment 300 to 400 feet below the outcrop.

No minable reserves of ore are known on the Glenny-Cutler property. However, it is believed that a fair chance exists that commercial grade uranium ores may be found as secondarily enriched deposits, 300 to 400 feet below the surface. It is recommended that the exploratory program, as outlined in the engineering and geologic reports, be approved. The total estimated amount required for the proposed work is $24,477.50, an increase of $4,477.50 over that outlined in the application. The larger amount is believed necessary to complete the proposed work.

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2. Geologic map of a portion of the Glenny-Cutler Mining Company, Marysvale, Piute County, Utah.

3. Incline drift on Glenny-Cutler Mining Company property, Marysvale, Piute County, Utah.

4. Diagrammatic sketch of proposed exploration, Glenny-Cutler Mine, Marysvale, Piute County, Utah.

DMA Docket 2271, Glenny-Cutler Mining Company

Marysvale, Piute County, Utah

GEOLOGY

The rocks in the Marysvale district (fig. 1) are of early Tertiary age and include two thick series of volcanic rocks which have been intruded by quartz monzonite and granite. These rocks are overlain by later Tertiary volcanic rocks, the oldest of which is the Bullion Canyon series. The Tertiary Belknap rhyolite was extruded upon an old rugged erosion surface. The flows have been gently tilted, and cut by faults of small displacement. The rocks have been cut by two sets of vertical faults; one set that strikes N. 60° - 70° contains the principal ore deposits; another fault system strikes generally north. The quartz monzonite is cut by joints which may be related to the ore bodies as they locally contain uranium minerals. Two of the more prominent vertical joint sets strike N. 85° W. and N. 35° W. The uranium deposits are found in narrow veins, gouge filled fissures, and shear zones in the quartz monzonite.

ORE DEPOSITS

The uranium deposits in the central Marysvale area are largely in narrow veins and gouge filled shear zones in the quartz monzonite. Pitchblende is the primary mineral, but it is altered to secondary uranium minerals near the surface. The vein on the J.B.G. claim of the Glenny-Cutler Mining Company has not been productive but contains various amounts of secondary uranium mineralization, reported to assay from 0.04 to 0.08 percent U_3O_8.

The primary vein minerals are pitchblende, magnetite, pyrite, fluorite, and marcasite; the gangue minerals include adularia, quartz, jordisite, and carbonates. In the upper part of the veins, pitchblende is altered to schrockingerite, autunite, torbernite, and other secondary uranium minerals.

At the Glenny-Cutler mine on the J.D.G. claims a large fault zone strikes N-S to N. 10° E. and dips 80° - 85° W. The zone is as much as 40 feet across and consists of four strong north-south faults. The faults have gouge zones as much as 12 inches thick and crushed zones in the footwall and hanging wall as much as 2 1/2 feet wide. The fault zone on the J.D.G. claims is in the Tertiary quartz monzonite intrusive. The quartz monzonite throughout the fault zone has been hydrothermally altered from its original light medium gray color to a dirty greenish yellow color with abundant limonitic stain. The shear zones display intense argillic alteration, pyritization, silicification, and irregular lenses of quartz, mainly along the footwall of the structures. The shear zones are weakly mineralized with erratically distributed autunite and schrockingerite.

Diamond drilling across these faults at depth by the Atomic Energy Commission has not proven too fruitful. Drill hole MX-DH 5-23 (fig. 2) was drilled at an angle of 60° N. 80° E. to intersect the fault zones at depth, but due to extremely poor drilling conditions, results from this hole were essentially negative. Drill hole MX-DH 47-79 was designed to cut the main shear zone at a depth of 290 feet below a surface exposure of autunite. Neither the core nor radiometric probing of the hole disclosed uranium mineralization of ore grade. Analysis of probing data indicate an estimate

grade of 0.06 to 0.08 percent U_3O_8 over a width of 6 to 8 feet. Drill hole NY 49-83 was designed to intersect the same structure 120 feet northeast along the strike. The results of this hole were essentially negative; drilling confirmed the presence of the shear zone, but no deposits of uranium minerals were found.

Spot sampling of the main fault and a strong hanging wall fault west of the shaft, and sampling in the shaft showed an increase of 0.024 percent U_3O_8. Surface samples ranged from 0.012 to 0.015 percent U_3O_8 and samples in the shaft ranged from 0.035 to 0.036 percent U_3O_8. This increase in grade was over a vertical range of approximately 60 feet.

Little is known of the distribution of the ore shoots in this fault zone, but considerable trenching, cross cutting, and shaft sinking has been done within the zone and it has been found that the distribution of uranium minerals are erratic.

The main fault zone has been explored along the strike by bulldozing for approximately 500 feet. The fault zone ranges from 1 to 40 feet in width. No uranium mineralization of commercial grade has been found, but a gradual increase in grade is indicated at depth from assays taken in the shaft and the limited information from diamond drilling the fault at depth.

Current data obtained from exploration work by the Atomic Energy Commission indicate that there may be a secondary enrichment of uranium at depth by oxidation and downward leaching by meteoric water where the quartz monzonite has been stripped of its rhyolitic cover. If true, as it appears to be shown on one of the major ore bearing veins in the district, there may well be a possibility of discovering ore of commercial grade at depth within this strong fault zone.

A limited amount of exploration at depth will prove or disprove this possibility. Exploration by sinking and drifting on the structure is preferable to diamond drilling.

ORE RESERVES

There are no measurable reserves of commercial uranium ore on the J.B.G. claims of the Glenny-Cutler Mining Company. There is, however, an increase in grade of uranium bearing material from the surface to the bottom of the shaft, which indicates possible enrichment to ore at depth, similar to the increase in grade of ore with depth in similar veins in the Marysvale district.

PROPOSED EXPLORATION

The applicant proposes to sink the present shaft on the J.B.G. MM claim (fig. 2) an additional 250 feet to a total depth of 308 feet from the collar of the shaft, and drive along promising deposits of uranium in the fault zone for a total of 350 feet. (See fig. 4)

SUMMARY AND CONCLUSIONS

The rocks in the Marysvale district are of Tertiary age, and include a thick series of volcanic rocks which have been intruded by quartz monzonite and granite. These rocks are overlain by younger volcanic rocks which were laid down on an old erosion surface. The volcanic rocks have been gently tilted, and both the volcanic rocks and the quartz monzonite have been cut by faults of small displacement. The uranium deposits are found in narrow veins, gouge filled fissures, and shear zones in the quartz monzonite.

At the Gleason-Cutler mine on the J.B.G. claims, a large fault zone strikes N-S to N. 10° W. and dips 86° - 85° W. The zone is as much as 40 feet across and consists of four strong north-striking faults. The fault zones show extreme hydrothermal alteration, and uranium is confined to small, erratic deposits of autunite and meta-autunite. Spot sampling in the main fault at the surface and at the bottom of the shaft shows an increase in grade of uranium from 0.015 to 0.056 percent U_3O_8. According to present information, there is an increase in grade of uranium with depth in areas throughout the Marysvale district where the rhyolitic cover has been removed by erosion. In these areas deposits of uranium have been leached near the surface and redeposited at depth, forming deposits of secondary enrichment 300 to 400 feet below the outcrop.

It is considered that there is a fair chance of finding deposits of commercial grade uranium ore at depth. It is recommended that the exploration program outlined by the applicant be approved, but that drifting on the fault zone be confined to the lowest level of the shaft (308 feet) to fully insure the possibility of finding commercial grade ore.

GLENNY-CUTLER MINING CO., MARYSVALE OPERATIONS
PIUTE COUNTY, UTAH
DMEA-2271
Uranium

Engineering Report

By R. L. Middleton
Mining engineer
Bureau of Mines

GLENNY-CUTLER MINING CO., MARYSVALE OPERATIONS
PIUTE COUNTY, UTAH

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ILLUSTRATIONS

Fig. 1 Location map, Glenny-Cutler uranium property, Piute County, Utah.
Fig. 2 Plan and section of proposed exploration.

INTRODUCTION

The Glenny-Cutler uranium property was examined February 6, 1952, to evaluate an exploratory project, as proposed in DMEA Docket 2271. The application for uranium exploration requests approval of a $20,000 loan with Government participation of 90 percent. The proposed exploration consists of constructing surface facilities, sinking an existing 60-foot shaft an additional 250 feet, and drifting 350 feet. It is believed that $24,477.50 will be necessary to complete the exploration, as outlined in this report. This cost is agreeable to the Glenny-Cutler management. The examining field team, composed of J. W. Hasler, Geological Survey geologist, and R. L. Middleton, Bureau of Mines engineer, was accompanied to the property by R. A. Glenny and Scott M. Cutler.

ACKNOWLEDGMENTS

Data obtained from the Atomic Energy Commission Field Office at Marysvale, Utah, was used in preparation of this report.

LOCATION AND PHYSICAL FEATURES

The Glenny-Cutler property is located in Sec. 4, T. 27 S., R. 3 W., S.L.B.M., Durkee district, Piute County, Utah (fig. 1). The area of the mine is easily accessible by way of a good-conditioned graveled road which leaves U. S. Highway 89 at Marysvale, Utah. Marysvale, approximately 4 miles southwest from the property, is the nearest railroad shipping point on the Denver & Rio Grande Western Railroad. The Atomic Energy Commission has a uranium ore buying station at Marysvale.

Topography in the general area is moderately steep. The property, at an elevation of approximately 6,400 feet, is in a region of sparse vegetation. Neither water nor timber is available on the property. Climatic conditions allow year-round mining operations.

HISTORY AND PRODUCTION

The J.D.G.M.M. and Camel No. 1 claims were located as uranium claims in 1949 and have had no production, although they are situated in an active uranium mining district. The Prospector, Freedom and Bullion Monarch mines, located near the Glenny-Cutler property, reportedly have produced 28,000 tons of ores containing 0.30 percent U_3O_8 and are active at present.

Any uranium ore discovery made on the Glenny-Cutler property as a result of the proposed exploration will probably be certified by the Atomic Energy Commission as being eligible for bonus payments on the first 10,000 pounds of contained uranium oxide produced before February 28, 1954.

OWNERSHIP AND EXTENT

The Glenny-Cutler property consists of four full-dimensioned lode mining claims, J.D.G. No. 1, J.D.G.M.M., Camel No. 1, and Lucky Strike No. 9 (fig. 2). The J.D.G. No. 1 and the Lucky Strike No. 9 claims have been excluded from the terms of the application because the Lucky Strike No. 9 does not appear related to the proposed exploration, and the ownership of the J.D.G. No. 1 claim is questioned by litigation.

Descriptions of the J.D.G.M.M. and Camel No. 1 unpatented claims are recorded in Book E of Location Notices, pages 225 and 209, in the office of the County Recorder of Piute County. Owners of the property are R. Dunsmore, H. S. Gibbs, W. D. Gibbs, and U. Johnson, residents of Marysvale. Glenny and Cutler have a lease and option to purchase agreement covering the four claims.

A subordination agreement, marked Exhibit C, between the property owners and lessees, is included with the brochure. Though the agreement appears to be in order, it is suggested that form MF-202 be used if a contract is prepared.

DESCRIPTION OF THE DEPOSITS

The predominant geological structure on the Glenny-Cutler property is a strong, persistent shear zone with a strike of N. 15 E. and near vertical dip. Bulldozer trenching has exposed the shear zone 5 to 40 feet wide and several hundred feet along the strike in the quartz-monzonite. The zone has not been developed except on the Glenny-Cutler property. Uranium mineralization is chiefly autunite and schroeckingerite. The amount of mineralization is indicated by the assays of the following samples:

2½-foot chip sample	hanging wall of shear zone	0.012% U_3O_8
2-foot chip sample	footwall of shear zone	0.015% U_3O_8
2½-foot chip sample	footwall of shear zone, 39 feet down shaft	0.035% U_3O_8
Grab sample at bottom of the shaft		0.036% U_3O_8

These results disclose the uranium mineralization is weak and non-commercial under present conditions. It should be noted that the mineralization is enriched at a low increment as distance from the erosional surface is increased. Three diamond holes, drilled under the supervision of the AEC, explore the shear zone. Neither the core nor sludge from these holes was assayed for U_3O_8. Geiger counter probes of holes 47-79 and 49-83 show a radioactive high at the point the shear zone is crossed. Hole 5-23 caved before a probe could be made. The intense alteration within the shear zone, the persistence of the zone which provided avenues for ground-water leaching and migration, and the increase in uranium content with depth, suggest leaching and redistribution, with possible concentration of uranium at depth. The proposed exploratory project will intersect the shear zone at a slightly lower elevation than that of the radioactive high in hole 47-49 (fig. 2).

MINABLE ORE RESERVES

There are no minable ore reserves on the Glenny-Cutler property.

PRESENT STATUS

Workings on the Glenny-Cutler property consist of several hundred feet of bulldozer trenches; a 60-foot, 60-degree shaft; and a 170-foot, 26-degree inclined shaft with 115 feet of drifts from the bottom. The latter shaft is not accessible because of a 50-foot bulldozer trench cutting the area of the portal. The 60-foot shaft, which the applicants intend to deepen, is timbered and appears to be in good condition.

The property does not have buildings or shaft headframe serviceable for the proposed exploration. The Glenny-Cutler Co. owns mining equipment not now on the property, which will be furnished for the proposed project on a depreciation basis.

PROJECT PROPOSALS WITH COSTS

The proposed project consists of constructing surface facilities, sinking an existing 60-foot shaft 250 feet, and driving 350 feet of subsidiary drifts from the shaft. Location of the laterals will depend upon geological evidence encountered during the course of shaft sinking. Estimated time of completion is 261 8-hour shifts.

Fixtures and Improvements

It will be necessary to contract bulldozer work at an hourly rate. The purpose of the bulldozing is to level the shaft collar site and the area of the hoist and toolroom building.

Bulldozing Costs

16 hours contract bulldozing at $10 per hour	$160.00
Transportation of bulldozer	25.00
	$185.00

The shaft is not equipped with a headframe or hoist and toolroom building. The estimated costs of each are as follows:

14' x 14' wood frame building:

Lumber	$ 75.00
Nails and window	15.00
Roofing paper	30.00
Transportation	25.00
Miscellaneous	25.00
Labor - 3 workers at $12.50 per shift for 2 shifts	75.00
	$245.00

Shaft headframe:

Lumber	$ 75.00
Tie rods and bolts	75.00
Washers	10.00
Sheave wheel	45.00
Shaft and bearings	25.00
Transportation	50.00
Miscellaneous	50.00
Labor - 3 workers at $12.50 per shift for 4 shifts	150.00
	$480.00

Total cost of surface facilities:

Bulldozing	$185.00
Hoist building	245.00
Headframe	480.00
	$910.00

Shaft Costs

Estimated cost of sinking 5' x 7', 1½-compartment shaft with 3-foot advance every two shifts:

Cost per shift or 1½-foot advance:

Labor - 2 miners at $12.50 per 8-hour shift	$25.00	
1 hoistman at $12.50 per 8-hour shift	12.50	
1 supervisor at $15.00 per day	15.00	
		$ 52.50

Insurance, compensation, etc., at 10% of payroll	$ 5.25
Fuel - gasoline and lubricants	12.00
Explosives - powder, fuse and caps	6.00
Timber	7.50
Equipment depreciation (company-owned)	4.12
Repair of equipment (parts)	1.00
Transportation - supplies and equipment	2.00
Assaying	1.00
2-inch pipe	.50
Steel and bits	2.00
Ventilation tubing at $ .55 per foot	.83
Miscellaneous	.50
	$ 95.20

$\frac{\$95.20}{1.5'}$ = $63.47 per foot for shaft sinking

$63.47 x 250 = $15,867.50, cost of 250 feet shaft sinking.

Time for completion of shaft, $\frac{250}{1.5'}$ = 167 8-hour shifts.

Drift Costs

Estimated cost of drifting with 4-foot advance each shift:

Labor - 2 miners at $12.50 per 8-hour shift	$25.00	
1 hoistman at $12.50 per 8-hour shift	12.50	
1 supervisor at $15.00 per shift	15.00	
		$ 52.50
Insurance, compensation, etc., at 10% of payroll		5.25
Fuel - gasoline and lubricants		7.00
Explosives - powder, fuse and caps		8.00
Timber		.60
Equipment depreciation (company-owned)		4.12
Equipment repair parts		1.00
Transportation		.50
Assaying		1.00
2-inch pipe		1.33

Ventilation tubing at $ .55 per foot	$ 2.20
Steel and bits	1.00
Rail	3.00
Miscellaneous	.50
	$ 88.00

$\frac{\$88.00}{4'}$ = $22.00 per foot of drift

$22.00 x 350' = $7,700.00, cost of 350 feet of drifts

Time for completion of drifts, $\frac{350}{4}$ = 87½ 8-hour shifts.

Operating Equipment (mine owned)

	Fair Value
220-cu. ft. truck-mounted compressor	$3,500.00
25 h.p. gasoline-driven hoist, cable, bucket	700.00
S73 sinker, Gardner-Denver	400.00
S55 jackhammer, Gardner-Denver	250.00
Water pressure tank	50.00
Drill bar column and saddle	125.00
Ventilation equipment:	
200 feet 6-inch vent pipe, blower and motor	250.00
Ford pick-up truck	1,500.00
Tools	200.00
Welding outfit	117.00
1 mine car	120.00
Geiger counter	250.00
Ultraviolet lamp	60.00
	$7,522.00

Monthly depreciation over a 5-year period:

$\frac{\$7,522}{60}$ = $125.37

Daily depreciation with 365 working days per year:

$\frac{\$7,522}{5 \times 365}$ = $4.12

Operating Supplies (to be purchased)

Fuel	$2,616.50

Explosives	$1,702.00
Timber	1,777.50
Equipment repair parts	254.50
600 feet 2-inch pipe	200.00
Steel and bits	421.50
400 feet ventilation tubing, 6-inch	330.00
350 feet rail, 12#	262.50
Miscellaneous	127.25
Transportation	377.75
	$8,069.50

Operating Equipment (to be purchased)

Operator will furnish all operating equipment.

Labor

Classification	Maximum Wage
2 miners	$1.555 per hour
1 hoistman	$1.555 per hour
1 supervisor	$15.00 per day

Summary of Project Costs

Fixtures and improvements	$ 910.00
250 feet of shaft at $63.47	15,867.50
350 feet of drift at $22.00	7,700.00
	$24,477.50

CONCLUSIONS AND RECOMMENDATIONS

The engineering aspects of the proposed project are feasible. Experience gained by the Glenny-Cutler Co. while contracting the sinking of several shafts in the Marysvale region has earned them a good reputation for efficient and minerlike work.

If the leaching and reconcentration theory now favored by the AEC at the Marysvale Field Office is applicable to the Glenny-Cutler

property, the likelihood of discovering ore in Block A is considered promising.

It is recommended that a loan of $24,477.50 for exploration on the Glenny-Cutler property be approved.

9/11/52 gfa

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

224 New Customhouse
Denver 2, Colorado

September 3, 1952

Memorandum

To: Secretary to the Operating Committee

From: Executive Officer, Field Team, Region IV

Subject: Contract Idm-E387, Docket DMEA 2271, R. A. Glenny and Scott M. Cutler (Uranium)

Referring to the letter from the Acting Chairman of the Operating Committee dated August 27, 1952, regarding Mr. Hofflund's memorandum covering the Gillaspey contract, before completing this contract we received a letter from A.H. Hougaard, attorney for the Western Uranium Corporation, which described in detail the Gillaspey contract and stated that this contract had been terminated. We also received an affidavit showing that the agreement between Norma J. Zabriskie and Mr. Gillaspey had been terminated.

W. H. King
W. H. King

RECEIVED
SEP 11 1952
GENERAL COUNSEL
DEFENSE MINERALS
ADMINISTRATION

$69
9-9-52

FILE COPY
SURNAME:
700

Ellis
Hoffmund

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

[illegible] 1952

Mr. W. P. King
Executive Officer
DMEA Field Team, Region IV
224 New Courthouse Building
Denver 2, Colorado

Re: Docket No. DMEA-2271 (Uranium)
Contract No. Idm-5387
R. A. Glenny and Scott M. Cutler
Piute County, Utah

Dear Mr. King:

Enclosed are the Operator's, Field Team's and Finance Officer's copies of the above-captioned contract which has been dated and given the above contract number. Please distribute said copies to the proper parties.

Kindly note in Mr. Hoffmund's memorandum to the Operating Committee, under date of August 25, that reference is made to Legal's letter to you of June 23, 1952. From this memorandum, a copy of which is enclosed, you will note that approval of said contract hinges on a satisfactory showing that there is no outstanding interest in Gillaspey covering the same claims which are subject to this Exploration Project Contract.

Sincerely yours,

8/27/52

W. F. Fuller (HB)
ACTING Chairman, Operating Committee

APPROVED:

D. W. Lemmon (HB)
Member, Geological Survey

C. N. Johnson (HB)
Member, Bureau of Mines

RWEllis/gla 8-27-52
cc to: Adm. Reading File
Docket
Messrs. H.D.Keiser, Rm. 1347
A.F.Butler, Jr., Rm. 3206 GSA
Mr. Ellis
Legal Division
DMEA Field Team, Region IV
Operating Committee

FILE COPY
SURNAME:

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

140

August 25, 1952

Memorandum

To: Chairman, Operating Committee

From: Chief Counsel

Subject: Contract - Docket No. DMEA-2271, R. A. Glenny and Scott M. Cutler (Uranium)

We have reviewed the above-described contract and find it in satisfactory legal form for execution.

However, in a letter dated June 23, to Mr. King from the Chief Counsel concerning this contract, it was stated in the last paragraph that there appeared to be an outstanding interest in one Gillaspey covering the same claims which are the subject of the Exploration Project Contract. It was further stated in that letter that if the assumption made concerning the outstanding interest was correct, that the contract could not be approved. The memorandum dated August 12, from Mr. King makes no comment concerning the comments of the Chief Counsel on this point. Accordingly, the legal approval of this contract is conditioned upon a satisfactory showing by the Executive Officer, Region IV, that there is no outstanding interest in Gillaspey covering the same claims which are the subject of the Exploration Project Contract.

J. L. Hofflund

J. L. Hofflund
Chief Counsel

HCRubin/ema
cc: Mails & Files
C. O. Mittendorf
Adm. R. File
J. P. Thayer
J. H. Hedges
J. L. Hofflund
H. C. Rubin
Chron.

UNITED STATES
DEPARTMENT OF THE INTERIOR
DEFENSE MINERALS EXPLORATION ADMINISTRATION 140
WASHINGTON 25, D. C.

August 25, 1952

Memorandum

To: Chairman, Operating Committee

From: Chief Counsel

Subject: Contract - Docket No. DMEA-2271, R. A. Glenny and Scott M. Cutler (Uranium)

We have reviewed the above-described contract and find it in satisfactory legal form for execution.

However, in a letter dated June 23, to Mr. King from the Chief Counsel concerning this contract, it was stated in the last paragraph that there appeared to be an outstanding interest in one Gillaspey covering the same claims which are the subject of the Exploration Project Contract. It was further stated in that letter that if the assumption made concerning the outstanding interest was correct, that the contract could not be approved. The memorandum dated August 12, from Mr. King makes no comment concerning the comments of the Chief Counsel on this point. Accordingly, the legal approval of this contract is conditioned upon a satisfactory showing by the Executive Officer, Region IV, that there is no outstanding interest in Gillaspey covering the same claims which are the subject of the Exploration Project Contract.

J. L. Hoffland
J. L. Hoffland
Chief Counsel

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

224 New Customhouse
Denver 2, Colorado

August 12, 1952

REGISTERED

Memorandum

To: Secretary to the Operating Committee
Defense Minerals Exploration Administration

From: Executive Officer, DMEA Field Team, Region IV

Subject: Contract - Docket No. DMEA 2271, R. A. Glenny and Scott M. Cutler (Uranium)

Enclosed are the original and five copies of an Exploration Project Contract between the Government and a partnership consisting of R. A. Glenny and Scott M. Cutler. All copies have been signed by the operators and by the Executive Officer, DMEA Field Team, Region IV. Please assign a contract number and return the required number of copies to this office.

W. H. King

W. H. King

Enclosure

RECEIVED
AUG 20 1952
GENERAL COUNSEL
DEFENSE MINERALS
ADMINISTRATION

DEPARTMENT OF THE INTERIOR
Administration
AUG 18 1952

8-19-52

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

224 New Customhouse
Denver 2, Colorado

August 12, 1952

REGISTERED

Memorandum

To: Secretary to the Operating Committee
Defense Minerals Exploration Administration

From: Executive Officer, DMEA Field Team, Region IV

Subject: Contract - Docket No. DMEA 2271, R. A. Glenny and Scott M. Cutler (Uranium)

Enclosed are the original and five copies of an Exploration Project Contract between the Government and a partnership consisting of R. A. Glenny and Scott M. Cutler. All copies have been signed by the operators and by the Executive Officer, DMEA Field Team, Region IV. Please assign a contract number and return the required number of copies to this office.

W. H. King

Enclosure

FILE COPY
SURNAME:

140

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

Burton Hoffman

June 23, 1952

n.s. in R. & R.

Air Mail

Subject: Docket No. DMEA-2271
Glenny Cutler Mining
Company

Mr. W. H. King, Executive Officer
DMEA Field Team, Region IV
224 New Customhouse Building
Denver 2, Colorado

Dear Mr. King:

This responds to your memorandum to me dated May 22, concerning the above-described project.

Your memorandum enclosed three exhibits, identified as Exhibits "A", "B" and "C", which are the documents under which the applicant holds his interest in the property. Exhibit "A" is a lease and option to purchase which, by various assignments (copies of which are a part of the exhibit), is vested in Western Uranium Corporation. Exhibit "B" is an agreement between Western Uranium Corporation and the applicant, which recites that the applicant shall have exclusive possession of the property for mining purposes.

Your memorandum points out that Exhibit "B", the only agreement to which the applicant is a party, is not a lease in the strict sense. However, under DMEA-1, it is not essential that an applicant, who is not the owner of property, must be a lessee of the property so long as he has "a sufficient interest" in the property for the purposes of the exploration project. Therefore, the applicant may qualify for an exploration project contract based upon the interest which he now has, provided that the Owner's Consent to Lien is obtained and attached to the contract prior to the execution of the contract, and provided further that the applicant is in fact entitled to exclusive possession of the property.

In regard to the Owner's Consent to Lien form which is appropriate in this case, it is noted that Exhibit "C", which is a subordination agreement executed by the four

Ha

original lessors of the property and Western Uranium Corporation, the last assignee of the property, refers to Mineral Order 5, which has been superseded by DMEA-1, and is stated in more narrow terms of coverage than the DMEA form of Owner's Consent to Lien. Therefore, we cannot approve this contract unless an Owner's Consent to Lien form executed by all of the original lessors and also the Western Uranium Corporation, is first acquired and attached to the contract prior to the execution thereof. Of course, the contract must be written and executed on a new form of contract.

In further regard to Exhibit "A", it is noted that the assignment executed by Norma J. Zabriskie to Western Uranium Corporation, also includes her interest in an operator's agreement dated January 3, 1950, entered into with Clarence J. Gillaspey. The assignment states that this agreement is marked Exhibit "B", and is attached to Exhibit "A". However, Exhibit "B" is an operator's agreement dated September 20, 1950, between Western Uranium Corporation and the applicant, R. A. Glenny and Scott M. Cutler. Apparently, the agreement with Gillaspey is outstanding, and covers the same claims. If this assumption is correct, the applicant does not have a sufficient interest in the property without a surrender by or termination of the rights of Gillaspey under his contract. There is no evidence to this effect before us. We cannot approve this contract without this evidence.

Very truly yours,

J. L. Hofflund

J. L. Hofflund
Chief Counsel

HCRubin/em

Copy to: Malls and Files
J. L. Hofflund
H. C. Rubin
chron.

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

DEPARTMENT OF THE INTERIOR
Defense Minerals Administration
MAY 26 1952

224 New Customhouse
Denver 2, Colorado

May 22, 1952

ans. 6/23/52 JCR/em

Memorandum

To: J. J. Hofflund, Chief Counsel, Defense Minerals Exploration Administration

From: Executive Officer, Region IV

Subject: DMEA Docket No. - 2271 - Glenny Cutler Mining Company

Enclosed are copies of "EXHIBIT A", "EXHIBIT B" and "EXHIBIT C" submitted by Glenny Cutler Mining Company. "EXHIBIT A" is a lease and option to purchase certain property in the Durkee Mining District, Piute County, Utah and assignments of the lease and option.

"EXHIBIT B" is an agreement between the Western Uranium Corporation, party of the first part, R. A. Glenny and Scott M. Cutler, party of the second part. This agreement is locally known as a split-check lease. The Parties of the Second Part are to be allowed the sum of $2.50 per ton for mining any ore, and the net proceeds of the ore is to be divided in equal shares between the first parties and the second parties. This agreement gives the priviledge of occupation and allows the parties of the second part to mine ore. It is not a lease in the legal sense of the word as it does not allow exclusive possession to the parties of the second part. The DMEA regulations provide for the Government to enter into a contract with the owner of the property or the lessees of a property. Could this license to enter the property and mine ore be interpreted as a lease so that the Government could enter into an exploration contract with the licensees? An Exploration Project Contract has been prepared covering Docket DMEA-2271, and is being held awaiting your decision on this matter. Kindly return the enclosed exhibits when they have served your purpose.

W. H. King

W. H. King

Enclosures

"EXHIBIT A"

EXHIBIT "A"

LEASE AND OPTION TO PURCHASE

THIS LEASE, AGREEMENT AND OPTION TO PURCHASE, made and entered into this 2nd day of August, 1949, by and between R. Dunsmore, H. S. Gibbs, W. Dana Gibbs, and Urban Johnson, all of Marysvale, Piute County, State of Utah, herein designated as lessors, and Claude M. Zabriskie of Salt Lake City, Utah, herein designated as lessee, WITNESSETH:

That the said lessors, for and in consideration of the sum of $10.00 and in consideration of the royalties herein agreed to be paid, and in consideration of the covenants and agreements hereinafter mentioned and set forth to be paid, kept and performed by the lessee, have this day leased and let, and by these presents do hereby remise, lease and let unto the lessee all of their right, title and interest in and to all of the following described mining claims and appurtenances situated in the Durkee Mining District, Piute County, State of Utah, to-wit:

That certain mining claim and notice of location, dated the 7th day of June, 1949, said location being described and marked on the ground as more specifically stated and set forth in the notice of location filed in the office of the county recorder of Piute County, State of Utah on June 8, 1949, and recorded in Book E of Location Notices, page 225, and given the name and designated in said mining location notice as J. D. G. - M. M. Lode Claim.

That certain mining claim and notice of location, dated the 8th day of June, 1949, said location being described and marked on the ground as more specifically stated and set forth in the notice of location filed in the office of the county recorder of Piute County, State of Utah on June 13, 1949, and recorded in Book E of Location Notices, page 228, and given the name and designated in said mining location notice as J. D. G. No. 1 Mining Claim.

DEPARTMENT OF THE
Bureau of Land Mgmt.
RECEIVED
MAY 26 1952

That certain mining claim and notice of location, dated the 1st day of May, 1949, said location being described and marked on the ground as more specifically stated and set forth in the notice of location filed in the office of the county recorder of Piute County, State of Utah on May 4, 1949, and recorded in Book E of Location Notices, page 209, and given the name and designated in said mining location notice as Camel No. 1, and

That certain mining claim and notice of location dated the 15th day of May, 1949, said location being described and marked on the ground as more specifically stated and set forth in the notice of location filed in the office of the county recorder of Piute County, State of Utah on May 16, 1949, and recorded in Book E of Location Notices, page 211, and given the name and designated in said mining location notice as Luckey Strike No. 9,

Together with all of the improvements and appurtenances thereunto belonging or in any wise appertaining, and the right to the use of all such water and water rights for any and all culinary and mining purposes as may now be on said mining claims or as may be developed by the lessee thereon.

And the said lessors do hereby agree that they are the owners of said mining claims, and have good right and title thereto, and good right to sell, lease or otherwise dispose of the same.

TO HAVE AND TO HOLD the said leased premises, appurtenances and improvements from the date hereof for the full period of three years, unless sooner terminated by the violation of any of the covenants hereinafter mentioned and set forth by said lessee, and subject to the extension of this lease for the additional period of one year at the election of the lessee.

And in consideration of this lease and in consideration of the option to purchase hereinafter set forth, the said lessee does hereby covenant and agree with said lessors as follows:

1. The lessee agrees to enter upon said leased premises within a period of 30 days after the date hereof and to work upon said premises in a good miner-like and workman-like manner, and in a manner necessary and proper for good economic mining; and if underground work is done, to properly timber such underground workings when necessary for good mining and to so work and mine upon said premises so as to take out the greatest amount of ore possible with due regard to the safety, development and preservation of said premises as a workable mine, and to do and perform at least 60 shifts per month; and said lessee agrees that any failure to work said premises as above set forth for a period of 30 consecutive days shall be considered a violation of the terms of this lease.

2. The lessee agrees to pay to the lessors within 30 days from the date hereof the sum of $100.00 for each claim above listed, and said amount shall be treated and considered as an advance royalty upon the royalty payment hereinafter provided to be paid by the lessee to the lessors.

3. It is further agreed that in the event the lessee shall exercise his option to purchase said mining claims, improvements and appurtenances, as hereinafter provided, he shall be given credit against the purchase price for the payment of $400.00 and for all royalties paid at time said option to purchase is exercised.

4. It is agreed that the lessee shall pay to the lessors as rent a royalty of 25% of the net value of all ore mined and extracted from said mining claims.

It is agreed that the net value of ore which may hereafter be mined from said premises shall have the following meaning:

a. When crude ore shall be shipped, the amount received therefor after the cost of transportation, treating, assaying and sampling the ore shall have been deducted.

b. When the ore shall be treated at a mill which might be constructed on or near the leased premises, or milled at a custom milling plant, then the concentrate or bullion or product thereof shall be marketed, and the amount received therefor after paying the cost of transportation, assaying, sampling, and/or treatment of the ore and all milling charges shall be the net value.

In determining the net value of the ore mined, it is agreed that no deductions of any kind shall be made for the cost of mining the ore or for the transportation of the same to the surface of the mine.

5. The lessors shall at all times have the right personally, or by a properly designated agent or representative, to enter upon said mining claims for the purpose of inspection, but shall in no way obstruct or in any way interfere with the mining operations of the lessee.

6. The lessee agrees to keep the drifts, shafts, tunnels and other passages and workings at all times clear of loose rock and rubbish, and at the expiration of this lease or the extention thereof as herein provided, to deliver up to said lessors said premises with the appurtenances and improvements, except that the lessee shall have the right to remove all surface equipment.

7. The lessee shall have the right to construct a mill or mills upon said premises, buildings to house employees and any other buildings which said lessee may seem proper or necessary, and the right to remove all such buildings in the event of the termination of this lease for any cause, but it is agreed that all track laid on said mining claims and all timbering, including all frames, chutes, rails, pipes and timbering, shall in the event of termination of this lease remain upon said leased premises and become the property of the lessors.

8. If the lessee shall default in, or fail to comply with, any of the terms, conditions or covenants of this lease, the lessors shall, in writing, by registered mail, notify said lessee of such claimed default or violation, and the lessee shall after such notice comply with the terms of this lease and remedy any existing default thereto within a period of 30 days; but should said lessee after such notice fail or neglect to remedy such default, then the lessors may declare this lease forfeited and the same terminated, and said lessors, or their duly authorized agent or representative, may thereupon, after demand for possession in writing, enter upon said premises and dispossess all persons occupying the same, with or without process of law.

9. It is agreed that the lessee shall not be in any way responsible in the performance of the terms of this lease for any damage or failure to perform by reason of the occurrence of floods, strikes, acts of nature, damage by the elements or occurrences beyond the control of the lessee.

10. It is hereby further stipulated and agreed that the lessee at any time during the term of this lease, or any extention thereof, shall have the exclusive and sole right and privilege, to purchase all of the above described leased premises, appurtenances, improvements and water rights for the total and sole consideration of $20,000.00, and in the event the lessee, his successors or assigns shall exercise such right, he or they shall be given credit upon and against said total purchase price for all royalties thereto fore paid by the lessee or his successors or assigns to the lessors pursuant to the terms of this lease, including credit for the aforesaid sum of $400.00 to be paid as herein provided; and upon payment of such balance as may be due at the time said right of purchase is exercised, the lessors agree to give to the lessee an assignment of all of the aforesaid mining claims, together with a quit-claim deed covering all of their right, title and interest in and abstract of title, showing a clear and unencumbered title in said mining claim in said lessors.

11. If the lessee, his successors or assigns shall have performed on his or their part the terms and conditions of this lease, then at the expiration thereof, to-wit, 3 years from the date hereof, the lessee shall have the exclusive right and option to renew this lease for an additional period of one year upon the same terms and conditions hereinabove set forth, including during said

EXHIBIT "A"

renewal period the right of purchase as herein provided for.

IN WITNESS WHEREOF, the parties have hereunto set their hands the day and year first above written.

s/s Robert Dunsmore

s/s H. Spencer Gibbs

s/s W. Dana Gibbs

s/s Urban Johnson

LESSORS

s/s Claude M. Zabriskie

LESSEE

Signed in the presence of:

s/s Grant A. Nielson

EXHIBIT "A"

ASSIGNMENT

KNOW ALL MEN BY THESE PRESENTS:

That I, Claude M. Zabriskie of Salt Lake City, Utah, the assignor herein, in consideration of the sum of $500.00 in hand paid to me, receipt whereof is hereby acknowledged, the love and affection I bear my daughter, and other good and valuable considerations, do hereby transfer, sell, and assign unto my daughter, Norma J. Zabriskie of Salt Lake City, Utah, all of my right, title and interest in and to that certain lease, agreement and option to purchase, made and entered into the 2nd day of August, 1949, by and between R. Dunsmore, H. S. Gibbs, W. Dana Gibbs, and Urban Johnson, all of Marysvale, Piute County, State of Utah, therein designated as lessors, and Claude M. Zabriskie of Salt Lake City, Utah, therein designated as lessee, which lease, agreement and option to purchase is hereunto annexed and marked "EXHIBIT A."

WITNESS MY HAND AT Salt Lake City, Utah, this 9th day of November, 1949.

s/s Claude M. Zabriskie

DEPARTMENT OF THE INTERIOR
Defense Minerals Administration
RECEIVED
MAY 26 1952

EXHIBIT "A"

ASSIGNMENT

KNOW ALL MEN BY THESE PRESENTS:

That I, Norma J. Zabriskie of Salt Lake City, Utah, in consideration of the shares of stock to be received by me in the Western Uranium Corporation, as now evidenced by the Articles of Incorporation of said company, have this day sold, assigned, transferred, set over and delivered and by these presents do hereby sell, assign, transfer, set over and deliver unto Western Uranium Corporation, organized under the laws of the State of Utah, all of my right, title, and interest in and to that certain lease and option to purchase dated the 2nd day of August, 1949, by and between R. Dunsmore, H. S. Gibbs, W. Dana Gibbs, and Urban Johnson, all of Marysvale Piute County, Utah, therein designated as lessors, and Claude M. Zabriskie of Salt Lake City, Utah, therein designated as lessee, and by the terms of which the said lessors lease and let to the said lessee for a term of three years and subject to an extension of said lease for a period of one year as provided therein, and giving and granting to the said Claude M. Zabriskie the right to purchase all of the mining claims referred to and described in said agreement for the total consideration of $20,000.00 and providing further that all payments in the nature of royalties from mining operations be credited against the aforesaid purchase price, and in which said lessors acknowledge receipt of the sum of $400.00 at the date of the execution of said lease and option to purchase, and which said lease and option to purchase was on the 9th day of November, 1949, sold, assigned and transferred by the said Claude M. Zabriskie to the undersigned, the original of which said lease and option herein referred to is hereunto attached and marked "Exhibit A" and made a part hereof, together with the assignment herein referred to; and I do hereby further sell, assign, transfer, set over and deliver unto said Western Uranium Corporation all of my right, title, and interest of every kind and nature in and to that certain operator's agreement dated the 3rd day of January, 1950, by and between the undersigned, Norma J. Zabriskie and Clarence J. Gillaspey of Grand Junction, Colorado, by the terms of which said Clarence J. Gillaspey agrees to immediately enter upon said mining claims and begin exploration and development work and mine for uranium and other valuable minerals, the original of which said agreement is hereunto attached and marked "Exhibit B" and made a part hereof.

IN WITNESS WHEREOF, I, Norma J. Zabriskie, have hereunto set my hand at Salt Lake City, Utah, this 4th day of February, 1950.

s/s Norma J. Zabriskie

Signed in the presence of:

s/s A. H. Hougaard

STATE OF UTAH)
COUNTY OF SALT LAKE) ss.

On this 4th day of February, 1950, personally appeared before me Norma J. Zabriskie, the signer of the foregoing instrument, who duly acknowledged to me that she signed the same.

s/s A. H. Hougaard
Notary Public

My Commission Expires:
July 6, 1953

GLENNY-CUTLER MARYSVALE OPERATIONS, 704 Newhouse Bldg., Salt Lake City, Utah.

AGREEMENT

EXHIBIT "B"

This agreement made and entered into this 20th day of September, 1950, by and between the Western Uranium Corporation, a Utah corporation of Salt Lake City, Utah, hereinafter referred to as the first party, and R. A. Glenny of Salt Lake City, Utah, and Scott M. Cutler of Marysvale, Utah, hereinafter referred to as the second parties, WITNESSETH:

That whereas the party of the first part is the owner and holder of a certain lease and option to purchase certain mining claims believed to contain valuable ore, situated near Marysvale, Piute County, State of Utah, said lease and option having been granted to the said first party by R. Dunsmore, H. S. Gibbs, W. Dana Gibbs, and Urban Johnson, all of Marysvale, Piute County, Utah, said lease and option to purchase covering certain mining claims located by the above named persons between May 8, 1949, and June 1, 1949, and the same having been duly recorded in the office of the county recorder of Piute County, State of Utah, a more particular description of said mining claims being as follows:

That certain mining claim and notice of location, dated the 7th day of June, 1949, said location being described and marked on the ground as more specifically stated and set forth in the notice of location filed in the office of the county recorder of Piute County, State of Utah, on June 8, 1949, and recorded in Book E of Location Notices, page 225, and given the name and designated in said mining location notice as J.D.G. MM Lode Claim.

That certain mining claim and notice of location, dated the 8th day of June, 1949, said location being described and marked on the ground as more specifically stated and set forth in the notice of location filed in the office of the county recorder of Piute County, State of Utah, on June 13, 1949, and recorded in Book E. of Location Notices, page 228, and given the name and designated in said mining location notice as J.D.G. No. 1 Mining Claim.

That certain mining claim and notice of location, dated the 1st day of May, 1949, said location being described and marked on the ground as more specifically stated and set forth in the notice of location filed in the office of the county recorder of Piute County, State of Utah, on May 4, 1949, and recorded in Book E of Location Notices, page 209, and given the name and designated in said mining location notice as Camel No. 1, and

That certain mining claim and notice of location, dated the 15th day of May, 1949, said location being described and marked on the ground as more specifically stated and set forth in the notice of location filed in the office of the county recorder of Piute County, State of Utah, on May 16, 1949, and recorded in Book E of Location Notices, page 211, and given the name and designated in said mining location notice as Lucky Strike No. 9.

Together with all of the improvements and appurtenances thereunto belonging or in any wise appertaining, and the right to the use of all such water and water rights for any and all culinary and mining purposes as may now be on said mining claims or as may be developed by the lessee thereon.

EXHIBIT "B"

A full, true and correct photostatic copy of the first party's lease and option to purchase is hereto attached and made a part hereof and marked Exhibit "A".

AND, WHEREAS, the second parties to this agreement have examined the above mining claims and are familiar with their location and the nature and character of ores thereon, so far as can be determined without further development and exploration work, and have such knowledge concerning the same that they are willing and desirous of entering into this contract for the future exploration and development of said mining claims and the extraction of the ores and minerals therefrom.

AND, WHEREAS, it has been agreed between the parties hereto that the second parties shall have the exclusive right and privilege, without limitation of time, for the purpose of exploring said mining claims and developing the same, and extracting the ores, uranium, and other valuable minerals therefrom, subject to the considerations, exceptions and limitations hereinafter specifically stated and set forth.

NOW, THEREFORE, it is hereby agreed between the first party and second parties tothis agreement as follows:

1. It is agreed that the second parties shall have, and they are hereby given, the exclusive right, without limitation of time, to explore and develop the mining claims above described, and to extract therefrom the uranium minerals and other valuable deposits found, or that may hereafter be found upon said mining claims; that they will, within a period of ten days from date hereof, go upon said mining claims with equipment of such a nature and character as will enable the second parties to carry on said development and exploration work, and to extract the ores and mineral deposits from said mining claims, and agree to so develop and explore said mining claims as will assure the removal therefrom within a period of 30 days from date hereof at least 30 tons of shipping ore per month.

2. It is stipulated and agreed that the sole and only consideration to be paid by the first party, or to be received by the second parties for the aforesaid exploration and development work, and the extraction of the ore and minerals from said mining claims shall be as follows:

The second parties shall deliver all marketable uranium and other ores to an established agency of the United States Government, and such agency, or other properly designated person, shall pay from the net proceeds of said ore the royalties payable to the locators of said claims on the basis of the attached agreement between the first party and said locators, until the full amount of $20,000.00shall have been paid to said locators pursuant to the terms of the bond and lease hereto attached.

3. It is agreed that from said net proceeds there shall be paid to the second parties the cost of mining the said ore and other mineral deposits, not to exceed, however, the sum of $2.50 per ton, and any excess in mining costs over said sum per ton shall be borne entirely by the second parties. And after payment of said amount, the remaining net proceeds shall be divided in equal shares between the first party or its assignees and the second parties, and said amounts payable to either the locators, the first party or the second parties shall be paid directly to said persons or their respective assignees by such agency of the United States Government or other person

EXHIBIT "B"

pursuant to the terms of this agreement. It is stipulated that the amount payable to the second parties as herein provided shall be paid to R. A. Glenny, Newhouse Building, Salt Lake City, Utah.

It is stipulated and agreed that the provisions of this contract provide for the allowance of $2.50 as mining costs and shall be subject to review in the event mining costs shall substantially exceed said sum, and that the parties in order to meet the equities of any question that may arise concerning mining costs and at the request of the second parties will reconsider said provision and attempt to agree upon any excess mining costs above said amount.

4. It is further stipulated and agreed that the second parties shall keep an accurate assay of the ores being removed from the above described claims, and if at any time the ores are of such high grade as to demand a premium price, that the same shall be marketed to such persons, firms, or corporations who are in a position to pay such premium prices, notwithstanding the fact that such purchasers may be located at a place other than said Marysvale, Utah.

5. It is agreed and understood that the second parties will move equipment for the aforesaid exploratory and development work, and for mining operations, on to the above-described mining claims, and shall be in substantial operation upon the same on or before the 25th day of September, 1950, and it is agreed that in respect to the provisions of this contract, that time is of the essence thereof, and the first party does hereby grant unto the second parties the exclusive right and privilege to immediately enter upon and to explore and develop said mining claims, and that such exclusive right shall continue in the second parties until all of the marketable ores upon said mining claims shall have been exhausted by the second parties, subject, however, to the parties of the second part complying with all of the provisions and requirements of this agreement. And in consideration of this right granted to the second parties by the first party, the second parties do hereby covenant and agree that they will enter upon said mining claims within the period aforesaid, and begin the exploration and development work contemplated by this agreement, and will, as soon as practicable, commence the movement of uranium ore and other valuable mineral deposits therefrom, and that they will continuously, each and every month, work 60 man shifts, as provided by the attached lease of first party, and will remove the greatest possible amount of uranium and other mineral deposits consistent with good and workmanlike mining, and it is agreed that if the second parties shall cease the work of exploration, development and mining of ore as herein provided, for the period of ten consecutive days, that then this lease and option shall at once become void and of no legal force or effect whatsoever, and without any act upon the party of the first part or his assignees, and the said second parties shall immediately forfeit all rights that they might otherwise have under the provisions of this agreement, and the first party or his duly designated agent or agents shall have the right to go upon said mining claims and assume the exclusive right, jurisdiction and control thereover.

6. It is agreed that so long as the second parties shall perform the terms of this agreement, that they shall have the exclusive right to determine the nature and character of the development and exploration work, and the method and manner of extracting ore therefrom.

7. The first party and such mining engineers or other agents as may be designated and appointed, shall have the right at all times to go upon said mining claims and inspect and examine the exploration and development work, and the manner of extracting ores from said mining claims, and shall have the right to take measurements for the purpose of determining the tonnage of ore extracted, and shall have access to all shipments and bills of lading showing the amount of ore shipped by the second party, but such examination or inspection shall be without unreasonable hindrance or delay to the work of the second parties on said mining claims.

8. It is agreed and understood that the second parties will do all work upon said mining claims in a good and miner-like fashion, and that wherever necessary the second parties will timber any and all tunnels or other underground workings, and will at all times conduct mining operations thereon to insure the safety and well-being of employees who may be employed by the second parties.

9. That the second parties will promptly and fully pay for all labor and materials that may be furnished and supplied by any person whomsoever in the conduct of said work upon said mining claims, and that they will keep said mining claims free and clear from all liens or liabilities of any kind by reason of material and labor furnished therefor.

10. It is understood and agreed that the second parties will comply with all federal and state laws with respect to the operation of said mining claims, and the removal of ore therefrom; that they will provide industrial compensation insurance for all employees which they may employ for the removal and extraction of ores as aforesaid, and in the exploration and development of said mining claims, and will conform in all respects in said mining operation to all rules and regulations of the Atomic Energy Commission or its duly authorized agents and representatives.

11. It is stipulated and agreed that the second parties, as soon as operations are commenced on the above described mining claims, shall post notices in at least 3 conspicuous places on said mining claims, which said notices shall set forth that the exploratory work, development work, and the extraction of ore from said mining claims is being done by the second parties, and that the second parties are thereunder responsible for all work and labor that may be performed on said mining claims, and for all material that may be purchased and used on said mining claims.

12. The second parties agree to comply in all respects with the provisions of the lease and option to purchase, Exhibit "A" attached hereto, and to comply with each and every provision of said contract, and the second parties hereby acknowledge that they have read said lease and option to purchase and are fully informed as to the contents and provisions thereof, and that they will in all respects perform all of the terms and provisions thereof.

13. It is agreed that the second parties shall not be responsible for the performance of the terms of this agreement or for the performance of the terms of the lease and option to purchase, Exhibit "A" attached hereto, which performance may be made impossible by reason of the occurrence of floods, strikes, acts of nature, damages by the elements, or occurrences beyond the control of the second parties.

14. It is agreed by each of the parties hereto that if an offer to purchase said mining claims shall be made either of the parties, that such party will

immediately communicate such fact to the other party and that each of the parties will exercise good faith in a determination of whether an offer of purchase should be accepted, it being the purpose and intention to protect the financial interest of each party in respect to any offer of sale which may seem advantageous under circumstances as they may exist at the time of such offer. In the event of sale of said mining claims, the net proceeds of such sale shall be disbursed as follows: Any balance remaining due and owing to the locators of said mining claims shall first be paid in full and the balance divided, one-half thereof to the first party and one-half thereof paid to the second parties; and the second parties agree from the amount received by them to pay and discharge all existing claims and demands for work, labor, material, and any and all other obligations of the second parties arising out of their operation upon said mining claims.

IN WITNESS WHEREOF, the parties have hereunto set their hands the day and year first above written.

Attest:

s/s Norma J. Zabriskie
Secretary

WESTERN URANIUM CORPORATION

By s/s Claude M. Zabriskie
PRESIDENT

PARTY OF THE FIRST PART

s/s R. A. Glenny
R. A. GLENNY

s/s Scott M. Cutler
SCOTT M. CUTLER

PARTIES OF THE SECOND PART

SUBORDINATION AGREEMENT Exhibit "C"

KNOW ALL MEN BY THESE PRESENTS:

WHEREAS, the undersigned, Robert Dunsmore, H. Spencer Gibbs, W. Dana Gibbs, and Urban Johnson, are owners and lessors of the following mining claims located in the Durkee Mining District, Piute County, State of Utah, to-wit:

CAMEL NO. 1 LODE CLAIM and J.D.G. MM LODE CLAIM

and

WHEREAS, said mining claims have been leased to the Western Uranium Corporation for the purpose of extracting uranium and other minerals; and

WHEREAS, the said Western Uranium Corporation has heretofore entered into an agreement with R. A. Glenny and Scott M. Cutler for the exploration of said mining claims and the development of uranium and other minerals thereon, and said R. A. Glenny and Scott M. Cutler have for a period of 19 months been engaged in the exploration of said mining claims and have expended substantial sums for said purpose. The said R. A. Glenny and Scott M. Cutler have filed an application for aid for an exploration project pursuant to Mineral Order 5, under Defense Production Act of 1950 in the sum of Twenty Thousand Dollars ($20,000.00) to further develop the above described claims;

NOW THEREFORE, in consideration of the premises, the undersigned hereby acquiesce and consent to said application and approval thereof in whole or in part, and do hereby subordinate to the United States of America all of their right, title and interest as owners and lessors of said property herein above described pursuant to the exploration project contract that may be entered into between R. A. Glenny and Scott M. Cutler and the United States of America.

Robert Dunsmore — Robert Dunsmore

H. Spencer Gibbs — H. Spencer Gibbs

W. Dana Gibbs — W. Dana Gibbs

Urban Johnson — Urban Johnson

WESTERN URANIUM CORPORATION - By Claude M. Zabriskie, President

STATE OF UTAH)
COUNTY OF HUTE) ss

On this 3rd day of November, 1951, personally appeared before me H. Spencer Gibbs, W. Dana Gibbs, and Urban Johnson, the signers of the foregoing instrument, who duly acknowledged to me that they executed same.

Violet Sargent
Notary Public
Residing at Marysvale, Utah

My Commission Expires:
Feb. 2 1953

STATE OF UTAH)
COUNTY OF SALT LAKE) ss

On this 28th day of November, 1951, personally appeared before me Robert Dunsmore and Claude M. Zabriskie, President of the Western Uranium Corporation, the signers of the foregoing instrument, who duly acknowledged to me that they executed same.

G. H. Greenwood
Notary Public
Residing at Salt Lake City

My Commission Expires:
July 6-1953

GLENNY-CUTLER MARYSVALE OPERATIONS, 704 Newhouse Bldg., Salt Lake City, Utah.

C. O. Mittendorf
6-17-52
11:25

DEPARTMENT OF THE INTERIOR
Defense Minerals Administration
RECEIVED
JUN 17 1952

ans. 6/23/52
ack/em

DN 235 BUREAU MINES 6-17-52 8-25 AM

C O MITTENDORF

REFERRING TO YOUR LETTER DATED JUNE 13 RE DMEA 2271, GLENNY-CUTLER, WE REQUESTED CHIEF COUNSEL ON MAY 22 FOR RULING ON LEASES HELD BY APPLICANT. KINDLY EXPEDITE RULING OF CHIEF COUNSEL SOWE MAY COMPLETE CONTRACT.

W H KING

Denver, Colorado

JUN 17 1 22 PM '52
BUREAU OF MINES
MAIL ROOM
WASHINGTON, D.C.

1-1027
(April 1946)

UNITED STATES
DEPARTMENT OF THE INTERIOR

AGENCY BUREAU OF MINES - DENVER

TELETYPE

Originator:
Ext.: Room:

Appro.:
Date: 6/17/52
Time:
No.:
To: C. O. MITTENDORF BM WASHINGTON

Subject:

REFERRING TO YOUR LETTER DATED JUNE 13 RE DMEA 2271, GLENNY-CUTLER. WE REQUESTED CHIEF COUNSEL ON MAY 22 FOR RULING ON LEASES HELD BY APPLICANT ~~ON MAY 22~~. KINDLY EXPEDITE RULING OF CHIEF COUNSEL SO WE MAY COMPLETE CONTRACT.

W. H. KING

W. H. King

DEPARTMENT OF THE INTERIOR
Defense Minerals Administration
(FILED)
JUN 20 1952

CONFIRMATION
Authorized:

Sign original message and transmit to Room ..... in duplicate

U. S. GOVERNMENT PRINTING OFFICE 16—50915-1

FILE COPY
SURNAME:

200

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

JUN 13 1952

Mr. W. H. King
Executive Officer
Region IV
Bureau of Mines
224 New Customhouse Building
Denver 2, Colorado

Dear Mr. King:

The enclosed letter from R. A. Glenny concerning action on exploration application Docket No. IMRA 2271, was received in this office. Since this application is being processed in Region IV, within your delegation, the letter is being sent to you for reply.

Sincerely yours,

E. O. Mittendorf

Acting Administrator
Defense Minerals Exploration
Administration

J.N. 6-13-52

Enclosure

READams/meb
6-12-52
cc to: Adm.Reading File
Mails & Files Br.
R. A. Glenny

FILE COPY
SURNAME:

200

Adams

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

JUN 13 1952

Mr. R. A. Glenny
704 Newhouse Building
Salt Lake City 1, Utah

Dear Mr. Glenny:

This will acknowledge your letter dated June 10, 1952, requesting information on the status of your exploration assistance application Docket No. DMEA-2271.

Your application is being processed by the Field Team in Region IV, and Mr. King, Executive Officer, has been requested to advise you of the status of your application.

Sincerely yours,

D. S. Mitteadorf (for)

D.N. 6-13-52

Acting Administrator
Defense Minerals Exploration
Administration

READams/meb
6-12-52
cc to: Adm.Reading File
Mails & Files Br.
Field Team,Reg.IV(2)

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

224 New Customhouse
Denver 2, Colorado

April 3, 1952

Memorandum

To: Acting Administrator, Defense Minerals Exploration Administration
Attention: 210

From: Field Team, Region IV

Subject: Final Report, DMEA Docket 2271, Glenny-Cutler Co., Marysvale Operations, Piute County, Utah

The application for Government assistance in exploration work estimated to cost $24,477.50, has been approved by us and a contract is being prepared.

Government participation will be 90 percent, or $22,029.75.

Four copies of the Final Report will be forwarded when the contract is processed.

The original and one copy of Form 3b is attached.

J. H. East, Jr.

A. H. Koschmann

Enclosures

DEPARTMENT OF THE INTERIOR
Defense Minerals Administration
DENVER
APR 10 1952

Region 4 case

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

224 New Customhouse
Denver 2, Colorado

April 3, 1952

Memorandum

To: Acting Administrator, Defense Minerals Exploration Administration
Attention: 210

From: Field Team, Region IV

Subject: Final Report, DMEA Docket 2271, Glenny-Cutler Co., Marysvale Operations, Piute County, Utah

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Four copies of the Final Report will be forwarded when the contract is processed.

The original and one copy of Form 3b is attached.

J. H. East, Jr.

A. H. Koschmann

Enclosures

DEPARTMENT OF THE INTERIOR
Defense Minerals Administration
RECEIVED
APR 10 1952

Form MF-103
(Revised June 1951)

UNITED STATES DEPARTMENT OF THE INTERIOR
DEFENSE MINERALS ADMINISTRATION

Budget Bureau No. 42-R1035.1.

MF-103 Should Be Filed With General Technical Data Form MF-100

APPLICATION FOR AID FOR AN EXPLORATION PROJECT PURSUANT TO MINERAL ORDER 5, UNDER DEFENSE PRODUCTION ACT OF 1950

Not To Be Filled in by Applicant

Docket No. DMEA 2271
Metal or Mineral
Date Received 12-3-51
Amount $
Participation (Government %)

Name and address of applicant

R. A. GLENNY and SCOTT M. CUTLER
704 Newhouse Building,
Salt Lake City, Utah

Date November 29, 1951

If you have already filed MF-100, give date filed Nov. 29, 1951, type of assistance requested $20,000.00 Loan Uranium,

DMA Docket Number (if available)

INSTRUCTIONS

Read Mineral Order 5, Regulations Governing Government Aid in Defense Projects, before completing this application. Submit four copies each, of the signed application form, General Technical Data Form MF-100, and answers to questions as specified, to Defense Minerals Administration, Department of the Interior, Washington 25, D. C., or to the nearest field executive office thereof, with your name and address on each sheet of the application and all accompanying papers. If you have previously filed MF-100, it is not necessary to file it again. However, you should indicate in space provided above the type of assistance previously applied for (loans, procurement contracts, etc.) and DMA Docket Number, if available. *When a question is inapplicable it should be so stated in the form.* Additional sheets should be attached in answering any questions or in supplying additional information. IF YOU CANNOT ANSWER A QUESTION, SO STATE.

DEFENSE MINERALS ADMINISTRATION WASHINGTON, D.C. 3 8 38 AM '51

1. (*a*) Give a description of the real property that will be in any way involved in the exploration project, including any existing mine or operating property.

   (*b*) If you are not the owner of the property, submit a copy of the lease, purchase option, or other agreements under which you are authorized to operate the property with each copy of your application.

   (*c*) Give the legal description of the exact parcel, plot, or area upon which the exploration is to be conducted.

   NOTE: (1) If both areas are the same, so state. The only obligation to repay the Government is from the net earnings from any commercial discovery made in the area specified in (*c*) above in which the exploration is to be conducted, and the expenditure of funds which may be charged as costs of the project must be limited to that area or to work necessary to perform the exploration in that area.

   (2) If applicant is not the owner of the property or if there are any liens or encumbrances against the property, copy of agreements of claimants, lienors, encumbrances, and lessors subordinating their interests in the property to the interest of the Government under the Exploration Project Contract will be required for attachment to the Contract.

2. (*a*) What metals or minerals do you expect to find?

   (*b*) Furnish statement of the geologic features of your property, giving type of ore deposit and reasons for expecting to find commercial ore bodies. Illustrate with maps or sketches. If you have a geologic or engineering report, or assay maps showing width and grade, please send them with application, stating whether or not you wish to have them returned.

The information requested in questions 3, 4, 5, 6, 7, 8, and 9 below should be answered specifically and in detail, as this information will be attached to and incorporated as part of the Exploration Project Contract, if such contract is entered into with you by the Government.

ANSWER EACH QUESTION ON SEPARATE SHEETS OF PAPER AND SUBMIT A COPY OF EACH ANSWER FOR EACH COPY OF YOUR APPLICATION.

3. (*a*) Describe fully the proposed work and give the total cost of the project.

   (*b*) State the time required to start the project and to complete it.

4. Submit a map or sketch of the property involved showing a plan (and cross section, if needed) of the present mine workings and the *location of the proposed exploration work* as related to geologic features, such as contacts, veins, ore-bearing beds, etc.

5. Furnish an itemized list of existing facilities, buildings, installations, and fixtures with a statement of the cost of any necessary rehabilitation or repairs to put into useful and operable condition.

6. Furnish a detailed list of additional facilities, buildings, and fixtures to be purchased, installed, or erected by you, with the estimated cost of each item.

7. Furnish a detailed list of operating equipment, separated into items to be—

   (*a*) Rented

   (*b*) Purchased

   (*c*) Furnished by you

   with the rental, purchase price, or depreciation of each item, as the case may be, to be charged as a cost of the project.

8. Furnish an itemized schedule of labor, by numbers and classes (miners, muckers, etc.) and of supervisors by numbers and positions, with the maximum wages or salaries to be paid to each.

9. Furnish a detailed list with estimated cost of each item for materials, supplies, engineering, assaying, accounting, power, water, utilities, and any other items not provided for above.

10. (*a*) How much are you prepared to invest in the proposed project?

    (*b*) Is this amount sufficient to pay your part of the cost of the project, in accordance with the regulations on Government participation (Sec. 9 of MO–5)?

11. State any conditions or circumstances regarding the property not sufficiently brought out by the foregoing questions.

CERTIFICATION

The undersigned company, and the official executing this certification on its behalf, hereby certify that the information contained in this form and accompanying papers is correct and complete to the best of their knowledge and belief.

R. A. GLENNY and SCOTT M. CUTLER, a partnership
DBA
MARYSVALE OPERATIONS
(Name of company)

By R. A. Glenny
(Signature of authorized official)

November 29, 1951
(Date)

Business Partner
(Title)

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—64067-2

1. (A) Give a description of the real property that will be in any way involved in the exploration project, including any existing mine or operating property.

The description of the real property involved in the exploration project will be done on the J.D.G. MM LODE CLAIM and the CAMEL NO. 1 LODE CLAIM, which are described as follows:

> That certain mining claim and notice of location, dated the 7th day of June, 1949, said location being described and marked on the ground as more specifically stated and set forth in the notice of location filed in the office of the county recorder of Piute County, State of Utah on June 8, 1949, and recorded in Book E of Location Notices, page 225, and given the name and designated in said mining location notice as J.D.G. MM Lode Claim.
>
> That certain mining claim and notice of location, dated the 1st day of May, 1949, said location being described and marked on the ground as more specifically stated and set forth in the notice of location filed in the office of the county recorder of Piute County, State of Utah on May 4, 1949, and recorded in Book E of Location Notices, page 209, and given the name and designated in said mining location notice as Camel No. 1 Lode Claim.

(B) Copy of lease from owners and assignment hereto attached and marked Exhibit "A".

Copy of lease and option of applicants hereto attached and marked Exhibit "B".

(C) and Note (1)

The work and legal description of the exact parcel upon which the exploration is to be conducted will be on the J.D.G. MM Lode Claim as described in No. 1 (A) of this application, at the bottom of the present 80° shaft which is located approximately 215 feet south of the southwest corner of the Camel No. 1 Lode Claim, which will be developed by the sinking of this shaft and the drifting work which will take place at any promising point; but all work will be confined only in the areas of the above described real property under No. 1 (A) of this application.

Note: (2)

The applicants have no liens or encumbrances against the property, and the lessors subordinating their interests in the property to the interests of the Government under this exploration contract, hereto attached to this application and marked Exhibit "C".

2. (A) What metals or minerals do you expect to find?

Uranium bearing minerals.

(B) Furnish statement of geologic features of property, giving type of ore deposit and reasons for expecting to find commercial ore bodies. Illustrate with maps and sketches.

The preliminary bulldozing and the sinking of incline shaft, the drifting work

2. (B) Continued.....

and the sinking of the 80° shaft has exposed very promising structures on applicant's claims. The bulldozing work and the sinking of the 80° shaft sunk to approximately 100 foot in depth on the structure have increased the values of .05 of U 3O8 uncovered on the surface to .08 plus at 100 feet; and it is this reason for expecting to find commercial ore bodies at further depth. The applicants have no geologic or engineering report. However, Mineral Survey Map showing the applicant's claims and geological map are hereto attached and marked as Exhibits "D" and "E", respectively. All other pertinent data covering applicantls exact parcel of real property and geological information can be obtained from the Marysvale Field Office of the Atomic Energy Commission.

3. (A) Describe fully the proposed work and give the total cost of the project.

The proposed work is to continue sinking 80° shaft for approximately 250 feet in depth and drifting at the most promising points of the structure on strike of vein for 350 feet.

(B) State the time required to start and complete the project.

This project can be completed within ten to twelve months.

4. Submit map or sketch of the property involved .

Only claim map and geological map of applicant's property are hereto attached as Exhibits "D" and "E" and other pertinent data must be obtained from the Marysvale, Utah Field Office of the Atomic Energy Commission.

5. Furnish itemized list of existing facilities; cost of repairs.

There are no existing facilities, buildings, installations or fixtures to make repairs or put in operable condition. However, the applicant's 80° shaft is in first-class condition, with the exception of the installation of a head frame.

6. Furnish list of additional facilities, buildings, installations, and etc. to be erected by you, with cost of each item.

Additional facilities, buildings, and fixtures and installations to be purchased and erected are as follows:

head frame $500.00
bulldozing for preparation of head frame and dump track...$200.00
Hoist room and shop building.....$250.00
installation of equipment.....$200.00

7. Furnish detailed list of operating equipment, separated into items:

(A) Rented	(B) Purchased	(C) Furnished by you
"None"	"None"	The applicants will furnish all necessary mining equipment on the monthly rental basis of $275 per month to be charged as a cost to the project.

8. Furnish an itemized schedule of labor and of supervisors with maximum wages and salaries paid to each.

Two miners and one hoistman per shift at $12.50 per shift; one supervisor at $15.00 per shift. This does not include workmen's insurance, unemployment compensation or F A I insurance.

9. Furnish list with estimated cost of each item for materials, supplies, engineering, assaying, accounting, power, water, utilities.

The cost of material and supplies, assaying, accounting, power, water, and utilities will be approximately $11.00 to $20.00 per day, plus timber at $8.50 per foot in the shaft.

10. (A) How much are you prepared to invest in the proposed project?

The applicants are prepared to invest in the proposed project their 10% covering this application for a $20,000.00 Loan.

(B) The applicants are prepared to invest their 10% in the proposed project, which is sufficient to pay their part of the cost of the project, and in accordance with the Regulations on Government Participation (Section 9 and 10 of MO 5 as amended.)

11. State any conditions or circumstances regarding the property not sufficiently brought in the foregoing questions.

None

Form MF-100
(May 1951)

U. S. DEPARTMENT OF THE INTERIOR
DEFENSE MINERALS ADMINISTRATION

Form approved.
Budget Bureau No. 42-R1026.

GENERAL TECHNICAL DATA
FOR USE UNDER THE
DEFENSE PRODUCTION ACT OF 1950

NOT TO BE FILLED IN BY APPLICANT

Docket No. DMEA 2271

Date received 12-3-51

R. A. GLENN and GUY R. BUTLER
704 Newhouse Building
Salt Lake City, Utah

Name and address of applicant

Date November 29, 1951

INSTRUCTIONS

This form is to be filed with Defense Minerals Administration, Department of the Interior, Washington 25, D. C. It should be accompanied by appropriate application form when a specific type of Government assistance is requested, in the form of (1) loan, (2) purchase contract, (3) Government guarantee of a private loan, (4) priorities or allocation of mining equipment, and maintenance, repair and operating supplies, and (5) other forms of Government assistance that might arise under the Act. Submit four (4) signed copies of the form and accompanying papers. Name and address should be stamped or typed on each sheet of this form and all accompanying papers. *When a question is inapplicable it should be so stated on the form.* Additional sheets may be attached in answering any questions or in supplying additional information. (IF YOU CANNOT ANSWER A QUESTION, SO STATE.) If a question is answered elsewhere indicate where answered. It is not necessary to answer it again.

DEFENSE MINERALS ADMINISTRATION WASHINGTON DC 8 36 AM '51

GENERAL TECHNICAL DATA

Supply the following information on separate sheets, arranged, numbered, and lettered as indicated:

1. Materials produced:
   (*a*) What are the chief mine, mill, or smelter products?
   (*b*) What are the byproducts, if any?
2. Name(s) and type(s) of mine(s), mill(s), smelter(s), refinery(ies), pit(s), quarry (ies), drilling operation(s). Include old names of property, if any. Show extent of workings, including the following:
   (*a*) Linear feet of shafts.
   (*b*) Linear feet of drifts and crosscuts.
   (*c*) Linear feet of tunnels or adits.
   (*d*) Linear feet of other mine openings (explain briefly).

   Indicate whether mine is flooded or not. Describe any pumping problems. Give size or productive capacity.
3. For each operation listed above supply the following:
   (*a*) Distance and direction from nearest town and shipping point.
   (*b*) Mining district.
   (*c*) Township, Section, Range.
   (*d*) County, State.
4. (*a*) State whether or not property is now in operation, and if in operation, by whom operated.
   (*b*) Are you operating this property as:
   - ☐ Owner.
   - ☐ Lessee.
   - ☐ Contractor.
5. Number of years in production _____

   If not in production or operation, estimated date when production will begin _____
6. Experience of operators:

   Describe the mining and general business experience of (*a*) the applicant, and (*b*) the person or persons who manage the project.
7. History:
   (*a*) Give a statement, as complete as possible, of previous exploration, development, operation, and production of property, with reasons for suspension of operation.
   (*b*) State briefly the known history and production of adjoining and neighboring properties.
   (*c*) Furnish any available (private) reports that may apply to this application, including results of mine examinations, recommended exploration and development, and metallurgical investigations.

8. Names and addresses of Officers, Directors, or Partners, and in addition thereto, the five largest stockholders if applicant is a corporation.

Name and Address (a)	Official Title (If officer is also director indicate by "D") (b)	Total of Annual Salary, Commissions, Bonuses, Etc., Received From Applicant and Affiliates During Last Fiscal Year (c)	Estimated Net Worth Outside of Interest in Applicant (d)	Number of Shares Held in Applicant Corporation: Common (e)	Number of Shares Held in Applicant Corporation: Preferred (f)	Life Insurance Carried for Benefit of Applicant: Amount (g)	Life Insurance Carried for Benefit of Applicant: Net Cash Surrender Value After Loans (h)
R. A. Glenny	Business Partner	None	$50,000.	50%	interest	None	None
Scott M. Cutler	Operating Partner	2,605.00	$6,000.	50%	interest	None	None
	Total	2,605.00	x x x x x	100%		x x x x x	x x x x x

If more lines are needed continue on separate sheet.

9. Capital Stock Issues:

For Corporate Applicants

Item	Authorized (a)	Outstanding (b)	Par Value (c)	Number of Shares Outstanding (d)	Dividend Rate Last Paid* (e)
Common stock	$	$	$		
Preferred stock	$	$	$		

*Indicate period covered.

10. Production:

Item	Kind of Product (a)	1948 Total (b)	1949 Total (c)	1950 Total (d)	Present Average Monthly (e)
1. Quantity of product mined or quarried (Short, long, metric tons; barrels; pounds; etc.)	None	None	None	None	None
2. Quantity of product processed (specify unit of measure and type of process)	None	None	None	None	None
3. Quantity and grade of product sold or shipped (specify units of measure)	None	None	None	None	None

11. Do you contemplate a change in the present average monthly rate of production? If so, state estimated maximum monthly production and basis of change. No production yet; mine in development stage.

12. Ore or Mineral Reserves:

(a) Describe the ore or mineral deposit briefly. Accompany the application by any available report on the geology and ore reserves. The property is located adjacent [illegible] producing properties of uranium bearing mater[illegible], but applicants are unable to describe ore or mineral deposits until after further development is accomplished.

(*b*) If deposit is other than placer:

(1) Submit assay plans and/or sections showing location and size of proved (measured) and probable (indicated) ore or mineral reserves. No commercial proved or probable mineral reserves yet, as mine is being developed.

(2) State the tonnage (indicate type of ton) and grade of each class of ore reserve, as above, and show how computed. Tabulated total ore reserve as follows:

TOTAL ORE OR MINERAL RESERVES tonnage to tabulate.

Ore or Mineral Reserve	Estimated Tons (a)	Metal or Mineral Content Per Ton (Grade) (b)	Gross Value Per Ton (c)	Recoverable Unit Value Per Ton (d)	Estimated Cost of Production Per Ton (e)
Measured (proved)	None	None	None	None	None
Indicated (probable)	None	None	None	None	None

(*c*) If placer: This is not a placer project; therefore items 1-6 are not answered.

(1) Give estimated total yardage and average marketable mineral content of each deposit.

(2) Submit map showing location of placer deposit and surrounding area, with all test holes or pits. Submit logs of each hole and test pit with depth and average value of each.

(3) Describe gravel, stating whether fine, medium or coarse; loose, tight, cemented, or frozen, and whether it contains stumps or boulders more than 1 foot in diameter; if so, how large, and in what proportion.

(4) Describe bedrock, giving type (granite, sandstone, shale, etc.) and state whether it is hard or soft, smooth, uneven or rough.

(5) Describe overburden, stating whether loose, tight, or cemented; fine or coarse textured; furnish estimate of average thickness and total amount.

(6) Tabulate the reserves using the form outlined above for ore or mineral reserves.

13. Access Roads:

Give road distances to shipping, supply and residence points, stating kind and condition of roads.

14. Water Supply:

State source and quantity of water available for operations and whether sufficient for all seasons of year.

15. Power:

State amount of power used, rate per hour, and source thereof.

16. Labor:

State number and classes (miners, muckers, millmen, etc.) of men employed during a recent representative payroll period.

17. Equipment and Facilities:

Describe present equipment on the property, including buildings. (State condition.) List major pieces of equipment now owned or controlled and in serviceable condition available for this operation.

18. Are there any particular conditions or circumstances affecting your operations that are not described above? If so, explain.

CERTIFICATION

The undersigned company, and the official executing this certification on its behalf, hereby certify that the information contained in this form and accompanying papers is correct and complete to the best of their knowledge and belief.

R. A. CLENNY and SCOTT M. CUTLER, a partnership DBA, MARYSVALE OPERATIONS.
(Name of company)

By R. A. Clenny
(Signature of authorized official)

November 29, 1951
(Date)

Business Partner
(Title)

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—63792-1

GENERAL TECHNICAL DATA

1. **Materials Produced:**

(A) Uranium bearing material.
(B) No by-products to our knowledge.

2. **Name and Type of Mine:**

Glenny-Cutler Marysvale Operations, underground workings.

(A) 60 feet 80° shaft
(B) 115 feet
(C) None
(D) 170 feet 26° incline

This property under development. There are no water problems, all workings being dry. There has been no production yet.

3. (A) Three and one-half (3½) miles north of Marysvale, Utah
(B) Durkee Mining District
(C) Township 27 South, Section 4, Range 3 West.
(D) Piute County, State of Utah

4. (A) Mine is not being operated at this time.
(B) R. A. Glenny and Scott M. Cutler are the Lessees, holding a lease and option to purchase.

5. **Number of Years in Production:**

No production from this property as it is in the exploratory stage and being developed.

6. **Experience of Operators:**

(A) Applicant is a partnership.
(B) R. A. Glenny, who is the business manager of the partnership has had 26 years experience in mining; and Scott M. Cutler, the operating partner, has had 20 years mining experience.

7. **History:**

(A) Previous exploration done by the applicants consists of $3,000 bulldozing work in exposing structures- 170 foot 26° incline shaft and 115 feet of drifting at the bottom of this shaft on structure; also 60 foot 80° shaft from bottom of 50 feet of bulldozing work; also three diamond drill holes by the Atomic Energy Commission. No production to date and suspension of operation is due account of lack of capital.

(B) The Vanadium Corporation of America, who are the owners of the Prospector Claims adjoin the applicant's property to the west, which produces daily. Their production is unknown to applicants.

(C) The information requested in this item should be available from the Atomic Energy Commission Field Office at Marysvale, Utah.

GLENNY-CUTLER MARYSVALE OPERATIONS, 704 Newhouse Bldg., Salt Lake City, Utah

13. Access Roads:

Property is located approximately 3½ miles north east of Marysvale, Utah, on the Denver and Rio Grande Railroad, which is the shipping, supply and resident points, and is accessable by a good dirt and gravel road which is open the entire year.

14. Water Supply:

There is sufficient quanity of water available the entire year for mine operations, obtainable from Marysvale, Utah and hauled to the mine.

15. Power:

Gasoline and diesel power is used in all operations, purchased at Marysvale, Utah at the prevailing prices in the territory.

Labor:

16. Applicant's mine operations in the sinking of the 80° shaft has been working with three men until operations were suspended.

17. Equipment and Facilities:

Since suspension of operations, all equipment has been removed. However, applicants have all necessary mining equipment which is in operating condition to be placed back on the property upon the approval of their application for aid for an exploration project pursuant to Mineral Order 5, under Defense Production Act of 1950.

18. Yes. The applicants are making request for Government assistance to further develop their property, and have the necessary 10% funds as their assistance in the project, which will be in the form of equipment rentals for matching the 90% Government participation ratio of contributions up to $20,000.00, which is stipulated in their title 32-A, National Defense Appendix MO 5, Section 8 C, covering uranium ore of regulations governing Government aid in Defense Exploration Projects.

"EXHIBIT A"

EXHIBIT "A"

LEASE AND OPTION TO PURCHASE

THIS LEASE, AGREEMENT AND OPTION TO PURCHASE, made and entered into this 2nd day of August, 1949, by and between R. Dunsmore, H. S. Gibbs, W. Dana Gibbs, and Urban Johnson, all of Marysvale, Piute County, State of Utah, herein designated as lessors, and Claude M. Zabriskie of Salt Lake City, Utah, herein designated as lessee, WITNESSETH:

That the said lessors, for and in consideration of the sum of $10.00 and in consideration of the royalties herein agreed to be paid, and in consideration of the covenants and agreements hereinafter mentioned and set forth to be paid, kept and performed by the lessee, have this day leased and let, and by these presents do hereby remise, lease and let unto the lessee all of their right, title and interest in and to all of the following described mining claims and appurtenances situated in the Durkee Mining District, Piute County, State of Utah, to-wit:

That certain mining claim and notice of location, dated the 7th day of June, 1949, said location being described and marked on the ground as more specifically stated and set forth in the notice of location filed in the office of the county recorder of Piute County, State of Utah on June 8, 1949, and recorded in Book E of Location Notices, page 225, and given the name and designated in said mining location notice as J. D. G. - M. M. Lode Claim.

That certain mining claim and notice of location, dated the 8th day of June, 1949, said location being described and marked on the ground as more specifically stated and set forth in the notice of location filed in the office of the county recorder of Piute County, State of Utah on June 13, 1949, and recorded in Book E of Location Notices, page 228, and given the name and designated in said mining location notice as J. D. G. No. 1 Mining Claim.

That certain mining claim and notice of location, dated the 1st day of May, 1949, said location being described and marked on the ground as more specifically stated and set forth in the notice of location filed in the office of the county recorder of Piute County, State of Utah on May 4, 1949, and recorded in Book E of Location Notices, page 209, and given the name and designated in said mining location notice as Camel No. 1, and

That certain mining claim and notice of location dated the 15th day of May, 1949, said location being described and marked on the ground as more specifically stated and set forth in the notice of location filed in the office of the county recorder of Piute County, State of Utah on May 16, 1949, and recorded in Book E of Location Notices, page 211, and given the name and designated in said mining location notice as Luckey Strike No. 9,

Together with all of the improvements and appurtenances thereunto belonging or in any wise appertaining, and the right to the use of all such water and water rights for any and all culinary and mining purposes as may now be on said mining claims or as may be developed by the lessee thereon.

And the said lessors do hereby agree that they are the owners of said mining claims, and have good right and title thereto, and good right to sell, lease or otherwise dispose of the same.

TO HAVE AND TO HOLD the said leased premises, appurtenances and improvements from the date hereof for the full period of three years, unless sooner terminated by the violation of any of the covenants hereinafter mentioned and set forth by said lessee, and subject to the extension of this lease for the additional period of one year at the election of the lessee.

And in consideration of this lease and in consideration of the option to purchase hereinafter set forth, the said lessee does hereby covenant and agree with said lessors as follows:

1. The lessee agrees to enter upon said leased premises within a period of 30 days after the date hereof and to work upon said premises in a good miner-like and workman-like manner, and in a manner necessary and proper for good economic mining; and if underground work is done, to properly timber such underground workings when necessary for good mining and to so work and mine upon said premises so as to take out the greatest amount of ore possible with due regard to the safety, development and preservation of said premises as a workable mine, and to do and perform at least 60 shifts per month; and said lessee agrees that any failure to work said premises as above set forth for a period of 30 consecutive days shall be considered a violation of the terms of this lease.

2. The lessee agrees to pay to the lessors within 30 days from the date hereof the sum of $100.00 for each claim above listed, and said amount shall be treated and considered as an advance royalty upon the royalty payment hereinafter provided to be paid by the lessee to the lessors.

3. It is further agreed that in the event the lessee shall exercise his option to purchase said mining claims, improvements and appurtenances, as hereinafter provided, he shall be given credit against the purchase price for the payment of $400.00 and for all royalties paid at time said option to purchase is exercised.

4. It is agreed that the lessee shall pay to the lessors as rent a royalty of 25% of the net value of all ore mined and extracted from said mining claims.

It is agreed that the net value of ore which may hereafter be mined from said premises shall have the following meaning:

a. When crude ore shall be shipped, the amount received therefor after the cost of transportation, treating, assaying and sampling the ore shall have been deducted.

b. When the ore shall be treated at a mill which might be constructed on or near the leased premises, or milled at a custom milling plant, then the concentrate or bullion or product thereof shall be marketed, and the amount received therefor after paying the cost of transportation, assaying, sampling, and/or treatment of the ore and all milling charges shall be the net value.

In determining the net value of the ore mined, it is agreed that no deductions of any kind shall be made for the cost of mining the ore or for the transportation of the same to the surface of the mine.

5. The lessors shall at all times have the right personally, or by a properly designated agent or representative, to enter upon said mining claims for the purpose of inspection, but shall in no way obstruct or in any way interfere with the mining operations of the lessee.

6. The lessee agrees to keep the drifts, shafts, tunnels and other passages and workings at all times clear of loose rock and rubbish, and at the expiration of this lease or the extention thereof as herein provided, to deliver up to said lessors said premises with the appurtenances and improvements, except that the lessee shall have the right to remove all surface equipment.

7. The lessee shall have the right to construct a mill or mills upon said premises, buildings to house employees and any other buildings which said lessee may seem proper or necessary, and the right to remove all such buildings in the event of the termination of this lease for any cause, but it is agreed that all track laid on said mining claims and all timbering, including all frames, chutes, rails, pipes and timbering, shall in the event of termination of this lease remain upon said leased premises and become the property of the lessors.

8. If the lessee shall default in, or fail to comply with, any of the terms, conditions or covenants of this lease, the lessors shall, in writing, by registered mail, notify said lessee of such claimed default or violation, and the lessee shall after such notice comply with the terms of this lease and remedy any existing default thereto within a period of 30 days; but should said lessee after such notice fail or neglect to remedy such default, then the lessors may declare this lease forfeited and the same terminated, and said lessors, or their duly authorized agent or representative, may thereupon, after demand for possession in writing, enter upon said premises and dispossess all persons occupying the same, with or without process of law.

9. It is agreed that the lessee shall not be in any way responsible in the performance of the terms of this lease for any damage or failure to perform by reason of the occurrence of floods, strikes, acts of nature, damage by the elements or occurrences beyond the control of the lessee.

10. It is hereby further stipulated and agreed that the lessee at any time during the term of this lease, or any extention thereof, shall have the exclusive and sole right and privilege, to purchase all of the above described leased premises, appurtenances, improvements and water rights for the total and sole consideration of $20,000.00, and in the event the lessee, his successors or assigns shall exercise such right, he or they shall be given credit upon and against said total purchase price for all royalties thereto fore paid by the lessee or his successors or assigns to the lessors pursuant to the terms of this lease, including credit for the aforesaid sum of $400.00 to be paid as herein provided; and upon payment of such balance as may be due at the time said right of purchase is exercised, the lessors agree to give to the lessee an assignment of all of the aforesaid mining claims, together with a quit-claim deed covering all of their right, title and interest in and abstract of title, showing a clear and unencumbered title in said mining claim in said lessors.

11. If the lessee, his successors or assigns shall have performed on his or their part the terms and conditions of this lease, then at the expiration thereof, to-wit, 3 years from the date hereof, the lessee shall have the exclusive right and option to renew this lease for an additional period of one year upon the same terms and conditions hereinabove set forth, including during said

EXHIBIT "A"

renewal period the right of purchase as herein provided for.

IN WITNESS WHEREOF, the parties have hereunto set their hands the day and year first above written.

s/s Robert Dunsmore

s/s H. Spencer Gibbs

s/s W. Dana Gibbs

s/s Urban Johnson

LESSORS

s/s Claude M. Zabriskie

LESSEE

Signed in the presence of:

s/s Grant A. Nielsen

EXHIBIT "A"

ASSIGNMENT

KNOW ALL MEN BY THESE PRESENTS:

That I, Claude M. Zabriskie of Salt Lake City, Utah, the assignor herein, in consideration of the sum of $500.00 in hand paid to me, receipt whereof is hereby acknowledged, the love and affection I bear my daughter, and other good and valuable considerations, do hereby transfer, sell, and assign unto my daughter, Norma J. Zabriskie of Salt Lake City, Utah, all of my right, title and interest in and to that certain lease, agreement and option to purchase, made and entered into the 2nd day of August, 1949, by and between R. Dunsmore, H. S. Gibbs, W. Dand Gibbs, and Urban Johnson, all of Marysvale, Piute County, State of Utah, therein designated as lessors, and Claude M. Zabriskie of Salt Lake City, Utah, therein designated as lessee, which lease, agreement and option to purchase is hereunto annexed and marked "EXHIBIT A."

WITNESS MY HAND AT Salt Lake City, Utah, this 9th day of November, 1949.

s/s Claude M. Zabriskie

ASSIGNMENT

EXHIBIT "A"

KNOW ALL MEN BY THESE PRESENTS:

That I, Norma J. Zabriskie of Salt Lake City, Utah, in consideration of the shares of stock to be received by me in the Western Uranium Corporation, as now evidenced by the Articles of Incorporation of said company, have this day sold, assigned, transferred, set over and delivered and by these presents do hereby sell, assign, transfer, set over and deliver unto Western Uranium Corporation, organized under the laws of the State of Utah, all of my right, title, and interest in and to that certain lease and option to purchase dated the 2nd day of August, 1949, by and between R. Dunsmore, H. S. Gibbs, W. Dana Gibbs, and Urban Johnson, all of Marysvale Piute County, Utah, therein designated as lessors, and Claude M. Zabriskie of Salt Lake City, Utah, therein designated as lessee, and by the terms of which the said lessors lease and let to the said lessee for a term of three years and subject to an extension of said lease for a period of one year as provided therein, and giving and granting to the said Claude M. Zabriskie the right to purchase all of the mining claims referred to and described in said agreement for the total consideration of $20,000.00 and providing further that all payments in the nature of royalties from mining operations be credited against the aforesaid purchase price, and in which said lessors acknowledge receipt of the sum of $400.00 at the date of the execution of said lease and option to purchase, and which said lease and option to purchase was on the 9th day of November, 1949, sold, assigned and transferred by the said Claude M. Zabriskie to the undersigned, the original of which said lease and option herein referred to is hereunto attached and marked "Exhibit A" and made a part hereof, together with the assignment herein referred to; and I do hereby further sell, assign, transfer, set over and deliver unto said Western Uranium Corporation all of my right, title, and interest of every kind and nature in and to that certain operator's agreement dated the 3rd day of January, 1950, by and between the undersigned, Norma J. Zabriskie and Clarence J. Gillaspey of Grand Junction, Colorado, by the terms of which said Clarence J. Gillaspey agrees to immediately enter upon said mining claims and begin exploration and development work and mine for uranium and other valuable minerals, the original of which said agreement is hereunto attached and marked "Exhibit B" and made a part hereof.

IN WITNESS WHEREOF, I, Norma J. Zabriskie, have hereunto set my hand at Salt Lake City, Utah, this 4th day of February, 1950.

s/s Norma J. Zabriskie

Signed in the presence of:

s/s A. H. Hougaard

STATE OF UTAH)
COUNTY OF SALT LAKE) ss.

On this 4th day of February, 1950, personally appeared before me Norma J. Zabriskie, the signer of the foregoing instrument, who duly acknowledged to me that she signed the same.

s/s A. H. Hougaard
Notary Public

My Commission Expires:
July 6, 1953

GLENNY-CUTLER MARYSVALE OPERATIONS, 704 Newhouse Bldg., Salt Lake City, Utah.

AGREEMENT EXHIBIT "B"

This agreement made and entered into this 20th day of September, 1950, by and between the Western Uranium Corporation, a Utah corporation of Salt Lake City, Utah, hereinafter referred to as the first party, and R. A. Glenny of Salt Lake City, Utah, and Scott M. Cutler of Marysvale, Utah, hereinafter referred to as the second parties, WITNESSETH:

That whereas the party of the first part is the owner and holder of a certain lease and option to purchase certain mining claims believed to contain valuable ore, situated near Marysvale, Piute County, State of Utah, said lease and option having been granted to the said first party by R. Dunsmore, H. S. Gibbs, W. Dana Gibbs, and Urban Johnson, all of Marysvale, Piute County, Utah, said lease and option to purchase covering certain mining claims located by the above named persons between May 8, 1949, and June 1, 1949, and the same having been duly recorded in the office of the county recorder of Piute County, State of Utah, a more particular description of said mining claims being as follows:

That certain mining claim and notice of location, dated the 7th day of June, 1949, said location being described and marked on the ground as more specifically stated and set forth in the notice of location filed in the office of the county recorder of Piute County, State of Utah, on June 8, 1949, and recorded in Book E of Location Notices, page 225, and given the name and designated in said mining location notice as J.D.G. MM Lode Claim.

That certain mining claim and notice of location, dated the 8th day of June, 1949, said location being described and marked on the ground as more specifically stated and set forth in the notice of location filed in the office of the county recorder of Piute County, State of Utah, on June 13, 1949, and recorded in Book E. of Location Notices, page 228, and given the name and designated in said mining location notice as J.D.G. No. 1 Mining Claim.

That certain mining claim and notice of location, dated the 1st day of May, 1949, said location being described and marked on the ground as more specifically stated and set forth in the notice of location filed in the office of the county recorder of Piute County, State of Utah, on May 4, 1949, and recorded in Book E of Location Notices, page 209, and given the name and designated in said mining location notice as Camel No. 1, and

That certain mining claim and notice of location, dated the 15th day of May, 1949, said location being described and marked on the ground as more specifically stated and set forth in the notice of location filed in the office of the county recorder of Piute County, State of Utah, on May 15, 1949, and recorded in Book E of Location Notices, page 211, and given the name and designated in said mining location notice as Lucky Strike No. 9.

Together with all of the improvements and appurtenances thereunto belonging or in any wise appertaining, and the right to the use of all such water and water rights for any and all culinary and mining purposes as may now be on said mining claims or as may be developed by the lessee thereon.

EXHIBIT "B"

A full, true and correct photostatic copy of the first party's lease and option to purchase is hereto attached and made a part hereof and marked Exhibit "A".

AND, WHEREAS, the second parties to this agreement have examined the above mining claims and are familiar with their location and the nature and character of the ores thereon, so far as can be determined without further development and exploration work, and have such knowledge concerning the same that they are willing and desirous of entering into this contract for the future exploration and development of said mining claims and the extraction of the ores and minerals therefrom.

AND, WHEREAS, it has been agreed between the parties hereto that the second parties shall have the exclusive right and privilege, without limitation of time, for the purpose of exploring said mining claims and developing the same, and extracting the ores, uranium, and other valuable minerals therefrom, subject to the considerations, exceptions and limitations hereinafter specifically stated and set forth.

NOW, THEREFORE, it is hereby agreed between the first party and second parties to this agreement as follows:

1. It is agreed that the second parties shall have, and they are hereby given, the exclusive right, without limitation of time, to explore and develop the mining claims above described, and to extract therefrom the uranium minerals and other valuable deposits found, or that may hereafter be found upon said mining claims; that they will, within a period of ten days from date hereof, go upon said mining claims with equipment of such a nature and character as will enable the second parties to carry on said development and exploration work, and to extract the ores and mineral deposits from said mining claims, and agree to develop and explore said mining claims as will assure the removal therefrom within a period of 30 days from date hereof at least 30 tons of shipping ore per month.

2. It is stipulated and agreed that the sole and only consideration to be paid by the first party, or to be received by the second parties for the aforesaid exploration and development work, and the extraction of the ore and minerals from said mining claims shall be as follows:

The second parties shall deliver all marketable uranium and other ores to an established agency of the United States Government, and such agency, or other properly designated person, shall pay from the net proceeds of said ore the royalties payable to the locators of said claims on the basis of the attached agreement between the first party and said locators, until the full amount of $20,000.00 shall have been paid to said locators pursuant to the terms of the bond and lease hereto attached.

3. It is agreed that from said net proceeds there shall be paid to the second parties the cost of mining the said ore and other mineral deposits, not to exceed, however, the sum of $2.50 per ton, and any excess in mining costs over said sum per ton shall be borne entirely by the second parties. And after payment of said amount, the remaining net proceeds shall be divided in equal shares between the first party or its assignees and the second parties, and said amounts payable to either the locators, the first party or the second parties shall be paid directly to said persons or their respective assignees by such agency of the United States Government or other person

pursuant to the terms of this agreement. It is stipulated that the amount payable to the second parties as herein provided shall be paid to R. A. Glenny, Newhouse Building, Salt Lake City, Utah.

It is stipulated and agreed that the provisions of this contract provide for the allowance of $2.50 as mining costs and shall be subject to review in the event mining costs shall substantially exceed said sum, and that the parties in order to meet the equities of any question that may arise concerning mining costs and at the request of the second parties will reconsider said provision and attempt to agree upon any excess mining costs above said amount.

4. It is further stipulated and agreed that the second parties shall keep an accurate assay of the ores being removed from the above described claims, and if at any time the ores are of such high grade as to demand a premium price, that the same shall be marketed to such persons, firms, or corporations who are in a position to pay such premium prices, notwithstanding the fact that such purchasers may be located at a place other than said Marysvale, Utah.

5. It is agreed and understood that the second parties will move equipment for the aforesaid exploratory and development work, and for mining operations, on to the above-described mining claims, and shall be in substantial operation upon the same on or before the 25th day of September, 1950, and it is agreed that in respect to the provisions of this contract, that time is of the essence thereof, and the first party does hereby grant unto the second parties the exclusive right and privilege to immediately enter upon and to explore and develop said mining claims, and that such exclusive right shall continue in the second parties until all of the marketable ores upon said mining claims shall have been exhausted by the second parties, subject, however, to the parties of the second part complying with all of the provisions and requirements of this agreement. And in consideration of this right granted to the second parties by the first party, the second parties do hereby covenant and agree that they will enter upon said mining claims within the period aforesaid, and begin the exploration and development work contemplated by this agreement, and will, as soon as practicable, commence the movement of uranium ore and other valuable mineral deposits therefrom, and that they will continuously, each and every month, work 60 man shifts, as provided by the attached lease of first party, and will remove the greatest possible amount of uranium and other mineral deposits consistent with good and workmanlike mining, and it is agreed that if the second parties shall cease the work of exploration, development and mining of ore as herein provided, for the period of ten consecutive days, that then this lease and option shall at once become void and of no legal force or effect whatsoever, and without any act upon the party of the first part or his assignees, and the said second parties shall immediately forfeit all rights that they might otherwise have under the provisions of this agreement, and the first party or his duly designated agent or agents shall have the right to go upon said mining claims and assume the exclusive right, jurisdiction and control thereover.

6. It is agreed that so long as the second parties shall perform the terms of this agreement, that they shall have the exclusive right to determine the nature and character of the development and exploration work, and the method and manner of extracting ore therefrom.

7. The first party and such mining engineers or other agents as may be designated and appointed, shall have the right at all times to go upon said mining claims and inspect and examine the exploration and development work, and the manner of extracting ores from said mining claims, and shall have the right to take measurements for the purpose of determining the tonnage of ore extracted, and shall have access to all shipments and bills of lading showing the amount of ore shipped by the second party, but such examination or inspection shall be without unreasonable hindrance or delay to the work of the second parties on said mining claims.

8. It is agreed and understood that the second parties will do all work upon said mining claims in a good and miner-like fashion, and that wherever necessary the second parties will timber any and all tunnels or other underground workings, and will at all times conduct mining operations thereon to insure the safety and well-being of employees who may be employed by the second parties.

9. That the second parties will promptly and fully pay for all labor and materials that may be furnished and supplied by any person whomsoever in the conduct of said work upon said mining claims, and that they will keep said mining claims free and clear from all liens or liabilities of any kind by reason of material and labor furnished therefor.

10. It is understood and agreed that the second parties will comply with all federal and state laws with respect to the operation of said mining claims, and the removal of ore therefrom; that they will provide industrial compensation insurance for all employees which they may employ for the removal and extraction of ores as aforesaid, and in the exploration and development of said mining claims, and will conform in all respects in said mining operation to all rules and regulations of the Atomic Energy Commission or its duly authorized agents and representatives.

11. It is stipulated and agreed that the second parties, as soon as operations are commenced on the above described mining claims, shall post notices in at least 3 conspicuous places on said mining claims, which said notices shall set forth that the exploratory work, development work, and the extraction of ore from said mining claims is being done by the second parties, and that the second parties are thereunder responsible for all work and labor that may be performed on said mining claims, and for all material that may be purchased and used on said mining claims.

12. The second parties agree to comply in all respects with the provisions of the lease and option to purchase, Exhibit "A" attached hereto, and to comply with each and every provision of said contract, and the second parties hereby acknowledge that they have read said lease and option to purchase and are fully informed as to the contents and provisions thereof, and that they will in all respects perform all of the terms and provisions thereof.

13. It is agreed that the second parties shall not be responsible for the performance of the terms of this agreement or for the performance of the terms of the lease and option to purchase, Exhibit "A" attached hereto, which performance may be made impossible by reason of the occurrence of floods, strikes, acts of nature, damages by the elements, or occurrences beyond the control of the second parties.

14. It is agreed by each of the parties hereto that if an offer to purchase said mining claims shall be made either of the parties, that such party will

EXHIBIT "B"

immediately communicate such fact to the other party and that each of the parties will exercise good faith in a determination of whether an offer of purchase should be accepted, it being the purpose and intention to protect the financial interest of each party in respect to any offer of sale which may seem advantageous under circumstances as they may exist at the time of such offer. In the event of sale of said mining claims, the net proceeds of such sale shall be disbursed as follows: Any balance remaining due and owing to the locators of said mining claims shall first be paid in full and the balance divided, one-half thereof to the first party and one-half thereof paid to the second parties; and the second parties agree from the amount received by them to pay and discharge all existing claims and demands for work, labor, material, and any and all other obligations of the second parties arising out of their operation upon said mining claims.

IN WITNESS WHEREOF, the parties have hereunto set their hands the day and year first above written.

Attest:

s/s Norma J. Zabriskie
Secretary

WESTERN URANIUM CORPORATION

By s/s Claude M. Zabriskie
PRESIDENT

PARTY OF THE FIRST PART

s/s R. A. Glenny
R. A. GLENNY

s/s Scott M. Cutler
SCOTT M. CUTLER

PARTIES OF THE SECOND PART

SUBORDINATION AGREEMENT

Exhibit "C"

KNOW ALL MEN BY THESE PRESENTS:

WHEREAS, the undersigned, Robert Dunsmore, H. Spencer Gibbs, W. Dana Gibbs, and Urban Johnson, are owners and lessors of the following mining claims located in the Burkee Mining District, Piute County, State of Utah, to-wit:

CAMEL NO. 1 LODE CLAIM and J.D.G. MM LODE CLAIM

and

WHEREAS, said mining claims have been leased to the Western Uranium Corporation for the purpose of extracting uranium and other minerals; and

WHEREAS, the said Western Uranium Corporation has heretofore entered into an agreement with R. A. Glenny and Scott M. Cutler for the exploration of said mining claims and the development of uranium and other minerals thereon, and said R. A. Glenny and Scott M. Cutler have for a period of 19 months been engaged in the exploration of said mining claims and have expended substantial sums for said purpose. The said R. A. Glenny and Scott M. Cutler have filed an application for aid for an exploration project pursuant to Mineral Order 5, under Defense Production Act of 1950 in the sum of Twenty Thousand Dollars ($20,000.00) to further develop the above described claims;

NOW THEREFORE, in consideration of the premises, the undersigned hereby acquiesce and consent to said application and approval thereof in whole or in part, and do hereby subordinate to the United States of America all of their right, title and interest as owners and lessors of said property herein above described pursuant to the exploration project contract that may be entered into between R. A. Glenny and Scott M. Cutler and the United States of America.

Robert Dunsmore
Robert Dunsmore

H. Spencer Gibbs
H. Spencer Gibbs

W. Dana Gibbs
W. Dana Gibbs

Urban Johnson
Urban Johnson

WESTERN URANIUM CORPORATION - By Claude M. Zabriskie
President

STATE OF UTAH)
COUNTY OF HUTE) ss

On this 3rd day of November, 1951, personally appeared before me H. Spencer Gibbs, W. Dana Gibbs, and Urban Johnson, the signers of the foregoing instrument, who duly acknowledged to me that they executed same.

Violet Sargent
Notary Public
Residing at Marysvale, Utah

My Commission Expires:
Feb 2 1953

STATE OF UTAH)
COUNTY OF SALT LAKE) ss

On this 28th day of November, 1951, personally appeared before me Robert Dunsmore and Claude M. Zabriskie, President of the Western Uranium Corporation, the signers of the foregoing instrument, who duly acknowledged to me that they executed same.

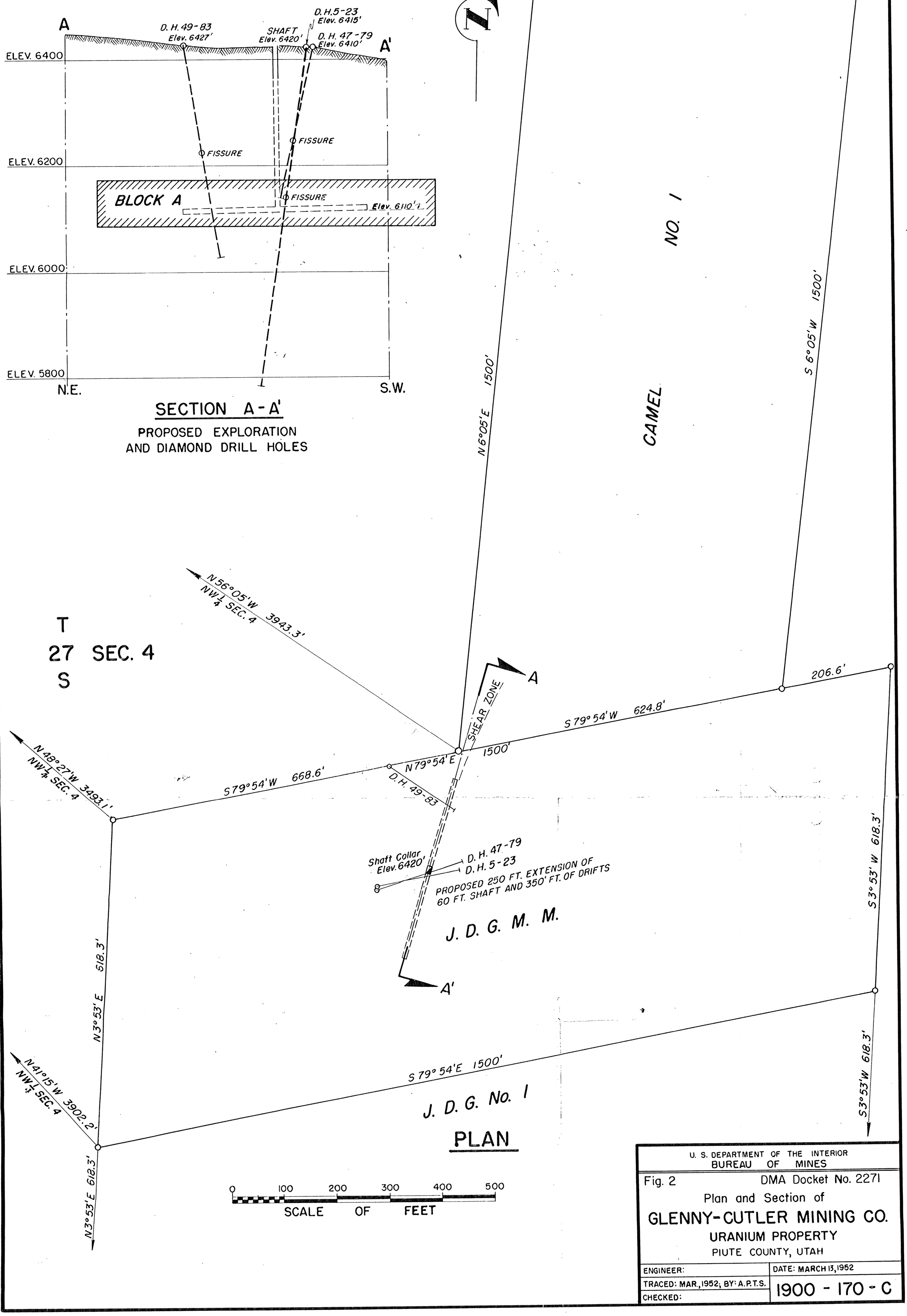
[illegible]
Notary Public
Residing at Salt Lake City

My Commission Expires:
July-6-1953

GLENNY-CUTLER MARYSVALE OPERATIONS, 704 Newhouse Bldg., Salt Lake City, Utah.

SECTION A-A'

PROPOSED EXPLORATION
AND DIAMOND DRILL HOLES



U. S. DEPARTMENT OF THE INTERIOR
BUREAU OF MINES

Fig. 2 DMA Docket No. 2271

Plan and Section of

GLENNY-CUTLER MINING CO.

URANIUM PROPERTY

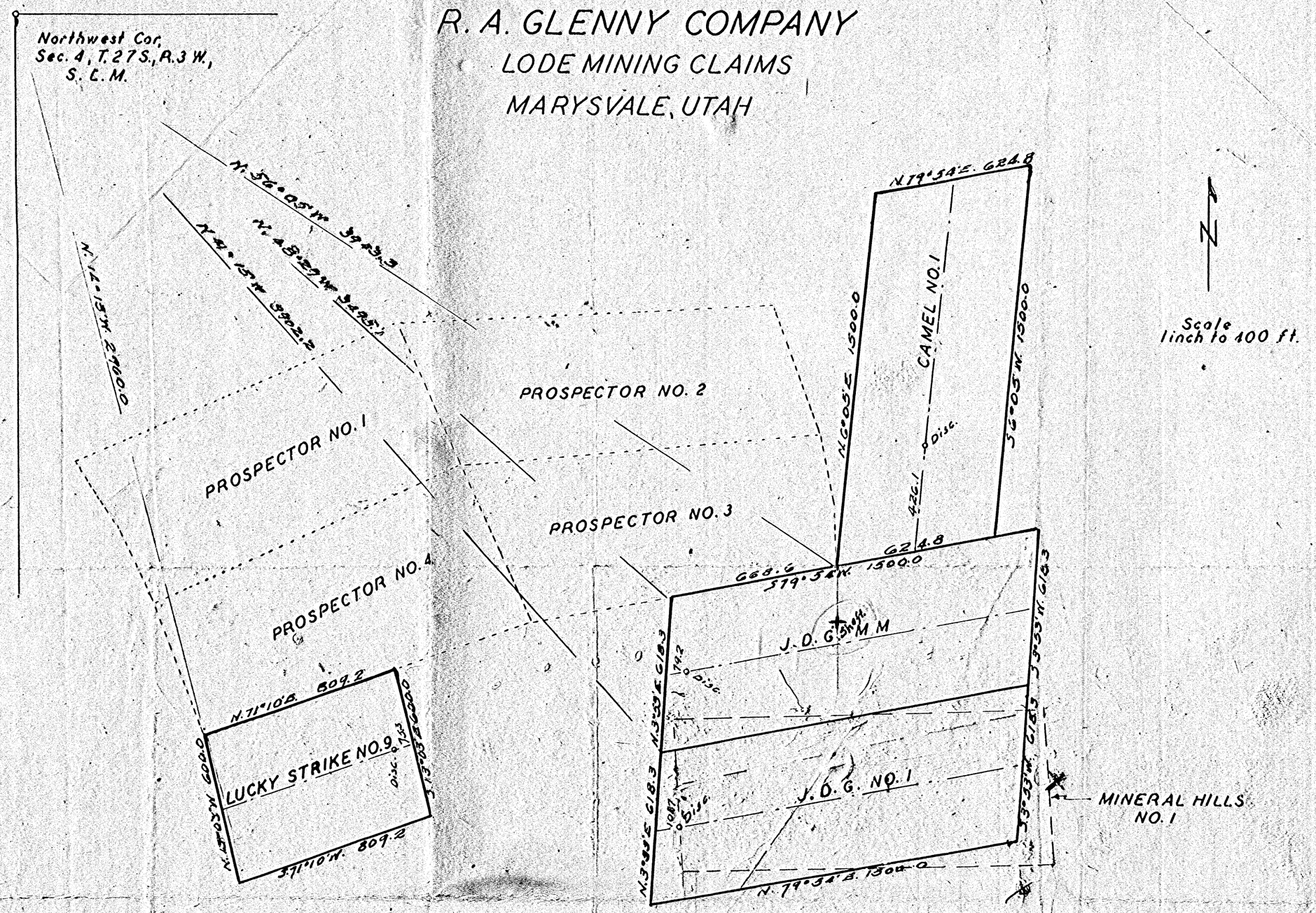
PIUTE COUNTY, UTAH

ENGINEER:	DATE: MARCH 13, 1952
TRACED: MAR., 1952; BY: A.P.T.S.	1900 - 170 - C
CHECKED:	

R. A. GLENNY COMPANY

LODE MINING CLAIMS

MARYSVALE, UTAH



A. R. Shelton
Mineral Surveyor

EXHIBIT "D"

MINERAL SURVEY MAP OF APPLICANTS SHOWING
J.D.G. MM and CAMEL NO. 1 LODE CLAIMS.

GLENNY-CUTLER MARYSVALE OPERATIONS, 704 Newhouse Bldg., Salt Lake City, Utah.

Camel Hill
S. W. Cor.
80° Sh
6+30
6+40
6+50
6+60
6+70
6+80
6+90
Alluvium

EXHIBIT "E"

GEOLOGICAL MAP OF APPLICANTS SHOWING PART OF J.D.G.-MM AND CAMEL NO.1 LODE CLAIMS.

GLENNY-SUTLER MARYSVALE OPERATIONS, 704 Newhouse Bldg., Salt Lake City, Utah