400

JUN - 1 1956

Nye Mining and Development Company
805 Mount Rose Street
Reno, Nevada

Re: Docket No. DMEA-4169, Tungsten
North half of New Moose and
Moose No. 1 claims
Nye County, Nevada

Gentlemen:

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

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

Careful study of our information, although noting tungsten mineralization in the north half of the New Moose and Moose No. 1 claims, indicates to us that the probability of disclosing significant tungsten ore reserves is not sufficiently promising to justify Government participation. Under these circumstances, we regret to advise you that your application is denied.

We wish to thank you for your interest in the Defense Minerals Exploration Administration program and for bringing this property to our attention.

Sincerely yours,

G. O. Mittendorf

Administrator

cc: Docket
Code 400
Oper. Comm.
Adm. Read. File
Thor Kiilsgaard, USGS
R. W. Holliday, USBM
Field Team, Region 2

SPHolt/ls
5/31/56

May 31, 1956

MEMORANDUM

To: Administrator, DMEA

From: Iron and Ferro-Alloys Division, DMEA

Subject: Denial of request for exploration assistance in the amount of $10,292.86
Docket No. DMEA-4169, Tungsten
Nye Mining and Development Company, Inc.
North half of New Moose and Moose No. 1 claims
Nye County, Nevada

Denial of the subject application is recommended by this Division based on the following information:

(1) The applicant, Nye Mining and Development Company, Inc., 805 Mount Rose Street, Reno, Nevada, requested exploration assistance in the amount of $10,292.86 for drifting in the north half of the New Moose and Moose No. 1 claims.

(2) The applicant controls by lease from the owner, Kenneth P. Rogers, the following unpatented lode mining claims, situated in the west-central part of unsurveyed Township 13 N., Range 42 E., M. D. B. & M., Nye County, Nevada, and recorded in the courthouse at Tonopah, Nye County, Nevada:

Claim Name	File No.	Book No.	Page No.
New Moose	6321	106	78
Moose No. 1	9619	107	518

The south half of each of the two claims is excluded from the application.

(3) The proposed program is to explore the north half of the New Moose claim, and of Moose No. 1, by drifting along a hornfels zone.

(4) In the area of the New Moose and Moose No. 1 claims tungsten in the form of scheelite occurs along a hornfels zone in limestone.

(5) The Field Team notes that in 1951 Mr. Kenneth Rogers, now vice president of the Nye Mining and Development Company, applied as an individual for Government assistance in a $6,250 exploration program at the same mine (Docket No. DMEA-2279). In June 1952, he changed his request to one for a production loan of $5,000. Denial of the production loan was recommended, but it was recommended that a small loan to explore the south half of the deposit be granted. After failure of the applicant to reply to a request for further information, the application was removed from DMEA active files.

After a second examination of the property, made as a result of this renewed application (Docket No. DMEA-4169), the Field Team concludes that the ore-bearing zone is quite persistent, but the occurrences of scheelite ore in the zone are too widely spaced and too low in grade to warrant Government exploration assistance, and therefore recommends that the application be denied. The Commodity Divisions of the Bureau of Mines and the Geological Survey concur in this recommendation.

W. S. Martin, Chief
Iron and Ferro-Alloys Division

cc: Docket
Code 400
Adm. Read. File
Oper. Committee

SPHolt/ls 5/31/56

400

May 22, 1956

Copy initialed 400

Memorandum

To: W. S. Martin, Chief, Iron and Ferroalloys Division-DMEA
Through: Chief, Branch of Ferrous Metals & Ferroalloys

From: R. W. Holliday, Commodity Specialist, Branch of Ferrous Metals & Ferroalloys

Subject: Review of Field Team Report (May 3, 1956)
Docket No. DMEA 4169
North half of New Moose and Moose No. 1 Claims
Nye County, Nevada
Nye Mining and Development Company

Subject report confirms a previous report of July 17, 1952 by W. P. Irwin and H. L. Sobel which recommends that a small exploration loan be granted "if it is to the Government's interest to prove a small reserve of tungsten ore that is of questionable economic grade under current demand, but which might constitute a small reserve in the event of future national emergency".

The later report (May 3, 1956) however while recognizing the presence of marginal or sub marginal occurences of scheelite recommends denial of the application.

The tungsten market outlook is less encouraging now than in 1952, and I concur in the field team recommendation that the application be denied.

R. W. Holliday

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MAY 24 1956

402

May 22, 1956

4169

Memorandum

To: W. S. Martin, Chief, Iron and Ferroalloys Division-DMEA
Through: Chief, Branch of Ferrous Metals & Ferroalloys

From: R. W. Holliday, Commodity Specialist, Branch of Ferrous Metals & Ferroalloys

Subject: Review of Field Team Report (May 3, 1956)
Docket No. DMEA 4169
North half of New Moose and Moose No. 1 Claims
Nye County, Nevada
Nye Mining and Development Company

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The later report (May 3, 1956) however while recognizing the presence of marginal or sub marginal occurrences of scheelite recommends denial of the application.

The tungsten market outlook is less encouraging now than in 1952, and I concur in the field team recommendation that the application be denied.

R. W. Holliday

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MAY 24 1956

IN REPLY REFER TO: 400

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

May 17, 1956

Re: DMEA 4169
Nye Mining & Devel. Co.
New Moose Lease
Nye County, Nevada
$10,292.86 - Tungsten

Memorandum

To: W. S. Martin, Defense Minerals Exploration Administration

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

RECEIVED
MAY 17 1956

Subject: Review of Field Team report.

The applicant requested assistance in driving a 450-foot drift on the footwall of a calc silicate hornfels zone in which scheelite sporadically occurs. The zone is from a few inches to 3 feet wide and is intermittently exposed on the surface north of Summit Creek for about 1000 feet.

The N-S 100-foot bed of crystallized limestone in which the hornfels zone occurs and the zone extend across the valley and are exposed in the slopes above Summit Creek. A small tonnage of 0.4% WO_3 material has been mined on the south slope and because the outcrops on the north slope are similar to those across the valley, the criteria afforded by the southerly exposures are used in judging the potential of the north slope deposit. Two samples were taken, one of which, No. 297, taken across 3 feet, assayed 0.40% WO_3. By lumping, the examiners were able to estimate the grade of other outcrops. They observe:-- "The ore-bearing zone is quite persistent, but the occurrences of scheelite ore are widely spaced and too low grade to warrant Governmental assistance. Sampling and previous reports would indicate that ore averaging more than 0.40% WO_3 could only be obtained in small quantities by selective mining and this operation could not possibly be economical."

The examiners and the Field Team recommend that the application be denied. I concur with that recommendation.

N. E. Nelson

N. E. Nelson

NENelson:iml
G-5/17/56

cc: Director's reading, 4212
Branch reading, 4212
DMEA (3)
Docket file
R. Holliday, 3617

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

RECEIVED
MAY 11 1956

1605 Evans Avenue
Reno, Nevada

May 3, 1956

Memorandum

To: Operating Committee, DMEA, Interior Building, Washington 25, D. C.

From: Executive Officer, DMEA Field Team, Region II

Subject: Docket No. DMEA-4169 - Tungsten
Nye Mining & Development Co.
North half of New Moose and
Moose No. 1 claims
Nye County, Nevada

Reference is made to your letter of February 27, 1956 transmitting subject docket.

Attached are four copies of a report by R. G. Reeves, Geological Survey and H. W. Jones, Bureau of Mines in which it is recommended that the application for a DMEA loan be denied.

Roscoe Smith and I concur in the recommendations.

S. Ricker

Attach.

SRicker:gh
cc: R. M. Smith
File

P.S. - Enclosed are four copies of an earlier application report (DMEA-2279) by Irwin and Sobel dated July 17, 1952 referred to in your letter of February 27, 1956.

Reviewed by
DMEA OPERATING COMMITTEE

(date)

RECEIVED
MAY 11 1956

UNITED STATES
DEPARTMENT OF THE INTERIOR

DEFENSE MINERALS EXPLORATION ADMINISTRATION

REPORT OF EXAMINATION BY FIELD TEAM
REGION II

APPLICATION REPORT

DMEA-4169, Nye Mining & Development Co.
New Moose Tungsten Mine
Nye County, Nevada

By

H. W. Jones
Mining Engineer
U.S. Bureau of Mines

R. G. Reeves
Geologist
U.S. Geological Survey

May 3, 1956

Reviewed by
DMEA OPERATING COMMITTEE

_____
(date)

CONTENTS

	Page
Introduction	1
Conclusions and Recommendations	1
Location, Accessibility, and Local Resources	2
Property and Ownership	3
History, Production, and Development	4
General Geology.	5
Ore Deposits	5
Sampling	6
Ore Reserves	7

INTRODUCTION

The Nye Mining and Development Company applied to the Defense Minerals Exploration Administration on February 3, 1956 for Government assistance in a $10,292.86 exploration program ~~at~~ of the north half of the New Moose tungsten mine, Nye County, Nevada. In December 1951 Mr. Kenneth Rogers, now vice president of the Nye Mining and Development Company, applied as an individual for Government assistance in a $6,250.00 exploration program at the same mine (DMEA-2279). In June 1952 he changed his request to a production loan of $5,000.00. The property was examined by W. P. Irwin and H. L. Sobel, geologists, U. S. Geological Survey, who recommended denial of the production loan, but recommended approval of a small loan to explore the south half of the deposit. A letter of July 24, 1952 from the Executive Officer, DMEA Field Team, Region III, to Mr. Rogers requesting further information was not answered, and on September 25, 1952 the application was removed from the DMEA active file.

An examination as a result of the renewed loan application was made on April 3, 1956 by H. W. Jones, U. S. Bureau of Mines, and R. G. Reeves, U. S. Geological Survey, accompanied by Mr. Rogers.

CONCLUSIONS AND RECOMMENDATIONS

The applicant wishes to explore the hornfels zone by drifting 450 feet from the face of a small adit above the mill building to a point

slightly beyond a shallow shaft. (Fig. 2)

The area subject to the loan request contains an intermittently exposed calc silicate hornfels zone within the limestone formation. Small quantities of scheelite ore occur sporadically in the hornfels.

The ore bearing zone is quite persistent, but the occurrences of scheelite ore are widely spaced and too low grade to warrant governmental assistance. Sampling and previous reports would indicate that ore averaging more than 0.40 percent WO_3 could only be obtained in small quantities by selective mining and this operation could not possibly be economical.

It is recommended that the application for DMEA exploration aid be denied.

LOCATION, ACCESSIBILITY, AND LOCAL RESOURCES

The prospect is in Summit Canyon on the east slope of the Toiyabe Range in northern Nye County, Nevada, about 38 airline miles south-southwest of Austin. It is in the west central part of T. 13 N., R. 42 E., projected, an unsurveyed township (fig. 1).

To reach the property from Austin, travel 11 miles easterly on Highway 50 to the junction of Highway 8-A; thence 33.8 miles southerly to the intersection of the Summit Canyon road; and thence 3.2 miles westerly on a dirt road to the mine.

Water is available from Summit Creek throughout the year for mine and domestic use. Juniper and pinon trees provide some mine timber, but sawed lumber must be obtained from Reno or other distant sources. Limited mining supplies are available in Austin or Tonopah, and major items of equipment can be obtained in Reno. Mine labor is readily available in Austin and Tonopah.

PROPERTY AND OWNERSHIP

The property consists of the New Moose and Moose No. 1 mining claims held by location by Kenneth J. Rogers, P. O. Box 34, Sparks, Nevada, and leased to the Nye Mining and Development Co.

The claims are recorded in the Nye County Court House, Tonopah, Nevada, as follows:

New Moose -- File No. 6321 -- Book No. 106, Page No. 78

Moose No. 1 - File No. 9619 -- Book No. 107, Page No. 518

The Nye Mining and Development Company is a Nevada corporation with company offices at 805 Mount Rose Street, Reno, Nevada. The officers are:

President:	Vice President:	Secretary-treasurer:
Harris E. Vaughn 805 Mount Rose Street Reno, Nevada	Kenneth J. Rogers P. O. Box 34 Sparks, Nevada	Joseph P. Haller 137 N. Virginia Street Reno, Nevada

The south half of the New Moose claim, from which small quantities of mill ore has been produced, is excluded from the property

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included in the application.

HISTORY, PRODUCTION, AND DEVELOPMENT

The property was first located in the early 1890's for silver and lead deposits that have since been mined intermittently. Tungsten ore was discovered by Rogers in 1950.

The lead-silver ore bodies were developed by several short adits on both walls of Summit Canyon and several inclined shafts on the north wall. The adits are caved, but from the size of the dumps they are less than 100 feet long and the shafts less than 50 feet deep.

The tungsten deposits on the south side of Summit Canyon are developed by two short adits, one above the other and connected by a raise, and a small stope above the lower adit. This work was done from 1952 to 1955 and about 60 units of WO_3 has been produced from 250 tons of ore.

Two cabins to provide accommodations for a maximum of six miners, a compressor house, and small shop were constructed by the Nye Mining and Development Company.

The company erected a gravity concentration mill consisting of a primary crusher, rolls, classifier, and tables, with a capacity of 20 tons per 8-hour shift. According to the applicant, recovery of scheelite from ore run has been about 75 percent. The mill and compressor are run by electricity generated by a gasoline-driven gener-

ator of 50 kva output. An aerial tram transports ore from the workings on the south side of the canyon to the ore bin at the mill.

GENERAL GEOLOGY

The area is underlain by interbedded quartzite, quartz-mica schist, phyllite, and crystalline limestone of the Palmetto formation of Ordovician age [1/]. The beds exposed along the wall of Summit Canyon strike north and dip generally 60° to 70° west. Locally the beds are contorted, and cut by faults that are mainly bedding plane faults. The meta-sedimentary rocks are intruded by lamprophyre dikes and sills, dioritic dikes, and massive quartz veins.

ORE DEPOSITS

Lead-silver and the tungsten deposits at the New Moose mine are in a 100-foot thick crystalline limestone underlain and overlain by phyllite and quartz-mica schist.

Scheelite is associated with diopside, wallastonite (?), epidote, and quartz in a calc silicate hornfels zone near the bottom of the crystalline limestone bed. The scheelite-bearing zone is from a few inches to an occasional three feet in width, and is intermittently exposed on the surface for about 1,000 feet along the strike.

1/ Ferguson, H. G., and Cathcart, S. H., 1954, Geology of the Round Mountain quadrangle, Nevada: U. S. Geol. Survey Geologic Quadrangle Map Series GQ 40.

The crystalline limestone bed is cut and offset by a northeast trending fault, which has an apparent right lateral movement of about 100 feet. The northeastern side of the fault has been downthrown with respect to the northwestern side. Scheelite and oxided lead-silver minerals occur along the fault.

The lead-silver deposits are along shear zones in the upper part of the crystalline limestone bed. Some scheelite is also associated with the lead-silver minerals, which are mainly argentiferous galena and oxidized lead minerals and accompanying malachite and azurite.

SAMPLING

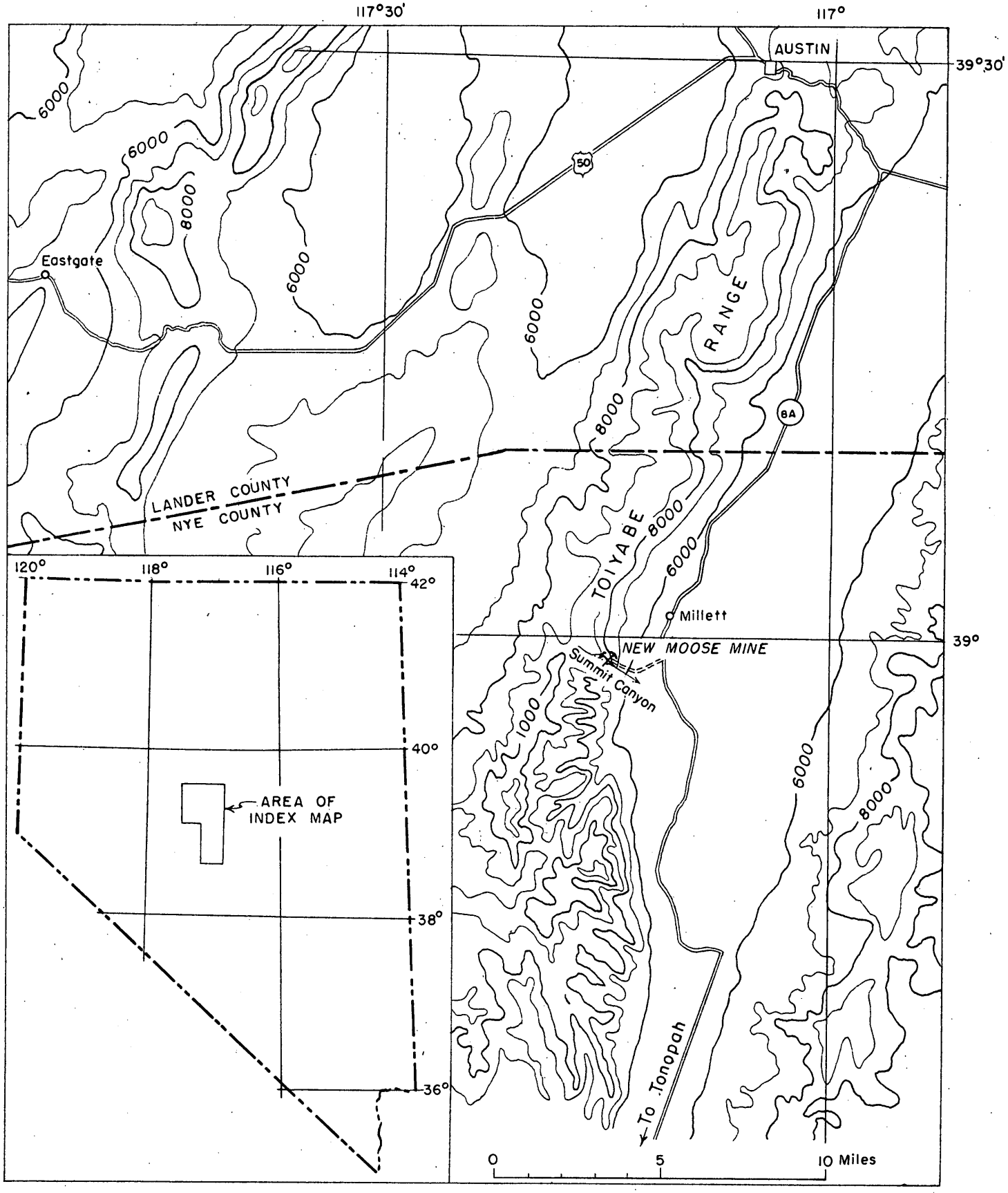
The mineralized area was thoroughly lamped and samples were taken of the better exposures. Other locations were not sampled because of the sparse mineralization and narrow width of the scheelite vein.

Sample No.	Width, feet	%, WO_3	Description
296	Grab	0.18	Muck pile sample of mill ore obtained from south half New Moose workings.
297	3.0	0.40	Outcrop about 80 feet north of New Moose endline, silicated lime on edges, soft lime in center of zone.
298	1.6	0.08	Scheelite in shallow shaft near end of proposed drift, associated with greenish silicated hornfels.

The face of the small adit contained a few scheelite crystals, but too sparsely disseminated to warrant sampling.

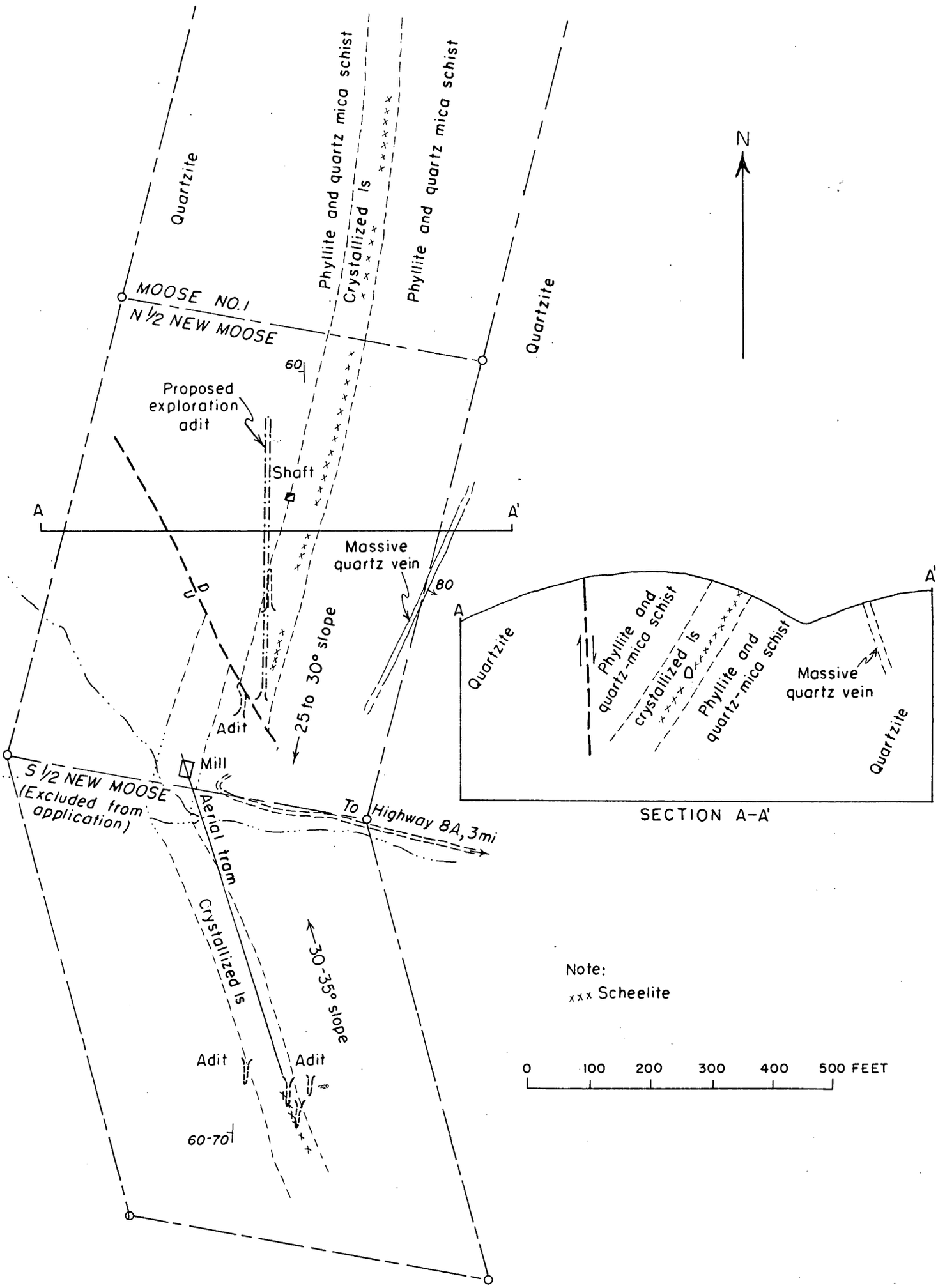
ORE RESERVES

No work other than a few shallow surface pits has been done on the tungsten deposits on the north side of Summit Canyon. The ore sheets of the geologically similar deposits on the south side of the canyon are 100 feet in vertical extent. Assuming inferred ore to extend 150 feet below the outcrop level and that the average thickness is 2 feet, and that 25 percent of the zone is ore, the 450 feet to be explored contains about 4,000 tons of uneconomical ore. The ore mined south of the canyon averaged about 0.4 percent WO_3 by selective mining. Sampling and lamping would indicate that a higher grade ore could not be expected in the area proposed for exploration.



INDEX MAP SHOWING LOCATION OF NEW MOOSE MINE
NYE COUNTY, NEVADA

Figure 1



GEOLOGIC SKETCH MAP AND SECTION
OF THE NEW MOOSE TUNGSTEN MINE, NYE COUNTY, NEVADA

Figure 2

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MAY 11 1956

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

DEFENSE MINERALS EXPLORATION ADMINISTRATION

REPORT OF EXAMINATION BY FIELD TEAM
REGION III

New Moose Tungsten Prospect
DMEA-2279
Nye County, Nevada

by

W. P. Irwin, geologist
H. L. Sobel, geologist
U. S. Geological Survey

July 17, 1952

Reviewed by
DMEA OPERATING COMMITTEE

(date)

Summary

The New Moose tungsten prospect in Nye County, Nevada, was examined in regard to a request for a DMPA production loan. The prospect opens a deposit in metamorphosed limestone which contains a reserve of 7,000 tons of indicated ore with an estimated grade of 0.4 percent WO_3. Owing to difficult accessibility, limited tonnage, and low tungsten content, the deposit is considered to be of marginal grade.

It is recommended that the applicant's request for a production loan be denied, but that he be granted a small loan to explore the deposit if it is to the Government's interest to prove a small reserve of tungsten ore that is of questionable economic grade under current demand, but which might constitute a small reserve in the event of future national emergency.

Exploration of the deposit should consist of about 180 feet of crosscutting and drifting at a total cost of approximately $3,600.00

Introduction

Mr. Kenneth Rogers of Sparks, Nevada, submitted an application in December 1951 for Government assistance in a $6,250.00 program to explore the New Moose tungsten prospect. In June 1952 he changed his request to a production loan for the amount of $5,000.00. At the request of DMEA, the deposit was examined on July 1, 1952 by W. P. Irwin and H. L. Sobel of the Geological Survey in the company of Mr. Rogers.

The prospect is in Summit Canyon on the east slope of the Toiyabe Range in northern Nye County, Nevada, about 38 airline miles south-southwest of Austin. It is in sec. 27 or 28, T. 13 N., R. 14 E., and, except for the two miles of road nearest to the mine, is readily accessible from Austin by standard passenger-type automobiles. From Austin travel 11 miles easterly on Highway 50 to the junction of Highway 8-A; thence 33.8 miles southerly to the intersection of the Summit Canyon road; and thence 3.2 miles westerly on a dirt road to the mine. The last two miles of dirt road can be traveled only by vehicles with an extra low gear or four-wheel drive.

Workings

The property is reported to have been located first in the early 1890's for its deposits of silver and lead which have been mined intermittently since that date. The tungsten deposits were discovered by Rogers about 1950.

The old workings for silver and lead are in both walls of easterly-draining Summit Canyon, and they penetrate thin steeply-dipping shear zones in crystalline limestone. The shear zones contain silver-, lead-, and zinc-bearing minerals. On the north side of the canyon (see plate 1) about 2000 feet of underground workings of three levels honeycomb the limestone and narrow stopes extend from the upper level to the surface.

Similarly, on the south side of the canyon (see plate 2) extensive workings open similar deposits in a continuation of the same body of limestone.

The tungsten working, which consists of a 20-foot adit that heads southwest, is east of the old workings on the south side of the canyon and about 250 feet higher than the bottom of the canyon. The slope of the south wall of the canyon is about 40 degrees. A make-shift aerial tramway extends 450 feet on a 28 degree slope from the portal of the adit to the north side of the canyon near the bottom.

Geology

The area is underlain by a thick section of interbedded crystalline limestone, calcareous mica schist, and quartzitic mica schist. Locally the limestone has been replaced by diopside (?) , mica, and pyrite. The replacement has been predominently along the walls of the main body of limestone. Although the rocks have been contorted and sheared in places, the major structures are broad open folds. In general, the foliation and bedding of the rocks strike north and dip steeply west. No igneous rocks were seen in the vicinity of the mine.

Both the silver-lead deposits and the tungsten deposits occur in a thick bed of limestone that crosses the canyon and appears to continue beyond the ridges to the north and south. The silver-lead deposits are in the western part of the limestone bed, along and

near the hanging wall of the bed. The tungsten deposits occur mainly in the eastern, or footwall, part of the limestone bed. Small deposits of tungsten also occur near the hanging wall, but none of these are sufficiently rich to be of economic interest.

Scheelite is the only tungsten-bearing mineral that was seen. The main exposure of scheelite-bearing limestone is along the crest of a northerly-trending spur about 50 feet southwest of the portal of the 20-foot adit. The scheelite forms an ore shoot in the limestone for a width of about 10 feet along the east wall of the limestone. The north end of the ore shoot at the surface is at a point about in the line of the adit, and about 50 feet higher than the portal. From that point the ore shoot extends 130 feet along a slope distance of 30 degrees up the crest of the spur. The scheelite ranges from fine grains to fairly coarse crystals that are distributed irregularly throughout the limestone. At several places a few crystals of scheelite were seen in and along quartz veinlets, but for the greater part, little relationship between the scheelite and quartz veinlets were seen. The veinlets are about 1/8 inch thick, and in places are closely spaced. They strike east and dip steeply south, crosscutting the ore shoot.

As the scheelite is distributed irregularly throughout the ore shoot, the possibility of obtaining an accurate measure of the grade of the ore shoot by cutting a reasonable number of samples seems small. A 200-pound sample was cut near the east wall in ore that appears to be fairly representative of the shoot.

The sample assayed 0.4 percent WO_3 and corresponds to the average grade estimated by lamping the ore shoot.

The 20-foot adit, from the portal inward, crosscuts 5 feet of schist, 13 feet of greenish silicated limestone, and 2 feet of light yellowish-brown limestone. The beds strike north and dip 50 degrees west. The limestone appears to be a smaller bed that parallels the main body to the west. It can be traced on the surface only a few feet along its strike. The yellowish-brown limestone at the face of the adit contains elongate honey-yellow crystals of scheelite, which average between 1/4 and 1/2 inch in diameter, aligned parallel to the bedding. It is estimated to contain 1.0 percent WO_3 over a width of 2 feet. A small amount of scheelite is in the greenish limestone, and, over a width of 5 feet, including the yellowish-brown limestone, the limestone is estimated to contain 0.5 percent WO_3.

Ore Reserves

The ore shoot exposed along the crest of the spur contains about 7,000 tons of indicated ore with an estimated grade of 0.4 percent WO_3. The tonnage is based on the assumption that the ore shoot is 130 feet long, 10 feet wide, and 65 feet deep, measured normal to the crest of the spur, and that 12 cubic feet of ore weighs 1 ton. The grade is based on the lamping estimated, and on the assay value of the 200-pound sample.

The ore opened by the adit constitutes only a few tons with a grade of 1 percent WO_3, as no work has been done to establish the continuity of the ore for more than a few feet along

the strike of the yellowish-brown limestone, either on the surface or underground. It is likely that this high grade shoot is small.

The ore could be hand-sorted readily judging from its appearance, as the scheelite is distributed irregularly throughout the ore shoot, and barren waste could be easily rejected. The run-of-mine ore with a grade of 0.4 percent WO_3 probably could be hand-sorted to increase the grade to between 0.5 and 0.7 percent WO_3 with little loss of scheelite. From the ore mined at the face of the adit, Robers hand-sorted about 1/2 ton that lauped 2 percent WO_3.

Exploration

The ore shoot exposed along the crest of the spur could be explored by extending the 20-foot adit to the southwest. The adit should intersect the ore shoot about 80 feet from the present face, assuming that the ore shoot dips 60 degrees west and extends to the level of the adit. A drift could then be driven south along the ore shoot. If drive for 100 feet in ore, the drift would prove about 7,000 tons of ore. The crosscutting and drifting can be done for $20.00 per foot with an average advance of two feet per day, according to Robers. The total cost of the 180 feet of workings would be $3,600.00.

Conclusions

The run-of-mine ore in the New Moose tungsten deposit is marginal considering the low grade and small indicated tonnage, but it may be possible that a small profit can be won by economical

mining and hand-sorting of the ore. Rogers is an enthusiastic operator and appears to be thoroughly competent to conduct a small mining operation.

It is recommended that the request for a production loan be denied, as there are no reserves of measured ore. The writers informed Rogers that, in their opinion, he has little chance of obtaining a production loan without a reserve of measured ore.

The possibility, however, of proving a small tonnage of ore by an exploration program is good. Therefore, it is recommended that Rogers be granted an exploration loan in order to perform the work outlined above. The proposed exploration plan was discussed during the examination, and met with Rogers' approval.

FEB 27 1956

Nye Mining and Development Company, Inc.
805 Mount Rose Street
Reno, Nevada

Re: Docket No. DMEA 4169 - Tungsten
North-half New Moose and Moose
No. 1 Claims
Nye County, Nevada

Gentlemen:

The above-docketed application for exploration assistance for tungsten ores has been reviewed by the Iron and Ferro-Alloys Division of the Defense Minerals Exploration Administration and is being referred to Mr. Spangler Ricker, Executive Officer, DMEA Field Team, Region II, 1605 Evans Avenue, Reno, Nevada, for review and a possible field examination of the property.

If a field examination is considered necessary, the Field Team will so advise you and any assistance that you may give them will be appreciated.

Sincerely yours,

C. O. Mittendorf

Administrator

TLChapman/foc
2-24-56
cc to: Docket
Code 400
Admr. Read. File
Operating Comm.
FT. REG. II
Messrs. Holliday, USBM
Kiilsgaard, USGS

FEB 27 1956

Mr. Spangler Ricker, Executive Officer
DMEA Field Team, Region II
1605 Evans Avenue
Reno, Nevada

Re: Docket No. DMEA 4169 - Tungsten
Nye Mining and Development Company, Inc.
North-half of New Moose and Moose
No. 1 Claims
Nye County, Nevada

Dear Mr. Ricker:

The above docketed application for exploration assistance is being referred to your office for review and a possible field examination of the property, which has been the subject of two prior applications as follows:

On February 8, 1951, Caffey, Goddard and Rogers (Docket No. DMA-626) applied for a loan to explore and develop the New Moose mine for zinc, gold and silver. The applicants were advised that the DMA could assist in exploration only, and when no reply was received the application was denied.

On December 5, 1951, Kenneth Rogers, (Docket No. DMEA-2279) applied for exploration assistance to explore the New Moose mine for tungsten. An examination of the property was requested on January 4, 1952, and on July 17, 1952, the Field Team advised us that an examination had been made by the Geological Survey and a report was being prepared. We do not appear to have received this report, but we note that on July 21, the Field Team informed the applicant that some exploration work on his property was recommended. The applicant was advised, by the same letter and also by letter of July 24, that we would need further information. No reply was received to this last letter and on September 25, 1952, we notified Mr. Rogers that his application was being removed from our active file.

From the maps available here it appears that Summit Canyon, the site mentioned in Docket 626, lies 2 or 3 miles north of Ophir Canyon, which is shown on Figure 1 of B. H. Sheahan's report of August 14, 1952, on "DMEA-2609, Warfield, Inc., Tungsten Properties".

That application, submitted first as DREA-2809, denied and then reactivated, was redenied after field examination by letter of September 15, 1952.

Copies of memoranda dated February 14 and 16, 1956, by N. E. Nelson, Geological Survey, and R. W. Holliday, Bureau of Mines, respectively, relating to the project are enclosed for your information.

Sincerely yours,

George C. Selfridge

Chairman, Operating Committee

Enclosure

APPROVED:

/s/ Robert W. Geehan

Member, Bureau of Mines

Thor H. Kiilsgaard

Member, Geological Survey

WSMARTIN/TLCHAPMAN/fcc
2-27-56
cc to: Docket
Code 400
Adm. Read. File
Operating Comm.
FT. REG. II
R. W. Holliday, USBM
T. H. Kiilsgaard, USGS

402

February 16, 1956

Copy [illegible] 450

Memorandum

To: Chief, Iron & Ferroalloys Division-DMEA
Through: Acting Chief, Branch of Ferrous Metals & Ferroalloys

From: Commodity Specialist-Tungsten

Subject: Application for assistance in Exploration
Docket No. DMEA-4169
New Moose and Moose No. 1 mines
Nye Mining and Development Co., Inc.
805 Mount Rose Street
Reno, Nevada
$10,292.86 - Tungsten

Subject application proposes 450 feet of 4 ½' x 7' drift on the foot wall of a 50 to 70 foot wide "vein of crystallized lime or marble."

The application is well prepared, there has been a small production and it is recommended that a field referral be made.

R. W. Holliday

RWHolliday/tra

Copy to: Ferrous Metals
DMEA-4169 File
Mr. Geehan
Files

400

IN REPLY REFER TO:

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

RECEIVED
FEB 15 1956

February 14, 1956

Re: DMEA 4169
Nye Mining & Develop. Co.
North half New Moose lease
Nye County, Nevada
$10,292.86 - Tungsten

Memorandum

To: W. S. Martin, Defense Minerals Exploration Administration

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

Subject: Review of application.

The applicant requests assistance in driving 450 feet of drift on the footwall of a tungsten-bearing zone from which 140 tons of low-grade material has been mined. The estimated cost of the proposed work is $10,292.86. Mining and milling will be in progress nearby; hence the low unit cost of the work.

The proposed work is on the north side of a creek on the northerly extension of a vein that is being worked on the south side of the creek on the south half of the New Moose claim. The south side part of the zone was the subject of an application by the same applicant (DMEA 2279), later withdrawn as no assistance was deemed necessary. The application (map) says a favorable Field Team report was made, but such is not available. However, the examination may have been made, in which case another may not be necessary.

Referral to the Field Team for appropriate action is recommended.

N. E. Nelson

N. E. Nelson

NENelson:iml
G-2/14/56

cc: Director's reading, 4212
Branch reading, 4212
DMEA (3)
Docket file
R. Holliday, 3513

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DOCKET
400 Surname:
Holt
Martin
Kiilsgaard
Shelton
Schuman

JUN - 1 1956

Nye Mining and Development Company
805 Mount Rose Street
Reno, Nevada

Re: Docket No. DMEA-4169, Tungsten
North half of New Moose and
Moose No. 1 claims
Nye County, Nevada

Gentlemen:

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

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

Careful study of our information, although noting tungsten mineralization in the north half of the New Moose and Moose No. 1 claims, indicates to us that the probability of disclosing significant tungsten ore reserves is not sufficiently promising to justify Government participation. Under these circumstances, we regret to advise you that your application is denied.

We wish to thank you for your interest in the Defense Minerals Exploration Administration program and for bringing this property to our attention.

Sincerely yours,

G. O. Mittendorf

Administrator

cc: Docket
Code 400
Oper. Comm.
Adm. Read. File
Thor Kiilsgaard, USGS
R. W. Holliday, USBM
Field Team, Region 2

SPHolt/ls
5/31/56

RCS

DOCKET
Surname: Holt
Martin

May 31, 1956

MEMORANDUM

To: Administrator, DMEA

From: Iron and Ferro-Alloys Division, DMEA

Subject: Denial of request for exploration assistance in the amount of $10,292.86
Docket No. DMEA-4169, Tungsten
Nye Mining and Development Company, Inc.
North half of New Moose and Moose No. 1 claims
Nye County, Nevada

Denial of the subject application is recommended by this Division based on the following information:

(1) The applicant, Nye Mining and Development Company, Inc., 805 Mount Rose Street, Reno, Nevada, requested exploration assistance in the amount of $10,292.86 for drifting in the north half of the New Moose and Moose No. 1 claims.

(2) The applicant controls by lease from the owner, Kenneth P. Rogers, the following unpatented lode mining claims, situated in the west-central part of unsurveyed Township 13 N., Range 42 E., M. D. B. & M., Nye County, Nevada, and recorded in the courthouse at Tonopah, Nye County, Nevada:

Claim Name	File No.	Book No.	Page No.
New Moose	6321	106	78
Moose No. 1	9619	107	518

The south half of each of the two claims is excluded from the application.

(3) The proposed program is to explore the north half of the New Moose claim, and of Moose No. 1, by drifting along a hornfels zone.

(4) In the area of the New Moose and Moose No. 1 claims tungsten in the form of scheelite occurs along a hornfels zone in limestone.

(5) The Field Team notes that in 1951 Mr. Kenneth Rogers, now vice president of the Nye Mining and Development Company, applied as an individual for Government assistance in a $6,250 exploration program at the same mine (Docket No. DMEA-2279). In June 1952, he changed his request to one for a production loan of $5,000. Denial of the production loan was recommended, but it was recommended that a small loan to explore the south half of the deposit be granted. After failure of the applicant to reply to a request for further information, the application was removed from DMEA active files.

After a second examination of the property, made as a result of this renewed application (Docket No. DMEA-4169), the Field Team concludes that the ore-bearing zone is quite persistent, but the occurrences of scheelite ore in the zone are too widely spaced and too low in grade to warrant Government exploration assistance, and therefore recommends that the application be denied. The Commodity Divisions of the Bureau of Mines and the Geological Survey concur in this recommendation.

W. S. Martin, Chief
Iron and Ferro-Alloys Division

cc: Docket
Code 400
Adm. Read. File
Oper. Committee

SPHolt/ls 5/31/56

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

May 31, 1956

MEMORANDUM

To: Administrator, DMEA

From: Iron and Ferro-Alloys Division, DMEA

Subject: Denial of request for exploration assistance in the amount of $10,292.86
Docket No. DMEA-4169, Tungsten
Nye Mining and Development Company, Inc.
North half of New Moose and Moose No. 1 claims
Nye County, Nevada

Denial of the subject application is recommended by this Division based on the following information:

(1) The applicant, Nye Mining and Development Company, Inc., 805 Mount Rose Street, Reno, Nevada, requested exploration assistance in the amount of $10,292.86 for drifting in the north half of the New Moose and Moose No. 1 claims.

(2) The applicant controls by lease from the owner, Kenneth P. Rogers, the following unpatented lode mining claims, situated in the west-central part of unsurveyed Township 13 N., Range 42 E., M. D. B. & M., Nye County, Nevada, and recorded in the courthouse at Tonopah, Nye County, Nevada:

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The south half of each of the two claims is excluded from the application.

(3) The proposed program is to explore the north half of the New Moose claim, and of Moose No. 1, by drifting along a hornfels zone.

(4) In the area of the New Moose and Moose No. 1 claims tungsten in the form of scheelite occurs along a hornfels zone in limestone.

(5) The Field Team notes that in 1951 Mr. Kenneth Rogers, now vice president of the Nye Mining and Development Company, applied as an individual for Government assistance in a $6,250 exploration program at the same mine (Docket No. DMEA-2279). In June 1952, he changed his request to one for a production loan of $5,000. Denial of the production loan was recommended, but it was recommended that a small loan to explore the south half of the deposit be granted. After failure of the applicant to reply to a request for further information, the application was removed from DMEA active files.

After a second examination of the property, made as a result of this renewed application (Docket No. DMEA-4169), the Field Team concludes that the ore-bearing zone is quite persistent, but the occurrences of scheelite ore in the zone are too widely spaced and too low in grade to warrant Government exploration assistance, and therefore recommends that the application be denied. The Commodity Divisions of the Bureau of Mines and the Geological Survey concur in this recommendation.

W S Martin

W. S. Martin, Chief
Iron and Ferro-Alloys Division

Docket

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

May 22, 1956

WSM

Memorandum

To: W. S. Martin, Chief, Iron and Ferroalloys Division-DMEA
Through: Chief, Branch of Ferrous Metals & Ferroalloys

From: R. W. Holliday, Commodity Specialist, Branch of Ferrous Metals & Ferroalloys

Subject: Review of Field Team Report (May 3, 1956)
Docket No. DMEA 4169
North half of New Moose and Moose No. 1 Claims
Nye County, Nevada
Nye Mining and Development Company

Subject report confirms a previous report of July 17, 1952 by W. P. Irwin and H. E. Sobel which recommends that a small exploration loan be granted "if it is to the Government's interest to prove a small reserve of tungsten ore that is of questionable economic grade under current demand, but which might constitute a small reserve in the event of future national emergency".

The later report (May 3, 1956) however while recognizing the presence of marginal or sub-marginal occurences of scheelite recommends denial of the application.

The tungsten market outlook is less encouraging now than in 1952, and I concur in the field team recommendation that the application be denied.

R W Holliday

R. W. Holliday

Copy initialed 400

RECEIVED
MAY 24 1956

Docket

IN REPLY REFER TO:

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

May 17, 1956

Re: DMEA 4169
Nye Mining & Devel. Co.
New Moose Lease
Nye County, Nevada
$10,292.86 - Tungsten

WGM

Memorandum

To: W. S. Martin, Defense Minerals Exploration Administration

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

Subject: Review of Field Team report.

RECEIVED
MAY 17 1956

The applicant requested assistance in driving a 450-foot drift on the footwall of a calc silicate hornfels zone in which scheelite sporadically occurs. The zone is from a few inches to 3 feet wide and is intermittently exposed on the surface north of Summit Creek for about 1000 feet.

The N-S 100-foot bed of crystallized limestone in which the hornfels zone occurs and the zone extend across the valley and are exposed in the slopes above Summit Creek. A small tonnage of 0.4% WO_3 material has been mined on the south slope and because the outcrops on the north slope are similar to those across the valley, the criteria afforded by the southerly exposures are used in judging the potential of the north slope deposit. Two samples were taken, one of which, No. 297, taken across 3 feet, assayed 0.40% WO_3. By lamping, the examiners were able to estimate the grade of other outcrops. They observe:-- "The ore-bearing zone is quite persistent, but the occurrences of scheelite ore are widely spaced and too low grade to warrant Governmental assistance. Sampling and previous reports would indicate that ore averaging more than 0.40% WO_3 could only be obtained in small quantities by selective mining and this operation could not possibly be economical."

The examiners and the Field Team recommend that the application be denied. I concur with that recommendation.

N. E. Nelson

N. E. Nelson

Copy retained 400

RMEA

Docket

RECEIVED
MAY 11 1956

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

1605 Evans Avenue
Reno, Nevada

May 3, 1956

Memorandum

To: Operating Committee, DMEA, Interior Building, Washington 25, D. C.

From: Executive Officer, DMEA Field Team, Region II

Subject: Docket No. DMEA-4169 - Tungsten
Nye Mining & Development Co.
North half of New Moose and
Moose No. 1 claims
Nye County, Nevada

Reference is made to your letter of February 27, 1956 transmitting subject docket.

Attached are four copies of a report by R. G. Reeves, Geological Survey and H. W. Jones, Bureau of Mines in which it is recommended that the application for a DMEA loan be denied.

Roscoe Smith and I concur in the recommendations.

S. Ricker

S. Ricker

Attach.

P. S. - Enclosed are four copies of an earlier application report (DMEA-2279) by Irwin and Sobel dated July 17, 1952 referred to in your letter of February 27, 1956.

Reviewed by
DMEA OPERATING COMMITTEE
5-16-56
(date)

BUREAU OF MINES
WASHINGTON, D. C.
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MAY 11 1956

UNITED STATES
DEPARTMENT OF THE INTERIOR

DEFENSE MINERALS EXPLORATION ADMINISTRATION

REPORT OF EXAMINATION BY FIELD TEAM
REGION II

APPLICATION REPORT

DMEA-4169, Nye Mining & Development Co.
New Moose Tungsten Mine
Nye County, Nevada

By

H. W. Jones
Mining Engineer
U.S. Bureau of Mines

R. G. Reeves
Geologist
U.S. Geological Survey

May 3, 1956

Reviewed by
DMEA OPERATING COMMITTEE
5-16-56
(date)

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MAY 11 1956

CONTENTS

	Page
Introduction	1
Conclusions and Recommendations	1
Location, Accessibility, and Local Resources	2
Property and Ownership	3
History, Production, and Development	4
General Geology.	5
Ore Deposits	5
Sampling	6
Ore Reserves	7

INTRODUCTION

The Nye Mining and Development Company applied to the Defense Minerals Exploration Administration on February 3, 1956 for Government assistance in a $10,292.86 exploration program/~~at~~ of the north half of the New Moose tungsten mine, Nye County, Nevada. In December 1951 Mr. Kenneth Rogers, now vice president of the Nye Mining and Development Company, applied as an individual for Government assistance in a $6,250.00 exploration program at the same mine./ (DMEA-2279). In June 1952 he changed his request to a production loan of $5,000.00. The property was examined by W. P. Irwin and H. L. Sobel, geologists, U. S. Geological Survey, who recommended denial of the production loan, but recommended approval of a small loan to explore the/south half of the deposit. A letter of July 24, 1952 from the Executive Officer, DMEA Field Team, Region III, to Mr. Rogers requesting further information was not answered, and on September 25, 1952 the application was removed from the DMEA active file.

An examination as a result of the renewed loan application was made on April 3, 1956 by H. W. Jones, U. S. Bureau of Mines, and R. G. Reeves, U. S. Geological Survey, accompanied by Mr. Rogers.

CONCLUSIONS AND RECOMMENDATIONS

The applicant wishes to explore the hornfels zone by drifting 450 feet from the face of a small adit above the mill building to a point

slightly beyond a shallow shaft. (Fig. 2)

The area subject to the loan request contains an intermittently exposed calc silicate hornfels zone within the limestone formation. Small quantities of scheelite ore occur sporadically in the hornfels.

The ore bearing zone is quite persistent, but the occurrences of scheelite ore are widely spaced and too low grade to warrant governmental assistance. Sampling and previous reports would indicate that ore averaging more than 0.40 percent WO_3 could only be obtained in small quantities by selective mining and this operation could not possibly be economical.

It is recommended that the application for DMEA exploration aid be denied.

LOCATION, ACCESSIBILITY, AND LOCAL RESOURCES

The prospect is in Summit Canyon on the east slope of the Toiyabe Range in northern Nye County, Nevada, about 38 airline miles south-southwest of Austin. It is in the west central part of T. 13 N., R. 42 E., projected, an unsurveyed township (fig. 1).

To reach the property from Austin, travel 11 miles easterly on Highway 50 to the junction of Highway 8-A; thence 33.8 miles southerly to the intersection of the Summit Canyon road; and thence 3.2 miles westerly on a dirt road to the mine.

Water is available from Summit Creek throughout the year for mine and domestic use. Juniper and pinon trees provide some mine timber, but sawed lumber must be obtained from Reno or other distant sources. Limited mining supplies are available in Austin or Tonopah, and major items of equipment can be obtained in Reno. Mine labor is readily available in Austin and Tonopah.

PROPERTY AND OWNERSHIP

The property consists of the New Moose and Moose No. 1 mining claims held by location by Kenneth J. Rogers, P. O. Box 34, Sparks, Nevada, and leased to the Nye Mining and Development Co.

The claims are recorded in the Nye County Court House, Tonopah, Nevada, as follows:

New Moose -- File No. 6321 -- Book No. 106, Page No. 78

Moose No. 1 - File No. 9619 -- Book No. 107, Page No. 518

The Nye Mining and Development Company is a Nevada corporation with company offices at 805 Mount Rose Street, Reno, Nevada. The officers are:

President:	Vice President:	Secretary-treasurer:
Harris E. Vaughn 805 Mount Rose Street Reno, Nevada	Kenneth J. Rogers P. O. Box 34 Sparks, Nevada	Joseph P. Haller 137 N. Virginia Street Reno, Nevada

The south half of the New Moose claim, from which small quantities of mill ore has been produced, is excluded from the property

included in the application.

HISTORY, PRODUCTION, AND DEVELOPMENT

The property was first located in the early 1890's for silver and lead deposits that have since been mined intermittently. Tungsten ore was discovered by Rogers in 1950.

The lead-silver ore bodies were developed by several short adits on both wallsof Summit Canyon and several inclined shafts on the north wall. The adits are caved, but from the size of the dumps they are less than 100 feet long and the shafts less than 50 feet deep.

The tungsten deposits on the south side of Summit Canyon are developed by two short adits, one above the other and connected by a raise, and a small stope above the lower adit. This work was done from 1952 to 1955 and about 60 units of WO_3 has been produced from 250 tons of ore.

Two cabins to provide accommodations for a maximum of six miners, a compressor house, and small shop were constructed by the Nye Mining and Development Company.

The company erected a gravity concentration mill consisting of a primary crusher, rolls, classifier, and tables, with a capacity of 20 tons per 8-hour shift. According to the applicant, recovery of scheelite from ore run has been about 75 percent. The mill and compressor are run by electricity generated by a gasoline-driven gener-

ator of 50 kva output. An aerial tram transports ore from the workings on the south side of the canyon to the ore bin at the mill.

GENERAL GEOLOGY

The area is underlain by interbedded quartzite, quartz-mica schist, phyllite, and crystalline limestone of the Palmetto formation of Ordovician age [1/]. The beds exposed along the wall of Summit Canyon strike north and dip generally 60° to 70° west. Locally the beds are contorted, and cut by faults that are mainly bedding plane faults. The meta-sedimentary rocks are intruded by lamprophyre dikes and sills, dioritic dikes, and massive quartz veins.

ORE DEPOSITS

Lead-silver and the tungsten deposits at the New Moose mine are in a 100-foot thick crystalline limestone underlain and overlain by phyllite and quartz-mica schist.

Scheelite is associated with diopside, wallastonite (?), epidote, and quartz in a calc silicate hornfels zone near the bottom of the crystalline limestone bed. The scheelite-bearing zone is from a few inches to an occasional three feet in width, and is intermittently exposed on the surface for about 1,000 feet along the strike.

1/ Ferguson, H. G., and Cathcart, S. H., 1954, Geology of the Round Mountain quadrangle, Nevada: U. S. Geol. Survey Geologic Quadrangle Map Series GQ 40.

The crystalline limestone bed is cut and offset by a northeast trending fault, which has an apparent right lateral movement of about 100 feet. The northeastern side of the fault has been downthrown with respect to the northwestern side. Scheelite and oxided lead-silver minerals occur along the fault.

The lead-silver deposits are along shear zones in the upper part of the crystalline limestone bed. Some scheelite is also associated with the lead-silver minerals, which are mainly argentiferous galena and oxidized lead minerals and accompanying malachite and azurite.

SAMPLING

The mineralized area was thoroughly lamped and samples were taken of the better exposures. Other locations were not sampled because of the sparse mineralization and narrow width of the scheelite vein.

Sample No.	Width, feet	%, WO_3	Description
296	Grab	0.18	Muck pile sample of mill ore obtained from south half New Moose workings.
297	3.0	0.40	Outcrop about 80 feet north of New Moose endline, silicated lime on edges, soft lime in center of zone.
298	1.6	0.08	Scheelite in shallow shaft near end of proposed drift, associated with greenish silicated hornfels.

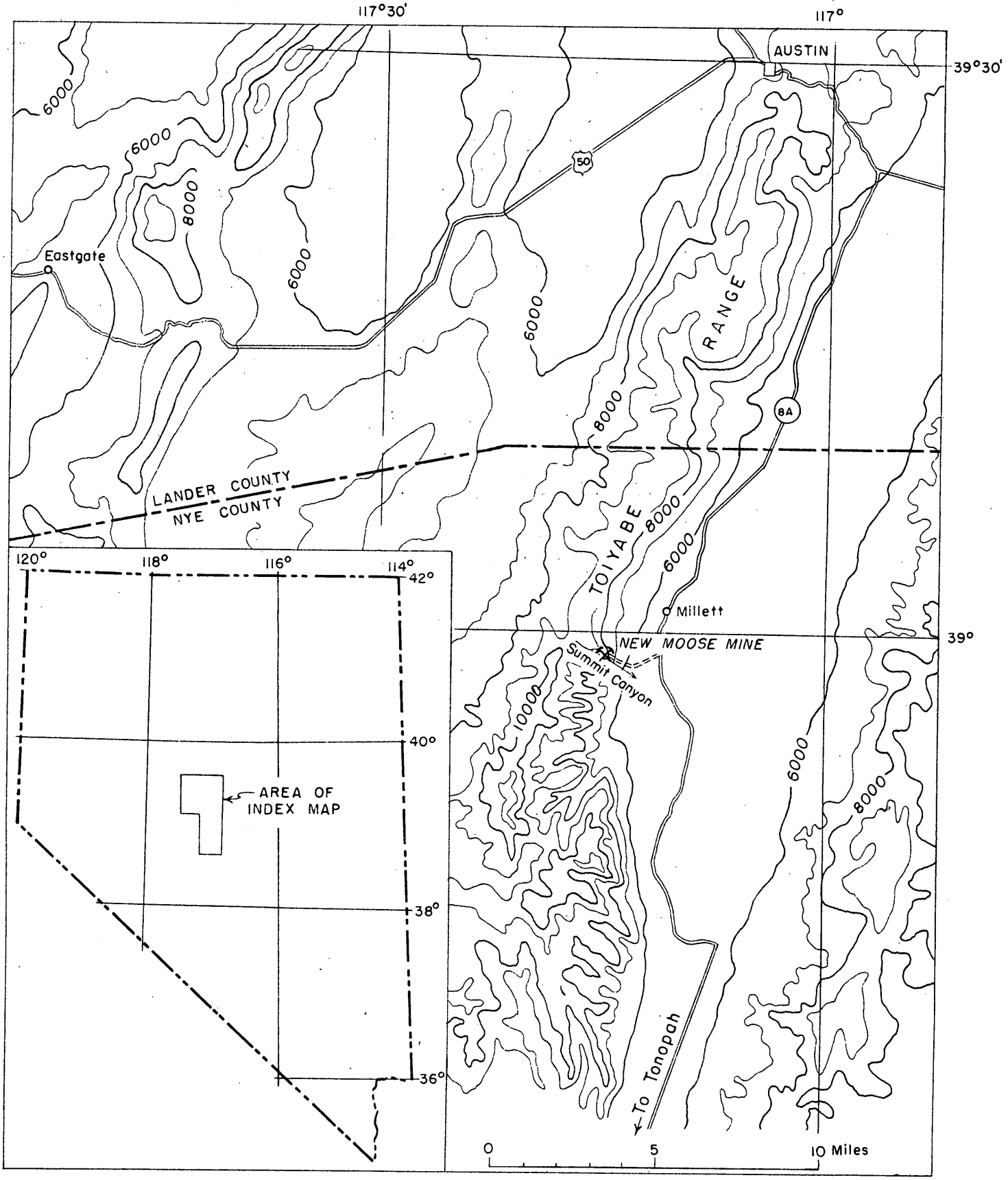
The face of the small adit contained a few scheelite crystals, but too sparsely disseminated to warrant sampling.

ORE RESERVES

No work other than a few shallow surface pits has been done on the tungsten deposits on the north side of Summit Canyon. The ore shoots of the geologically similar deposits on the south side of the canyon are 100 feet in vertical extent. Assuming inferred ore to extend 150 feet below the outcrop level and that the average thickness is 2 feet, and that 25 percent of the zone is ore, the 450 feet to be explored contains about 4,000 tons of uneconomical ore. The ore mined south of the canyon averaged about 0.4 percent WO_3 by selective mining. Sampling and lamping would indicate that a higher grade ore could not be expected in the area proposed for exploration.

UNITED STATES DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY

DMEA 4169
(TUNGSTEN)



INDEX MAP SHOWING LOCATION OF NEW MOOSE MINE
NYE COUNTY, NEVADA

Figure 1

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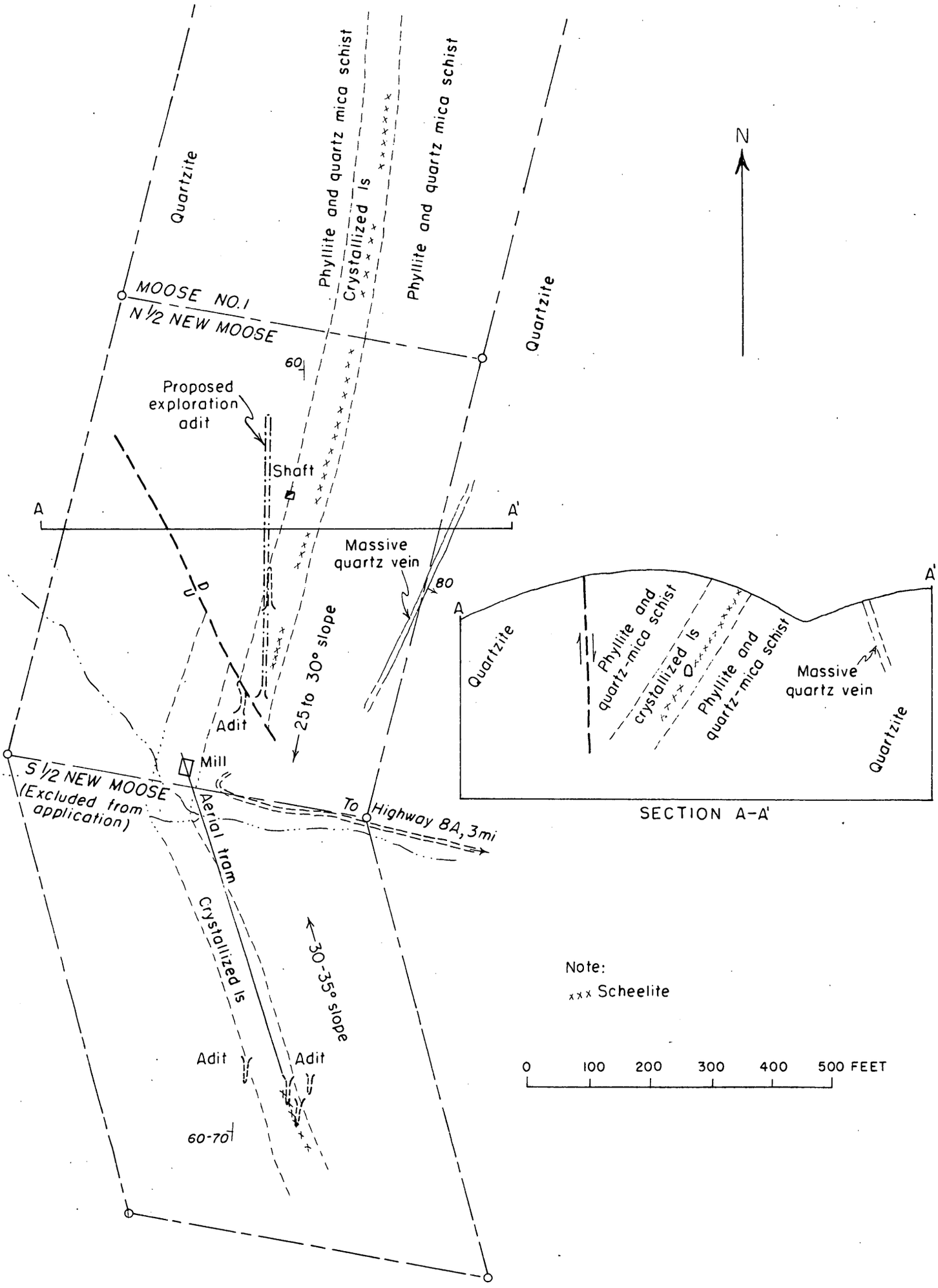

GEOLOGIC SKETCH MAP AND SECTION
OF THE NEW MOOSE TUNGSTEN MINE, NYE COUNTY, NEVADA

Figure 2

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MAY 11 1956

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MAY 11 1956

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

DEFENSE MINERALS EXPLORATION ADMINISTRATION

REPORT OF EXAMINATION BY FIELD TEAM
REGION III

New Moose Tungsten Prospect
DMEA-2279
Nye County, Nevada

by

W. P. Irwin, geologist
H. L. Sobel, geologist
U. S. Geological Survey

July 17, 1952

Reviewed by
DMEA OPERATING COMMITTEE
5-16-56
(date)

Summary

The New Moose tungsten prospect in Nye County, Nevada, was examined in regard to a request for a DMPA production loan. The prospect opens a deposit in metamorphosed limestone which contains a reserve of 7,000 tons of indicated ore with an estimated grade of 0.4 percent WO_3. Owing to difficult accessibility, limited tonnage, and low tungsten content, the deposit is considered to be of marginal grade.

It is recommended that the applicant's request for a production loan be denied, but that he be granted a small loan to explore the deposit if it is to the Government's interest to prove a small reserve of tungsten ore that is of questionable economic grade under current demand, but which might constitute a small reserve in the event of future national emergency.

Exploration of the deposit should consist of about 180 feet of crosscutting and drifting at a total cost of approximately $3,600.00

Introduction

Mr. Kenneth Rogers of Sparks, Nevada, submitted an application in December 1951 for Government assistance in a $6,250.00 program to explore the New Moose tungsten prospect. In June 1952 he changed his request to a production loan for the amount of $5,000.00. At the request of DMEA, the deposit was examined on July 1, 1952 by W. P. Irwin and H. L. Sobel of the Geological Survey in the company of Mr. Rogers.

The prospect is in Summit Canyon on the east slope of the Toiyabe Range in northern Nye County, Nevada, about 38 airline miles south-southwest of Austin. It is in sec. 27 or 28, T. 13 N., R. 14 E., and, except for the two miles of road nearest to the mine, is readily accessible from Austin by standard passenger-type automobiles. From Austin travel 11 miles easterly on Highway 50 to the junction of Highway 8-A; thence 33.8 miles southerly to the intersection of the Summit Canyon road; and thence 3.2 miles westerly on a dirt road to the mine. The last two miles of dirt road can be traveled only by vehicles with an extra low gear or four-wheel drive.

Workings

The property is reported to have been located first in the early 1890's for its deposits of silver and lead which have been mined intermittently since that date. The tungsten deposits were discovered by Rogers about 1950.

The old workings for silver and lead are in both walls of easterly-draining Summit Canyon, and they penetrate thin steeply-dipping shear zones in crystalline limestone. The shear zones contain silver-, lead-, and zinc-bearing minerals. On the north side of the canyon (see plate 1) about 2000 feet of underground workings of three levels honeycomb the limestone and narrow stopes extend from the upper level to the surface.

Similarly, on the south side of the canyon (see plate 2) extensive workings open similar deposits in a continuation of the same body of limestone.

The tungsten working, which consists of a 20-foot adit that heads southwest, is east of the old workings on the south side of the canyon and about 250 feet higher than the bottom of the canyon. The slope of the south wall of the canyon is about 40 degrees. A make-shift aerial tramway extends 450 feet on a 28 degree slope from the portal of the adit to the north side of the canyon near the bottom.

Geology

The area is underlain by a thick section of interbedded crystalline limestone, calcareous mica schist, and quartzitic mica schist. Locally the limestone has been replaced by diopside (?) , mica, and pyrite. The replacement has been predominently along the walls of the main body of limestone. Although the rocks have been contorted and sheared in places, the major structures are broad open folds. In general, the foliation and bedding of the rocks strike north and dip steeply west. No igneous rocks were seen in the vicinity of the mine.

Both the silver-lead deposits and the tungsten deposits occur in a thick bed of limestone that crosses the canyon and appears to continue beyond the ridges to the north and south. The silver-lead deposits are in the western part of the limestone bed, along and

near the hanging wall of the bed. The tungsten deposits occur mainly in the eastern, or footwall, part of the limestone bed. Small deposits of tungsten also occur near the hanging wall, but none of these are sufficiently rich to be of economic interest.

Scheelite is the only tungsten-bearing mineral that was seen. The main exposure of scheelite-bearing limestone is along the crest of a northerly-trending spur about 50 feet southwest of the portal of the 20-foot adit. The scheelite forms an ore shoot in the limestone for a width of about 10 feet along the east wall of the limestone. The north end of the ore shoot at the surface is at a point about in the line of the adit, and about 50 feet higher than the portal. From that point the ore shoot extends 130 feet along a slope distance of 30 degrees up the crest of the spur. The scheelite ranges from fine grains to fairly coarse crystals that are distributed irregularly throughout the limestone. At several places a few crystals of scheelite were seen in and along quartz veinlets, but for the greater part, little relationship between the scheelite and quartz veinlets were seen. The veinlets are about 1/8 inch thick, and in places are closely spaced. They strike east and dip steeply south, crosscutting the ore shoot.

As the scheelite is distributed irregularly throughout the ore shoot, the possibility of obtaining an accurate measure of the grade of the ore shoot by cutting a reasonable number of samples seems small. A 200-pound sample was cut near the east wall in ore that appears to be fairly representative of the shoot.

The sample assayed 0.4 percent WO_3 and corresponds to the average grade estimated by lamping the ore shoot.

The 20-foot adit, from the portal inward, crosscuts 5 feet of schist, 13 feet of greenish silicated limestone, and 2 feet of light yellowish-brown limestone. The beds strike north and dip 50 degrees west. The limestone appears to be a smaller bed that parallels the main body to the west. It can be traced on the surface only a few feet along its strike. The yellowish-brown limestone at the face of the adit contains elongate honey-yellow crystals of scheelite, which average between 1/4 and 1/2 inch in diameter, aligned parallel to the bedding. It is estimated to contain 1.0 percent WO_3 over a width of 2 feet. A small amount of scheelite is in the greenish limestone, and, over a width of 5 feet, including the yellowish-brown limestone, the limestone is estimated to contain 0.5 percent WO_3.

Ore Reserves

The ore shoot exposed along the crest of the spur contains about 7,000 tons of indicated ore with an estimated grade of 0.4 percent WO_3. The tonnage is based on the assumption that the ore shoot is 130 feet long, 10 feet wide, and 65 feet deep, measured normal to the crest of the spur, and that 12 cubic feet of ore weighs 1 ton. The grade is based on the lamping estimated, and on the assay value of the 200-pound sample.

The ore opened by the adit constitutes only a few tons with a grade of 1 percent WO_3, as no work has been done to establish the continuity of the ore for more than a few feet along

the strike of the yellowish-brown limestone, either on the surface or underground. It is likely that this high grade shoot is small.

The ore could be hand-sorted readily judging from its appearance, as the scheelite is distributed irregularly throughout the ore shoot, and barren waste could be easily rejected. The run-of-mine ore with a grade of 0.4 percent WO_3 probably could be hand-sorted to increase the grade to between 0.5 and 0.7 percent WO_3 with little loss of scheelite. From the ore mined at the face of the adit, Robers hand-sorted about 1/2 ton that lamped 2 percent WO_3.

Exploration

The ore shoot exposed along the crest of the spur could be explored by extending the 20-foot adit to the southwest. The adit should intersect the ore shoot about 80 feet from the present face, assuming that the ore shoot dips 60 degrees west and extends to the level of the adit. A drift could then be driven south along the ore shoot. If drive for 100 feet in ore, the drift would prove about 7,000 tons of ore. The crosscutting and drifting can be done for $20.00 per foot with an average advance of two feet per day, according to Robers. The total cost of the 180 feet of workings would be $3,600.00.

Conclusions

The run-of-mine ore in the New Moose tungsten deposit is marginal considering the low grade and small indicated tonnage, but it may be possible that a small profit can be won by economical

mining and hand-sorting of the ore. Rogers is an enthusiastic operator and appears to be thoroughly competent to conduct a small mining operation.

It is recommended that the request for a production loan be denied, as there are no reserves of measured ore. The writers informed Rogers that, in their opinion, he has little chance of obtaining a production loan without a reserve of measured ore.

The possibility, however, of proving a small tonnage of ore by an exploration program is good. Therefore, it is recommended that Rogers be granted an exploration loan in order to perform the work outlined above. The proposed exploration plan was discussed during the examination, and met with Rogers' approval.

DOCKET
SURNAME
Chapman
Martin
Kiilsgaard
Gehan
Selfridge
Johnson

400

FEB 27 1956

Nye Mining and Development Company, Inc.
805 Mount Rose Street
Reno, Nevada

Re: Docket No. DMEA 4169 - Tungsten
North-half New Moose and Moose
No. 1 Claims
Nye County, Nevada

Gentlemen:

The above-docketed application for exploration assistance for tungsten ores has been reviewed by the Iron and Ferro-Alloys Division of the Defense Minerals Exploration Administration and is being referred to Mr. Spangler Ricker, Executive Officer, DMEA Field Team, Region II, 1605 Evans Avenue, Reno, Nevada, for review and a possible field examination of the property.

If a field examination is considered necessary, the Field Team will so advise you and any assistance that you may give them will be appreciated.

Sincerely yours,

C. O. Mittendorf

Administrator

TLChapman/foc
2-24-56
cc to: Docket
Code 400
Admr. Read. File
Operating Comm.
FT. REG. II
Messrs. Holliday, USBM
Kiilsgaard, USGS

R.G.K.

DOCKET
SURNAME
Chapman
Martin
Selfridge
Johnson
Mattendorf

400

FEB 27 1956

Mr. Spangler Ricker, Executive Officer
DMEA Field Team, Region II
1605 Evans Avenue
Reno, Nevada

Re: Docket No. DMEA 4169 - Tungsten
Nye Mining and Development Company, Inc.
North-half of New Moose and Moose
No. 1 Claims
Nye County, Nevada

Dear Mr. Ricker:

The above docketed application for exploration assistance is being referred to your office for review and a possible field examination of the property, which has been the subject of two prior applications as follows:

On February 8, 1951, Coffey, Goddard and Rogers (Docket No. DMA-626) applied for a loan to explore and develop the New Moose mine for zinc, gold and silver. The applicants were advised that the DMA could assist in exploration only, and when no reply was received the application was denied.

On December 5, 1951, Kenneth Rogers, (Docket No. DMEA-2279) applied for exploration assistance to explore the New Moose mine for tungsten. An examination of the property was requested on January 4, 1952, and on July 17, 1952, the Field Team advised us that an examination had been made by the Geological Survey and a report was being prepared. We do not appear to have received this report, but we note that on July 21, the Field Team informed the applicant that some exploration work on his property was recommended. The applicant was advised, by the same letter and also by letter of July 24, that we would need further information. No reply was received to this last letter and on September 25, 1952, we notified Mr. Rogers that his application was being removed from our active file.

From the maps available here it appears that Summit Canyon, the site mentioned in Docket 626, lies 2 or 3 miles north of Ophir Canyon, which is shown on Figure 1 of B. H. Sheahan's report of August 14, 1952, on "DMEA-2609, Warfield, Inc., Tungsten Properties".

R.C.L.

That application, submitted first as IMEA-2209, denied and then reactivated, was redenied after field examination by letter of September 15, 1952.

Copies of memoranda dated February 14 and 16, 1956, by N. E. Nelson, Geological Survey, and R. W. Holliday, Bureau of Mines, respectively, relating to the project are enclosed for your information.

Sincerely yours,

George C. Selfridge

Chairman, Operating Committee (JHB)

Enclosure

APPROVED:

Thor H. Kiilsgaard (JHB)
Member, Bureau of Mines

/s/ Robert W. Geehan (JHB)
Member, Geological Survey

WSMARTIN/TLCHAPMAN/foc
2-27-56
cc to: Docket
Code 400
Adm. Read. File
Operating Comm.
FT. REG. II
R. W. Holliday, USBM
T. H. Kiilsgaard, USGS

Docket

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

February 16, 1956

Memorandum

To: Chief, Iron & Ferroalloys Division-DMEA
Through: Acting Chief, Branch of Ferrous Metals & Ferroalloys

From: Commodity Specialist-Tungsten

Subject: Application for assistance in Exploration
Docket No. DMEA-4169
New Moose and Moose No. 1 mines
Nye Mining and Development Co., Inc.
805 Mount Rose Street
Reno, Nevada
$10,292.86 - Tungsten

Subject application proposes 450 feet of 4 ½' x 7' drift on the foot wall of a 50 to 70 foot wide "vein of crystallized lime or marble."

The application is well prepared, there has been a small production and it is recommended that a field referral be made.

R. W. Holliday

R. W. Holliday

Copy to: Ferrous Metals
DMEA-4169 File
Mr. Geehan
Files

Docket

IN REPLY REFER TO:

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

RECEIVED
FEB 1 5 1956

February 14, 1956

Re: DMEA 4169
Nye Mining & Develop. Co.
North half New Moose lease
Nye County, Nevada
$10,292.86 - Tungsten

Copy retained 400

Memorandum

WSM

To: W. S. Martin, Defense Minerals Exploration Administration

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

Subject: Review of application.

The applicant requests assistance in driving 450 feet of drift on the footwall of a tungsten-bearing zone from which 140 tons of low-grade material has been mined. The estimated cost of the proposed work is $10,292.86. Mining and milling will be in progress nearby; hence the low unit cost of the work.

The proposed work is on the north side of a creek on the northerly extension of a vein that is being worked on the south side of the creek on the south half of the New Moose claim. The south side part of the zone was the subject of an application by the same applicant (DMEA 2279), later withdrawn as no assistance was deemed necessary. The application (map) says a favorable Field Team report was made, but such is not available. However, the examination may have been made, in which case another may not be necessary.

See also:-
DMA 2609
" 2209
" 626

Referral to the Field Team for appropriate action is recommended.

N. E. Nelson

N. E. Nelson

February 10, 1956
Subject: DMEA-4169
Re: Exploration Assistance
North Half New Moose &
Moose No. 1

Nye Mining & Development Company
Inc. Nevada
805 Mount Rose Street
Reno, Nevada

Gentlemen:

The receipt of your application dated February 3, 1956, for exploration assistance under the Defense Production Act of 1950, as amended, is hereby acknowledged.

Your application has been assigned Docket Number DMEA-4169 and referred to the Iron & Ferro-Alloys Division.

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

Sincerely yours,

Robert E. Adams, Chief
Operations Control and
Statistics Division

February 10, 1956

Memorandum

To: Executive Officer, DMEA Field Team, Region II

From: Chief, Operation's Control and Statistics Division

Subject: Assignment of Docket Number

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

DMEA - 4169 Nye Mining & Development Co., Inc. Nevada

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

R m Ea

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

RECEIVED
FEB - 9 1956

1605 Evans Avenue
Reno, Nevada

February 7, 1956

Memorandum

To: Operating Committee, DMEA, Interior Building, Washington 25, D. C.

From: Executive Officer, DMEA Field Team, Region II

Subject: Loan Application - Tungsten
Nye Mining & Development Co., Inc. Nevada
North Half of New Moose and Moose No. 1 Mines
Nye County, Nevada

Attached are three sets of MF-103, Application for Aid forms relative to above subject. The fourth set has been retained in our files.

S. Ricker

Attach.

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

RECEIVED
FEB 10 1956

1605 Evans Avenue
Reno, Nevada

February 7, 1956

Memorandum

To: Operating Committee, DMEA, Interior Building, Washington 25, D. C.

From: Executive Officer, DMEA Field Team, Region II

Subject: Loan Application - Tungsten
Nye Mining & Development Co., Inc. Nevada
North Half of New Moose and Mosse No. 1 Mines
Nye County, Nevada

Attached are three sets of MF-103, Application for Aid forms relative to above subject. The fourth set has been retained in our files.

S. Ricker

Attach.

SRicker:gh
cc: R. M. Smith
File

MF-103
(Revised April 1952)

UNITED STATES DEPARTMENT OF THE INTERIOR
DEFENSE MINERALS EXPLORATION ADMINISTRATION

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

RECEIVED
FEB - 9 1956

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

Not to be filled in by applicant

Docket No. DMEA-4169
Metal or Mineral Tungsten
Date Received 2-9-56
Estimated Cost $10,292.86
Participation (Government %)

INSTRUCTIONS

1. *Name of applicant.*—(*a*) State here your full legal name, in the form in which you will wish to contract, and your mailing address: Nye Mining & Development Co. Inc. Nevada
805 Mount Rose Street
Reno, Nevada

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

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

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

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

3. *Applicant's property rights.*—(*a*) State the legal description of the land upon which you wish to explore, including all land which you possess or control that may be benefited by the exploration, and excluding any land or interest in land which is not to be included in the exploration project contract North Half New Moose and Moose No. 1 Mines, South Half of New New Moose that is now producing to be excluded.

(*b*) State any mine name by which the property is known. North half New Moose and Moose No. 1

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

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

(*e*) If you own the land, describe any liens or encumbrances on it No encumbrances

(*f*) If the land consists of unpatented claims, add to the description above, the book and page numbers for each recorded location notice.

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

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

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

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

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

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

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

(*c*) The work will start within 10 days and be completed within 6 months from the date of an exploration project contract.

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

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

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

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

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

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

(*e*) *Rehabilitation and repairs.*—Furnish a detailed list showing the cost of any necessary initial rehabilitation or repairs of existing buildings, installations, fixtures, and movable operating equipment, now owned by the Operator and which will be devoted to the exploration project.

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

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

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

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

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

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

[X] Money [X] Use of equipment owned by you [ ] Other

Explain in detail on acompanying paper.

CERTIFICATION

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

Dated Feb. 3, 1956

NYE MINING & DEVELOPMENT CO.
(Applicant)

By H. E. Vaughn Pres.
Kenneth J. Rogers V. P.

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

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

Nye Mining & Development Co.
805 Mount Rose Street
Reno, Nevada

1-A. On FM 103

B. A corporation, incorporated in Nevada.

C. President: Harris E. Vaughn
805 Mount Rose Street
Reno, Nevada

Secretary-Treas. Joseph P. Haller
132 North Virginia Street
Reno, Nevada

Vice President: Kenneth J. Rogers
P. O. Box 34
Sparks, Nevada

D. Does Not Apply.

3-A. On FM 103
B. On FM 103
C. On FM 103
D. Lease attached.
E. On FM 103
F. New Moose location notice file No. 6321, Book 106, Page 78.

Moose No. 1 location notice file No. 9619, Book 107, Page 518.

4-A. This property was worked extensively for gold and silver in the 1880's. Most of the old workings are still open and sound. All of this work was done on the hanging wall where not too much scheelite was encountered, as the scheelite seems to favor the foot wall. Two small shipments of scheelite ore have been made from the South half of the New Moose, running about 2 and 1.20% W.O.3.

In 1955 this property was leased by the Nye Mining & Development Co. A mill was built and about 130 tons of ore was mined on the South half of the New Moose and milled with a gross value of $2444.04. Most of this ore was of a very low grade, which had to be removed to get at the better ore, which gives a mill recovery of about 0.75 W.O.3. per ton.

The mine and mill were closed for the winter in December. At that time we were ready to start stoping a block of ore that should yield about 500 tons of 0.75% and better ore.

Nye Mining & Development Co.
805 Mount Rose Street
Reno, Nevada

4-B The past production was about 140 tons which produced about 58 units, all from the South half of the New Moose. Ore reserves on the South half of New Moose are about 500 tons of 0.75% W.O.3. ore, and probably 2000 tons of 0.30% W.O.3. ore.

4-C. The country rock is lime shale with a vein of crystalized lime or marble, about fifty to seventy feet wide, the full length of the mine. The ore shoots are either on or near the hanging and foot wall of this vein, with gold, silver, lead, zinc, and bismuth on the hanging, and scheelite on the foot wall. The whole mine is highly mineralized with iron. The ore we are now mining has a marble gang, while the gang of the exploration drift we propose to run is perhaps a zeolite and iron; at least in the cropping. One mill sample of this ore (500 lbs.) produced 7-1/4 pounds of concentrates, about half iron and half scheelite.

4-D This mine is about three miles off paved highway number 8-A on a rather steep dirt canyon road. The nearest town, Austin, Nevada, is about fifty-five miles from the mine.

4-E All labor, materials, equipment, power, and water are readily available.

5-A On M.F. 103

5-B The proposed exploration operation consists of running a 4' 6" x 7' drift, 450 feet long on the foot wall of the North half of the New Moose so as to cut several shoots of scheelite-bearing material that crops on the surface, starting in a short drift on the footwall that shows about two feet of scheelite-bearing material in the face. The exact location is shown on accompanying maps.

5-C On M.F. 103

5-D The pricipals of the Nye Mining & Development Co. all have at least ten years milling or general contracting experience in a supervisory capacity. The person who will supervise the operation will have at least five years mining experience, and only experienced capable miners will be employed.

Nye Mining & Development Co.
805 Mount Rose Street
Reno, Nevada

6-A None

B Labor @$2.25 per hour	Total man hours 1800	$4,050.00
	Supervision - 10%	405.00
		$4,455.00
C. Gasoline		432.00
Oil		42.00
Caps		14.00
Fuse		56.00
Powder		480.00
Pipe		155.00
Hose		68.00
Rails		500.00
Spikes, Bolts, Nails		66.00
Ties		180.00
Timber & Lagging		600.00
Bits		75.00
Small hand tools		100.00
		$2,768.00
	Tax 2%	55.36
		$2,823.36
D D Air compressor @$150.00 per month		600.00
Hammers, steel, etc. @$50.00 month		200.00
Mucking machine @$300.00 per month		1,200.00
		$2,000.00

E None

F None

G Workmen's compensation, social security, tax, etc. 10% of payroll	445.50
H Moving material and equipment that are not now at mine onto property	400.00
Bulldozing - 6 hours @$14.00	84.00
Mvoing dozer onto property	85.00
	$ 569.00
Total	$10,292.86
Unit cost per ft. of drift	22.87

Nye Mining & Development Co.
805 Mount Rose Street
Reno, Nevada

7-A Yes.

B. In so far as we are now operating on this property, both mining and milling the ore, and as all the material, labor, and equipment necessary to perform the exploration operation are either now owned by us or readily available to us, we propose to do this work on a fixed unit cost of $22.87 per foot of 4' 6" x 7' 0" drift.

LEASE

RECEIVED
FEB - 9 1956

Kenneth J. Rogers and Harris E. Vaughn, owners of the New Moose and the Moose no. 1 mining claimes, hereafter known as the lessors, does by these presents lease to the Nye Mining and Development Co. Inc. here after known as the lessee, the following property.

The north half of the New Moose mine and all of the Moose No. 1 mine, under the following provisions.

1- The lessee agrees to preform at least two hundred fourty or equivalent shifts per year upon said property.

2- The lessee agrees to pay lessors 10% of all ore or concentrates sold within 30 days of said sale, all payements shall be based on mill settlements.

3- The lessee agrees to keep all tunnels, drifts, crescuts, shafts, stopes and raises, thatare now on the property, or that the lessee may run on the property, open and in a safe condition. Further said property shall be kept open at all reasonable times for inspection by lessors or their authorized agents.

4- Term of lease, one year renuable upon request of lessee,,providing that all the above stipulations have been complyed with.

5- Be it further agreed lessee may apply for and enter into a contract with the Defense Minerals Exploration Administration for aid in an exploration project. And be it further agreed that nothing in this lease shall encumber lessee in procureing aid.

Witness the hand of said lessors this 2 day of 3 1956

Copy

Kenneth J. Rogers
Kenneth J. Rogers

Harris E. Vaughn
Harris E. VAUGHN

Witness the hand of said lessee Harris E. Vaughn Pres.
Harris E. VAUghn Pres;
Nye Mining and Developement Co. Inc.
805 Mount Rose Street
Reno, Nevada.

U. S. Government Messenger Envelope

Standard Form No. 65 (Rev. 1/46)

1. Use blocks consecutively, one at a time.
2. Fill previous block.
3. Write clearly.

NAME OR TITLE OF PERSON, DEPARTMENT, ADDRESS, AND ROOM		NAME OR TITLE OF PERSON, DEPARTMENT, ADDRESS, AND ROOM	
	RUN		RUN
	STOP		STOP
Mr. Mittendorf	RUN		RUN
	STOP		STOP
	RUN		RUN
	STOP		STOP
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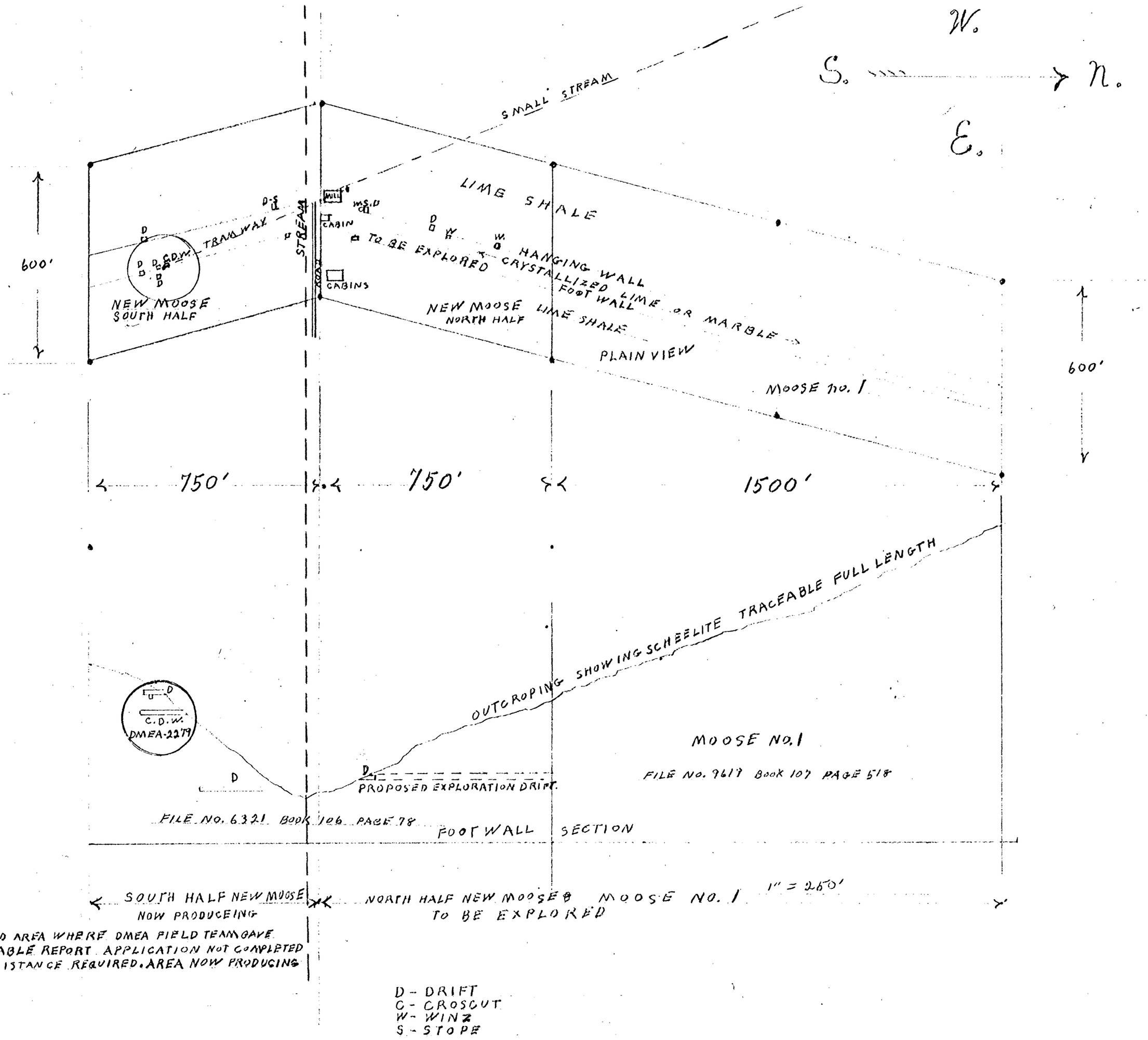
Send surplus envelopes to supply room for reissue.

Use other side

16—38949a-2

Use RUN and STOP only when messenger service between Government buildings in Washington is required. Your mail room has RUN and STOP information.



NEW MOOSE & MOOSE NO. 1 MINES
SUMMIT CANYON - MILLET MINING DISTRICT
NYE COUNTY NEVADA
OWNED BY KENNETH J. ROGERS & HARRIS E. VAUGHN
UNDER LEASE TO NYE MINING & DEVELOPMENT CO. INC.
805 MOUNT ROSE STREET
RENO, NEVADA
JANUARY, 26. 1956

(DMEA-4169
2-9-56)

ALBANENE NO. 1951 K & E CO., N. Y.