

1 FROM (COMPANY NAME) OIL GAS & MINING ADDRESS STE 350 3 TRIAD CITY STATE ZIP CODE (REQUIRED) SALT LAKE CITY UT 84180 SENT BY (NAME/DEPT.) PHONE D. Nielson 538-5340		ORIGIN AIRBILL NUMBER SLC 4314847283 4 CUSTOMER AIRBORNE EXPRESS ACCOUNT NUMBERS SENDER 37762079 RECEIVER		<h1>AIRBORNE EXPRESS</h1> EXECUTIVE OFFICES P.O. BOX 662 SEATTLE, WA 98111-0662  USE THIS AIRBILL FOR SHIPMENTS WITHIN THE U.S. & TO AND FROM PUERTO RICO. ABSENT A HIGHER SHIPMENT VALUATION, CARRIER'S LIABILITY IS LIMITED TO \$100 PER PACKAGE, OR ACTUAL VALUE WHICHEVER IS LESS. SPECIAL OR CONSEQUENTIAL DAMAGES ARE NOT RECOVERABLE. SEE TERMS AND CONDITIONS ON REVERSE SIDE OF THIS NON-NEGOTIABLE AIRBILL. SCAC AIRB FED. LD. NO. 91-0837489 DROP OFF LOCATION <input type="checkbox"/> AIRBORNE TERMINAL <input type="checkbox"/> DROP BOX No. _____
2 TO (COMPANY NAME) Div of Federal Programs Western Field Operations OSM ADDRESS Brooks Towers 1020 15 Street CITY STATE ZIP CODE (REQUIRED) Denver CO 80202 ATTN: (NAME/DEPT.) PHONE Richard Dawes, Chief (303) 837-2451		5 METHOD OF PAYMENT (ASSUMED SENDER UNLESS OTHERWISE NOTED) <input type="checkbox"/> BILL SENDER <input type="checkbox"/> BILL RECEIVER Airborne Account No. <input type="checkbox"/> BILL 3RD PARTY <input type="checkbox"/> PAID IN ADVANCE Check No. Amount BILLING REFERENCE (WILL APPEAR ON INVOICE)		
DESCRIPTION ICB Andalex Resources VALUATION <input type="checkbox"/> DECLARED VALUE OR FULL INSURANCE \$ _____ 3 SENDER SIGNATURE DATE AIRBORNE SIGNATURE		6 NO. OF PKGS. WEIGHT (LBS.) 7 CHECK IF 1 <small>SUBJECT TO CORRECTION</small> <input checked="" type="checkbox"/> LETTER EXPRESS <input type="checkbox"/> EXPRESS PACK SPECIAL INSTRUCTIONS <input type="checkbox"/> SATURDAY DELIVERY <input type="checkbox"/> HOLD AT AIRBORNE EXPRESS <input type="checkbox"/> LAB PACK <input type="checkbox"/> SELECT DELIVERY SERVICE THANK YOU FOR SHIPPING WITH AIRBORNE EXPRESS		
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State of Utah
DEPARTMENT OF NATURAL RESOURCES
DIVISION OF OIL, GAS AND MINING

Norman H. Bangarter
Governor
Dee C. Hansen
Executive Director
Dianne R. Nielson, Ph.D.
Division Director

355 West North Temple
3 Triad Center, Suite 350
Salt Lake City, Utah 84180-1203
801-538-5340

September 23, 1992

Mr. Richard Dawes, Chief
Division of Federal Programs
Western Field Operations
Office of Surface Mining
Brooks Towers
1020 15th Street
Denver, Colorado 80202


Dear Mr. Dawes:

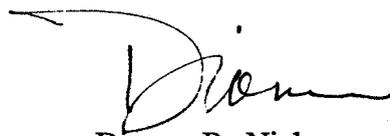
Re: State Final Findings and Supporting Documentation, Incidental Boundary Change in AEP Lease, Andalex Resources Inc., Centennial Project, ACT/007/019-92E, Folder No. 2, Carbon County, Utah

Enclosed please find Utah's Final Findings and Supporting Decision Documentation for Andalex Resources' Incidental Boundary Change (IBC) in the AEP lease.

This document has been reviewed by the technical/supervisory staff and the Associate Director for Mining as per the Divisions' quality control review policy.

The Division is satisfied that the Mining and Reclamation Plan (MRP) submitted by Andalex Resources for the IBC is adequate to receive Final Permit Approval and that the Decision Document is complete and accurate. Please contact me or Daron R. Haddock of my staff if there are any questions.

Best regards,


Dianne R. Nielson
Director

Enclosure
DRH

cc: M. Glasson, Andalex Resources
R. Hagen, OSM
L. Braxton
P. Baker
J. Helfrich
D. Haddock

ANDAAEPL.IBC

UTAH DIVISION OF OIL, GAS AND MINING
STATE DECISION DOCUMENT

Andalex Resources, Inc.
Centennial Project
Incidental Boundary Change
ACT/007/019
Carbon County, Utah

September 23, 1992

CONTENTS

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- * Permitting Chronology
- * Mine Plan Information Form
- * Findings
- * Environmental Assessment
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- * Letters of Concurrence and Other Attachments
 - Technical Review Memos, James D. Smith and Wayne H. Western,
September 16, 1992
 - Bureau of Land Management, September 9, 1992
 - Bureau of Land Management, Soil Conservation Service, September 23, 1992
 - U. S. Fish and Wildlife Service, September 16, 1992
 - Division of State History, September 18, 1992
 - Affidavit of Publication, September 17, 1992
 - Memo from Joseph C. Helfrich -- Section 510(c) finding

ADMINISTRATIVE OVERVIEW

Andalex Resources, Inc.
Centennial Project
Incidental Boundary Change
ACT/007/019
Carbon County, Utah

September 23, 1992

PROPOSAL

Andalex Resources, Inc. (ARI) has proposed an Incidental Boundary Change which would add approximately 30 acres to the current permit area. Mining would take place in the Centennial seam only and would be done as an extension of current underground mining in the 3rd west district.

BACKGROUND

The Mining and Reclamation Plan (MRP) for the Centennial Project was approved by the Office of Surface Mining in November of 1981 and by the Division of Oil, Gas and Mining (DOG M) in January of 1982. The originally approved MRP consisted of 2,240 acres of private and federal coal leases. On May 20, 1986, ARI was issued a permit by DOGM for a 120-acre federal emergency lease. On March 2, 1987, a new five-year permanent program permit was issued incorporating the emergency lease, for a total permitted acreage of 2,360 acres.

In October of 1981, Federal lease numbers U-010581, SL-063058 and SL-027304 were modified by the Bureau of Land Management to include an additional 436 acres. In March of 1988, ARI requested that these three lease modifications be incorporated into the permitted area. In August of 1988, ARI requested that one additional 320 acre federal lease (U-05067) and one 240 acre fee lease be added to the permitted area. The permit was revised to include these leases on May 4, 1989, which brought the total permitted acreage to 3,358 acres. Again on April 8, 1991, a permit revision was approved which incorporated Federal Lease UTU-66060 also known as the Graves Lease into the permit area. The addition of this 933 acre lease brought the total lease holdings to 4,291 acres. This total combined with a 10 acre BLM right-of-way brought the total permit acreage to 4,301. This Decision Document addresses the addition of a portion of the AEP lease to the permitted area, which consists of approximately 30 acres. Total permitted acreage as a result of this change would be 4,331 acres.

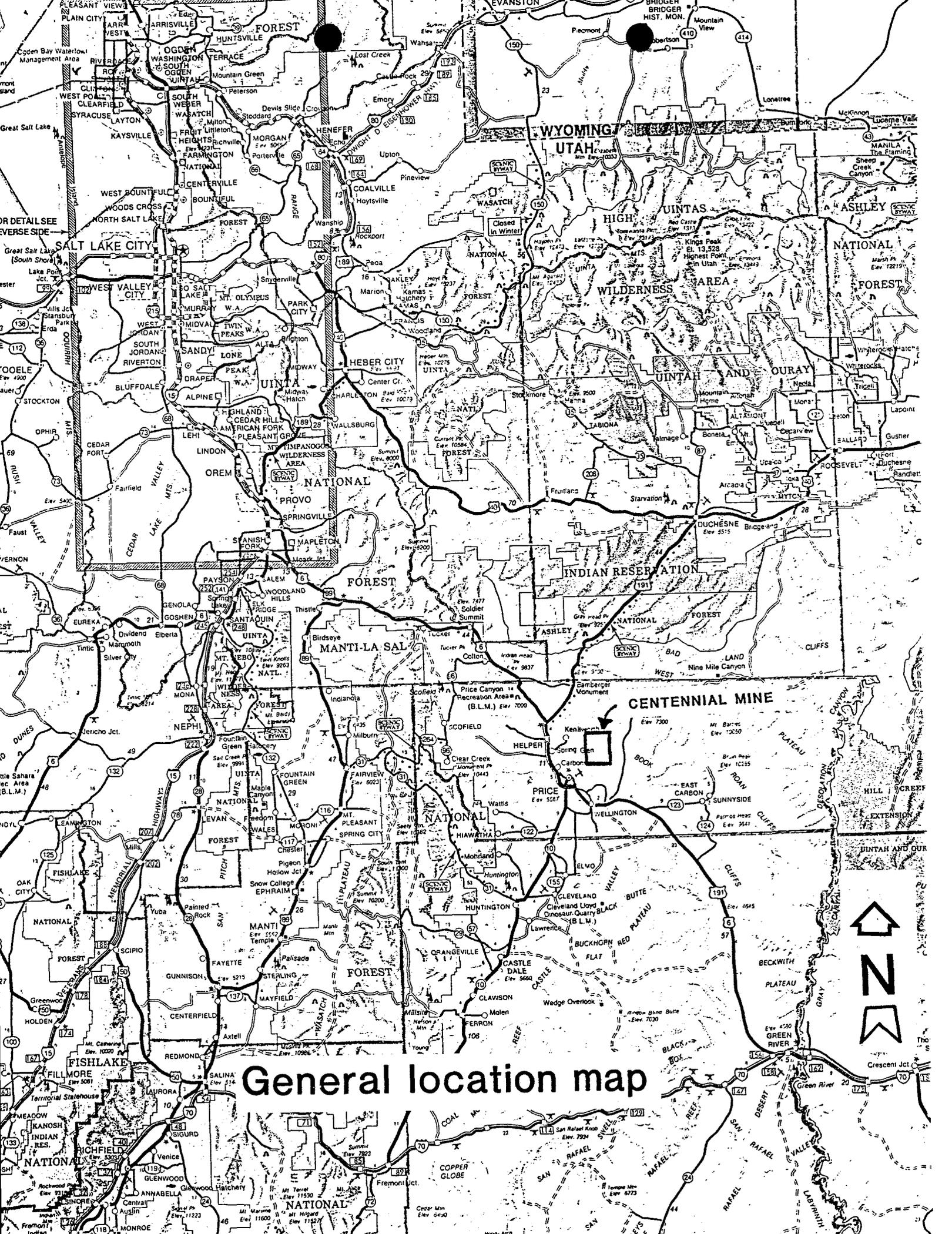
Currently ARI operates three mines, the Pinnacle, Apex and Aberdeen, in the Gilson, Lower Sunnyside and Aberdeen seams respectively. A fourth seam, the Centennial, is accessed through the Pinnacle Mine by driving rock slopes from the Gilson seam. The proposed incidental Boundary change involves further development of the Centennial seam.

ANALYSIS

No additional surface disturbance is proposed in relation to the addition of this IBC. All mining will be done as an extension of current underground mining in the Centennial seam. Therefore, it is DOGM's opinion that the mining and reclamation practices and procedures which were approved in the five-year permit renewal are adequate to address any effects related to the underground mining of the IBC. An Environmental assessment has been prepared which indicates that mining in the IBC will have no significant impact to the environment or the public.

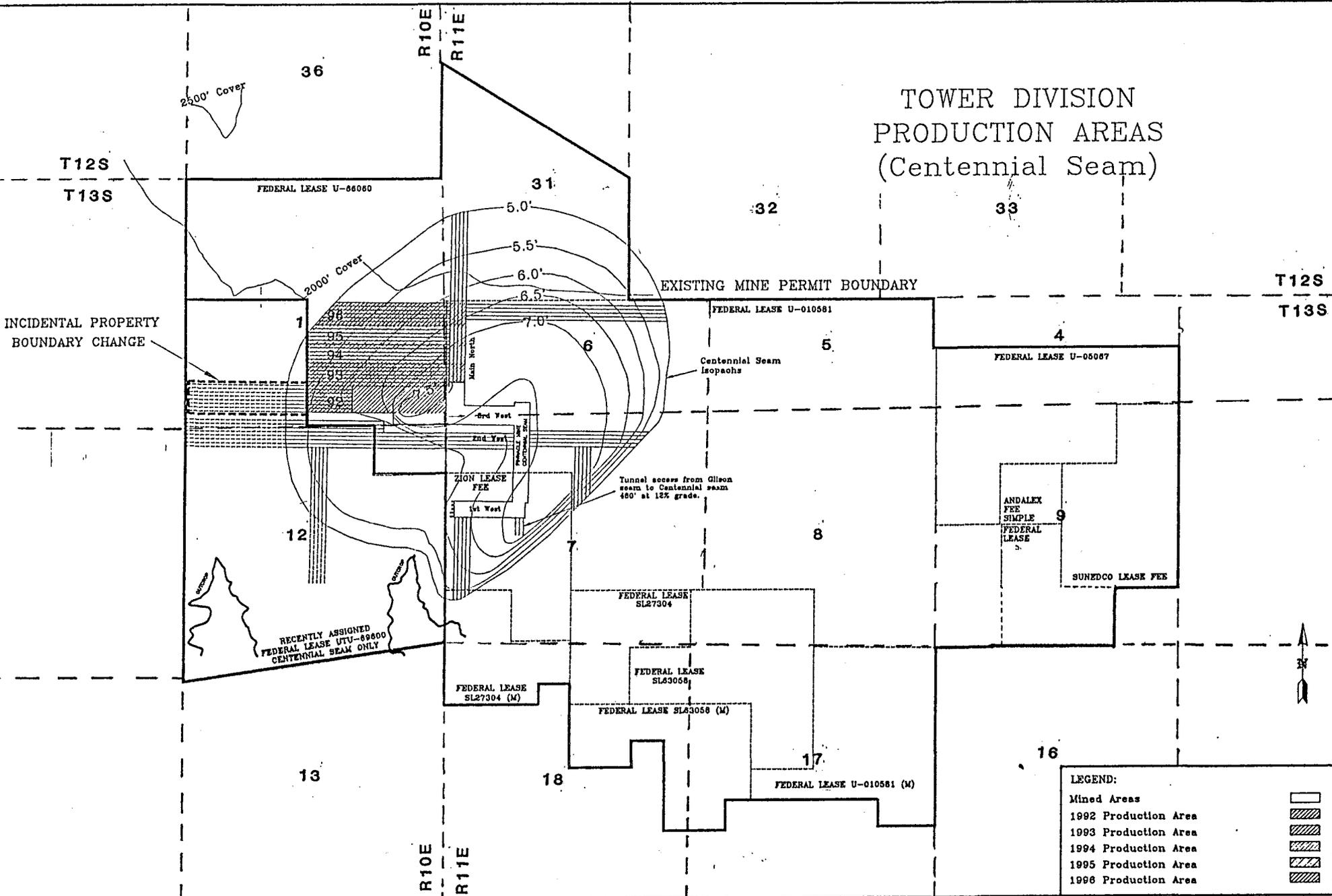
RECOMMENDATION

ARI has demonstrated that mining of the IBC can be done in conformance with the Surface Mining Control and Reclamation Act, and the corresponding Utah Act and performance standards. The Bureau of Land Management has approved mining in the AEP federal lease and concurs with mining in the IBC at this time. It is therefore recommended that approval be given for the addition of the IBC to the permitted area and to the currently approved five year permanent program mining permit.



General location map

TOWER DIVISION PRODUCTION AREAS (Centennial Seam)



Pinnacle Mining
P.O. Box 902
Bice, Minn. 564501

LEGEND:

Mined Areas	
1992 Production Area	
1993 Production Area	
1994 Production Area	
1995 Production Area	
1996 Production Area	

PERMITTING CHRONOLOGY

Andalex Resources, Inc.
Centennial Project
Incidental Boundary Change
ACT/007/019
Carbon County, Utah

- 8/21/92 ARI submits plans for including a 30 acre Incidental Boundary Change into the permit.
- 8/24/92 ARI submits additional information to complete application for IBC.
- 9/8/92 ARI submits copies of the IBC amendment to DOGM, for distribution to other reviewing agencies.
- 9/16/92 DOGM completes technical review of plan.
- 9/17/92 ARI publishes notice of intent to add the IBC to the permit area in the Price Sun Advocate.
- 9/23/92 DOGM forwards State Decision Document to Office of Surface Mining Reclamation and Enforcement for concurrence and Secretarial signature.

FINDINGS

Andalex Resources, Inc.
Centennial Mines Project
Incidental Boundary Change
Centennial Seam-AEP Lease
ACT/007/019
Carbon County, Utah

September 23, 1992

1. The revised plan and the permit application are accurate and complete and all requirements of the Surface Mining Control and Reclamation Act, and the approved Utah State Program (the "Act") have been complied with (R645-300-133.100).
2. No additional surface reclamation is required since the additional permit area will be mined as an underground extension of the existing mine. There will be no new surface facilities (R645-300-133.710).
3. The assessment of the probable cumulative impacts of all anticipated coal mining and reclamation activities in the general area on the hydrologic balance has been conducted by the regulatory authority and no significant impacts were identified. The Mining and Reclamation Plan (MRP) proposed under the application has been designed to prevent damage to the hydrologic balance in the permit area and in associated off-site areas (R645-300-133.400 and UCA 40-10-11 {2}{c}) (See December 4, 1990 Cumulative Hydrologic Impact Analysis [CHIA]).
4. The proposed lands to be included within the permit area are:
 - a. not included within an area designated unsuitable for underground coal mining operations (R645-300-133.220) ;
 - b. not within an area under study for designated lands unsuitable for underground coal mining operations (R645-300-133.210) ;
 - c. not on any lands subject to the prohibitions or limitations of 30 CFR 761.11 {a} (national parks, etc.), 761.11 {f} (public buildings, etc.) and 761.11 {g} (cemeteries);
 - d. not within 100 feet of the outside right-of-way of a public road (R645-300-133.220);
 - e. not within 300 feet of any occupied dwelling (R645-300-133-220).

Findings

Andalex Resources Inc.

ACT/007/019

September 23, 1992

5. The regulatory authority's issuance of a permit is in compliance with the National Historic Preservation Act and implementing regulations (36 CFR 800) (R645-300-133.600). See attached letter from State Historic Preservation Officer (SHPO) dated September 18, 1992.
6. The applicant has the legal right to enter and complete mining activities in the IBC through a federal coal lease issued by the Bureau of Land Management (See attached lease UTU-69600 effective May 1, 1992) (R645-300-133.300).
7. A 510(c) report has been run on the Applicant Violator System (AVS), which shows that: prior violations of applicable laws and regulations have been corrected; neither Andalex Resources Inc., or any affiliated company, are delinquent in payment of fees for the Abandoned Mine Reclamation Fund; and the applicant does not control and has not controlled mining operations with demonstrated pattern of willful violations of the Act of such nature, duration, and with such resulting irreparable damage to the environment as to indicate an intent not to comply with the provisions of the Act (R645-300-133.730).
8. Underground mining operations to be performed under the permit will not be inconsistent with other operations anticipated to be performed in areas adjacent to the proposed permit area. The closest operating mine is the Soldier Canyon Mine.
9. The applicant has posted a surety bond for the Centennial Mines Complex in the amount of \$1,080,839.00. No additional surety will be required, since there is no additional surface disturbance proposed (R645-300-134).
10. No lands designated as prime farmlands or alluvial valley floors occur on the permit area (R645-302-313.100) (R645-302-321.100).
11. The proposed postmining land-use of the permit area is the same as the pre-mining land use and has been approved by the regulatory authority and the surface land management agency
12. The regulatory authority has made all specific approvals required by the Act, the Cooperative Agreement, and the Federal Lands Program.

13. The proposed operation will not affect the continued existence of any threatened or endangered species or result in the destruction or adverse modification of their critical habitats (R645-300-133.500). (See September 16, 1992 letter from U. S. Fish and Wildlife Service).
14. All procedures for public participation required by the Act, and the approved Utah State Program have been complied with (R645-300-120).
15. No existing structures will be used in conjunction with mining of the underground Right-of-Way, other than those constructed in compliance with the performance standards of R645-301 and R645-302 (R645-300-133.720).



Permit Supervisor



Associate Director, Mining



Director

ENVIRONMENTAL ASSESSMENT

Centennial Mine Incidental Boundary Change within Lease UTU-69600 September 1992

I. PROPOSED ACTION AND ALTERNATIVES

A. Purpose and Need for a Federal Action

The Utah Division of Oil, Gas and Mining (DOGGM) and the Office of Surface Mining Reclamation and Enforcement (OSM) received a Permit Application Package (PAP) for the mining of leased federal coal within a portion of the AEP lease tract at the Andalex Resource's Centennial Mine on August 21, 1992. The application is for adding approximately 30 acres of the AEP lease to the current permit area as an incidental boundary change.

OSM reviewed the PAP and determined that the proposed operations required a mining plan approval by the Assistant Secretary--Land and Minerals Management pursuant to the Mineral Leasing Act of 1920, as amended, Section 523 of the Surface Mining Control and Reclamation Act of 1977(SMCRA), and 30 CFR 746.14. This document assesses the effects of the proposed mining and reclamation operations and if approved, approved with conditions, or disapproved by the Assistant Secretary will have a significant impact on the human environment.

B. Background

The Centennial underground coal mine is located in Carbon County, Utah, approximately 10 miles north-northeast of Price, Utah. The Mining and Reclamation Plan (MRP) for the Centennial Project was approved by the Office of Surface Mining in November of 1981 and by the Division of Oil, Gas and Mining (DOGGM) in January of 1982. The originally approved MRP consisted of 2,240 acres of private and federal coal leases. On May 20, 1986, ARI was issued a permit by DOGM for a 120-acre federal emergency lease. On March 2, 1987, a new five-year permanent program permit was issued incorporating the emergency lease, for a total permitted acreage of 2,360 acres.

In October of 1981, Federal lease numbers U-010581, SL-063058 and SL-027304 were modified by the Bureau of Land Management to include an additional 436 acres. In March of 1988, ARI requested that these three lease modifications be incorporated into the permitted area. In August of 1988, ARI requested that one additional 320 acre federal lease (U-05067) and one 240 acre fee lease be added to the permitted area. The permit was revised on May 4, 1989 to include these leases, which brought the total permitted acreage to 3,358 acres. Again

on April 8, 1991, a permit revision was approved which incorporated Federal Lease UTU-66060 also known as the Graves Lease into the permit area. The addition of this 933 acre lease brought the total lease holdings to 4,291 acres. This total combined with a 10 acre BLM right-of-way brought the total permit acreage to 4,301 acres, 3,861 acres being federally owned, and 440 acres privately owned.

Currently ARI operates three mines, the Pinnacle, Apex and Aberdeen, in the Gilson, Lower Sunnyside and Aberdeen seams, respectively. A fourth seam, the Centennial, is accessed through the Pinnacle mine by driving rockslopes from the Gilson seam.

C. Description of the Current Proposal

Andalex Resources Incorporated (ARI) has proposed to add 30 acres of Federal lease UTU-69600 to the permit area for the underground Centennial Mine. The new area is to be added as an incidental boundary change (IBC). The IBC will be mined as an extension of the mine's current room and pillar operations. Only the Centennial seam will be mined by extending the existing mine workings in the active 3rd West mining district. This section will be driven to the west within the AEP lease as long as the seam is economically minable (greater than 5 feet thick). It is unknown at this time exactly how far to the west the entries may be mined. The seam may pinch out before reaching the lease boundary.

No additional surface construction or facilities is planned with this proposal. There is no change in employment anticipated with this IBC. Coal reserves, as a result of adding this IBC, are minimally affected. Mining in this area will better define available reserves in the centennial seam and allow the company to better quantify the reserves in the Centennial seam and the remainder of the AEP lease.

D. Previous Environmental Studies

Environmental studies prepared for the Centennial Mine and surrounding general area include:

1990, BLM, Environmental Assessment, Centennial Project Mine,
Federal Lease UTU-66060.

1990, Utah DOGM, State Decision Document and Cumulative
Hydrologic Impact Assessment, Graves Lease, Centennial Project Mine.

1983, BLM, Environmental Assessment, Federal Lease U-52341.

1981, BLM, Environmental Assessment, Federal Lease Nos. SL-27302, SL-063058, and U-010581.

II. ALTERNATIVES

A. Alternatives Under Analysis

1. Approval Without Special Federal Conditions

The Assistant Secretary-Land and Minerals Management may approve the Mining plan in accordance with the recommendation of DOGM. This is the preferred alternative.

2. Disapproval

The Assistant Secretary-Land and Minerals Management may disapprove the mining plan which would have the same effect as taking no action.

B. Alternatives Considered but not Analyzed Further

1. No Action

Under 30 CFR 746.14, mining plans must be approved, approved with conditions, or disapproved by the Assistant Secretary. The Assistant Secretary must act on the proposed mining plan; therefore, the No Action alternative is not discussed further in this document. However, taking no action would have the same effect as disapproval.

2. Approval with Special Federal Conditions

The Assistant Secretary-Land and Minerals Management may approve the mining plan with special Federal conditions in addition to any attached to Utah Permit ACT/007/019 by DOGM. The analysis of Alternative 1, Approval Without Special Federal Conditions, did not result in the identification of any impacts that could or should be mitigated beyond that mitigation proposed in the application. Therefore, this alternative is not analyzed further.

III. AFFECTED ENVIRONMENT

A. Geology and Topography

The Centennial Project is located within the Book Cliffs Coal Field approximately 10 miles north-northeast of Price, Utah. The Book Cliffs form a rugged, southerly facing escarpment that delineates the Uintah Basin to the North from the San Rafael Swell to the south. Elevations along the Book Cliffs range from 5,000 ft. to 9,000 ft.

Outcropping rocks of the Book Cliffs range from Upper Cretaceous to Quaternary in age. The rock record reflects an overall fluctuating regressive sequence from marine (Mancos Shale) through littoral and lagoonal (Blackhawk Formation) to fluvial (Castlegate Sandstone, Price River and North Horn Formations) and lacustrine (Flagstaff Formation) depositional environments. Oscillating depositional environments within the overall regressive trend are represented by members of the Blackhawk Formation. The major coal bearing unit within the Book Cliffs Coal field is the Blackhawk Formation.

The Centennial Coal Seam, which is the coal seam to be mined in the proposed Incidental Boundary Change, occurs as the uppermost minable coal seam in the area of the IBC. The Lower Sunnyside seam has been pinched out in this area and other coal seams within the IBC are not proposed for mining as the lease for them is not owned by Andalex Resources. Overburden in the area of the IBC ranges from 800 to 1,000 feet.

Precipitation varies from 20 inches at higher elevations to 5 inches at lower elevations. The Book Cliffs area may be classified as mid latitude steppe to desert.

B. Ground Water

The ground water regime is dependent upon geologic and climatic parameters that establish systems of recharge, movement and discharge.

Snowmelt at higher elevations provides most of the ground water recharge. Vertical migration of ground water occurs based on permeability and fracturing of the rock strata. Lateral migration may occur when ground water encounters impermeable layers. Based on information from existing mine workings it is anticipated that the regional water table lies at some elevation deeper than the coal seams being mined. Very little water has been encountered during the mining process, usually minor

drippers or some seepage, however an occasional exception to this rule has occurred when the mine has encountered old workings. In 1981, the mine cut into some old works releasing a surge of water that had to be discharged from the mine. Again in 1983 the mine encountered groundwater in an area of burned coal. These instances indicate that water may accumulate in areas of high permeability, but these areas are generally highly localized and have limited storage capacity.

Very little water has been encountered in the Pinnacle Mine. Water that has been encountered has been in the form of small roof leaks that dry up within a few days or weeks after mining progresses downdrift.

C. Surface Water

The entire Centennial project area is drained by ephemeral drainages primarily heading in a southerly direction and are tributary to the Price River. The proposed IBC area is located in drainage which would only flow in direct response to snowmelt or direct precipitation. An inventory of seeps and springs conducted by Andalex personnel in May 1992, indicated that there are no surface water sources on the AEP lease.

Surface runoff from the Book Cliffs area flows into the Price River drainage basin of east-central Utah. The Price River originates near Scofield Reservoir and flows southeasterly into the Green River, north of the community of Green River, Utah. Water quality is good in the mountainous headwater tributaries, but deteriorates rapidly as flow traverses the Mancos Shale. The shale lithology typically has low permeability, is easily eroded and contains large quantities of soluble salts that are a major contributor to poor water quality. Depending upon the duration of contact, water quality degrades downstream to where total dissolved solids (TDS) levels of 3,000 milligrams per liter are common. The predominant ion leached from the Mancos Shale is sulfate (SO_4) with values over 1,000 mg/l common in the lower reaches of the Price River.

D. Vegetation

Vegetation varies from the sagebrush/grass community type at lower elevations to the Douglas fir/aspen community at higher elevations. Other vegetative communities include mountain brush pinyon-juniper, pinyon-juniper/sagebrush and riparian. These communities are primarily used for wildlife habitat and livestock grazing.

No Threatened or Endangered (T&E) plant species have been found to exist on the proposed IBC.

E. Fish and Wildlife

The proposed permit area consists of a variety of habitat types and wildlife. Economically important and high interest species include elk, mule deer, black bear, coyote, mountain lion, mountain cottontail, and several furbearing species. Bird species of interest that are present in the area include the golden eagle, blue grouse, ruffed grouse, western bluebird, and Grace's warbler. An inventory conducted in conjunction with the Utah Division of Wildlife Resources failed to identify any active raptor nests on the IBC area.

No fisheries exist within the Centennial Mine project area.

F. Land Use

Land Use in the proposed permit area include wildlife habitat and livestock grazing.

G. Cultural Resources

Southeastern Utah and particularly the Book Cliffs area contains numerous sites of significance with respect to the Fremont and Anazasi Indian cultures. The majority of those located in the Book Cliffs are east of the proposed permit area. No sites were identified in surveys conducted by the State Historic Preservation office.

H. Socioeconomics

Currently Andalex Resources Inc., employs 116 persons of which 102 are full time employees and 14 are part time employees. Approximately 90% of the employees live in Carbon County with 8% and 2% living in Emery and Utah counties respectively.

Total recoverable reserves in the IBC are unknown at this time as the Centennial seam is a localized pod of coal with undefined boundaries. Recovery could be as much as 100,000 tons or as little as 0 tons depending on mining conditions encountered.

IMPACT ANALYSIS

Impacts of Alternative 1, Approval without special federal conditions.

Mining operations within the proposed Incidental Boundary Change would not encompass additional surface disturbance. Thus, only mining-induced subsidence would potentially impact surface resources.

A. Geology and Topography

Rock overlaying the centennial seam is anticipated to be over 500 feet thick. Based on past history of subsidence effects at mines in the Wasatch coal field and Book Cliffs coal fields, including the Centennial Mine itself, there is little likelihood of surface expression as a result of mining this IBC.

B. Groundwater

Mining in the IBC area may result in the extension and expansion of the existing fracture system and the upward propagation of new fractures. Ground water may be intercepted by these new fractures. Dewatering of localized aquifers is possible during the life of mine operations.

Currently the Centennial Mine discharges approximately 100,000 gallons of water per day from mine inflow. This volume is not anticipated to increase significantly since previous mining in the AEP lease found conditions to be completely dry.

Seeps or springs in the area of the IBC were not found during a recent inventory of the area.

C. Surface water

Mining operations in the IBC will not encompass additional surface disturbance and therefor would not impact surface waters.

All surface drainages in the area of the IBC are ephemeral in nature, responding only to rain or snowfall events. Effects of subsidence, if any, should be limited to shallow surface cracks in surface tensile zones that would quickly fill with sediments during runoff events and produce no significant impact to ephemeral stream flow.

No water rights or surface facilities indicating water use were identified during a recent survey.

D. Vegetation

Mining will be an extension of underground operations with no additional surface disturbance.

E. Fish and Wildlife

Additional surface disturbance will not occur as a result of the IBC. Surface expression of subsidence is possible, but not likely. The Utah Division of Wildlife Resources conducted a survey of the area for possible raptor nests. None of strategic importance was located.

F. Land Use

No Changes in the land use for this area will occur as a result of the IBC.

G. Cultural Resources

No surface disturbance is planned, therefore no cultural or historic sites are anticipated to be affected.

H. Socioeconomics

No changes in employment are anticipated as a result of the proposed IBC.

Effects to coal reserves as a result of the IBC are unknown at this time. The proposed mining activity would help quantify reserves in the Centennial seam for the IBC and adjoining AEP lease. Since the mining activity is an extension of the existing mine workings in the active 3rd West mining district, the logical time for mining is now. If mining in the IBC is not done at this time there may be the potential for bypassing some coal.

Impacts of Alternative 2, Disapproval

If the mining plan for the IBC is disapproved, the impacts described for Alternative 1, Approval Without Special Federal Conditions, would not occur. The Centennial Mine would continue to operate under the terms and conditions of the currently approved mining plan.

Coal reserves in the centennial seam would remain unknown and although Andalex could resubmit an application for mining in this area the cost would be much greater and the recovery of the coal would be uncertain.

CONSULTATION AND COORDINATION

A. Preparer:

This Environmental Assessment was prepared by:

Daron R. Haddock, Permit Supervisor, Utah Division of Oil, Gas and Mining

B. Consultation:

The following individuals were consulted in the preparation of this EA:

Richard Holbrook, Senior Project Manager, OSM
Floyd McMullen, Project Leader OSM
Barry Grosely, Engineer, BLM
Ken Phippen, UDWR
Sue Linner, USFWS



United States Department of the Interior

BUREAU OF LAND MANAGEMENT
Utah State Office
324 South State, Suite 301
Salt Lake City, Utah 84111-2303



IN REPLY REFER TO:

3453
SL-048442-050115
UTU-69600
(UT-942)
MAY 01 1992

CERTIFIED MAIL--Return Receipt Requested

AMCA Coal Leasing, Inc.
c/o Andalex Resources, Inc.
P. O. Box 902
Price, Utah 84501

DECISION

:
:
: Coal Lease
: SL-048442-050115
:

RECEIVED

AUG 21 1992

Partial Assignment Approved
Bond Accepted

DIVISION OF
OIL GAS & MINING

On January 13, 1992, a partial assignment of coal lease SL-048442-050115 as to the Centennial coal seam only, entered into on December 9, 1991, between AMCA Coal Leasing, Inc., as assignee, and Blackhawk Coal Company, as assignor, was filed in this office.

Satisfactory evidence of the qualifications and holdings of AMCA Coal Leasing, Inc. has been filed. The lease account appears to be in good standing inasmuch as the lease is not shown on the Minerals Management Service (MMS) list of leases with unpaid assessments. The assignee has agreed by letter dated January 9, 1992 to be liable for any delinquent rent/royalty payments discovered through an MMS audit. Therefore, the assignment appears to meet the requirements of the regulations and is hereby approved effective May 1, 1992. Approval of this assignment does not constitute approval of any of the terms therein which may be in violation of the lease terms.

In accordance with the regulations in 43 CFR 3453.2-5, the partial assignment of coal lease SL-048442-050115 as to the Centennial coal seam only creates a new lease which has been assigned Serial No. UTU-69600. Therefore, coal leases SL-048442-050115 and UTU-69600 are described as follows:

Lands remaining in coal lease SL-048442-050115:

T. 13 S., R. 10 E., SLM, Utah

- *Sec. 1, SW $\frac{1}{4}$;
- Sec. 3, S $\frac{1}{2}$ N $\frac{1}{2}$, S $\frac{1}{2}$;
- Sec. 4, lots 1-4, S $\frac{1}{2}$ N $\frac{1}{2}$, N $\frac{1}{2}$ S $\frac{1}{2}$;
- Sec. 10, N $\frac{1}{2}$, NW $\frac{1}{4}$ SW $\frac{1}{4}$;
- Sec. 11, E $\frac{1}{2}$, NW $\frac{1}{4}$;
- *Sec. 12, lots 2-11, W $\frac{1}{2}$ W $\frac{1}{2}$, NE $\frac{1}{4}$ SW $\frac{1}{4}$.

*Except for coal in the Centennial Coal Seam

Containing 2,604.36 acres; Carbon County, Utah

Lands assigned and given Serial No. UTU-69600:

T. 13 S., R. 10 E., SLM, Utah
Sec. 1, SW $\frac{1}{4}$;
Sec. 12, lots 2-11, W $\frac{1}{2}$ W $\frac{1}{2}$, NE $\frac{1}{4}$ SW $\frac{1}{4}$.

As to all coal in the Centennial Coal Seam only

Containing 801.48 acres; Carbon County, Utah

On April 22, 1992, coal lease bond SU1515581 in the amount of \$5,000, with AMCA Coal Leasing, Inc., as principal, and Utica Mutual Insurance Company, as surety, was filed in this office to provide bond coverage for coal lease UTU-69600. The bond has been examined, found to be satisfactory, and is hereby accepted.

for Bert Rodgers
James M. Parker
State Director

Enclosure
Assignment

cc: Blackhawk Coal Company
Box 700
Lancaster, OH 43130

AMCA Coal Leasing, Inc.
9300 Shelbyville Road, Suite 1201
Louisville, KY 40222

ASSIGNMENT AFFECTING RECORD TITLE

TO UNITED STATES COAL LEASE

Serial Number SL-048442-050115

RECORDED
INDEXED
JUN 19 1966
SALT LAKE CITY

For good and valuable consideration, BLACKHAWK COAL COMPANY, a Utah corporation (hereinafter referred to as the "Assignor"), as owner of record title in that certain coal lease issued by the United States of America, as lessor, bearing Serial Number SL-048442-050115, dated November 21, 1930 (hereinafter referred to as the "Lease"), hereby assigns to AMCA Coal Leasing, Inc., a Delaware corporation, whose address is c/o Andalex Resources, Inc., P. O. Box 902, Price, Utah 84501 (hereinafter referred to as the "Assignee"), a one hundred percent (100%) record title leasehold interest in the Centennial Seam only, as said Seam is included in a portion of the Lease, giving and granting to said Assignee rights and privileges as lessee in the Lease and in and to the lands embraced therein, as described below, situated in Carbon County, State of Utah, to the extent indicated below and subject to the reservation of overriding royalties as herein noted.

1. Lands and coal seam affected by this Assignment:

The lands affected by this Assignment and the description of the Centennial Seam being transferred by this Assignment are more particularly described in Exhibit A attached hereto and by this reference made a part hereof.

2. Interest held by the Assignor prior to this Assignment: One hundred percent (100%).

3. Extent of such interest conveyed to the Assignee: One hundred percent (100%).

4. Overriding royalties reserved herein to the Assignor: There is hereby reserved to the Assignor, its successors and assigns, an overriding royalty of forty (40) cents (\$0.40) per ton for each ton of run-of-mine coal extracted by Assignee from the Lease, in excess of 250,000 tons, based upon volumetric surveys by a registered land surveyor, as reported by Assignee to and accepted by the Bureau of Land Management, United States Department of the Interior, under applicable regulations. Said royalty shall be paid by Assignee to Assignor semi-annually, and Assignee shall keep accurate and complete records, in accordance with good industry standards, of the coal extracted from the Lease, which records shall be subject to Assignor's inspection and audit upon reasonable notice.

At any time and from time to time, in the event the previously reserved overriding royalty interests, if any, existing with relation to the Lease as of the date hereof, when combined with the overriding royalties reserved to the Assignor pursuant to this Assignment exceed the legal limit on overriding royalty interests which may be granted or reserved in federal coal leases, then as to the Lease, the overriding royalty interest herein reserved to the Assignor shall be automatically reduced for the period of such limitation to an amount equal to the difference between the legal limit on overriding royalty interests payable on federal coal leases and the sum of all overriding royalty interests in the Lease, if any, reserved or granted prior to the date hereof.

IN WITNESS WHEREOF, the Assignor has caused this Assignment to be executed and delivered as of the 9th day of December, 1991.

[Handwritten initials]

BLACKHAWK COAL COMPANY,
a Utah corporation

By: *J. E. Katlic*
J. E. Katlic
President

ATTEST:

W. E. Olson
W. E. Olson
Assistant Secretary

STATE OF Ohio)
COUNTY OF Fairfield) : ss.

9th The foregoing Agreement was acknowledged before me this day of December, 1991, by J. E. Katlic of Blackhawk Coal Company, a Utah corporation.

Carmen M. Doomy
NOTARY PUBLIC
Residing at: Fairfield County
State of Ohio

My Commission Expires:
October 1, 1993

ACCEPTANCE OF ASSIGNMENT

Now comes AMCA COAL LEASING, INC., a Delaware corporation, whose address is c/o Andalex Resources, Inc., P. O. Box 902, Price, Utah 84501, and hereby accepts the foregoing assignment from BLACKHAWK COAL COMPANY, a Utah corporation, of a portion of that certain coal lease issued by the United States of America, as lessor, bearing Serial Number SL-048442-050115, dated November 21, 1930, and assumes all of the covenants and obligations of the portion of said Lease assigned as described in the foregoing Assignment.

IN WITNESS WHEREOF, said Assignee has executed this Acceptance of Assignment as of the 21 day of October, 1991.

AMCA COAL LEASING, INC.
a Delaware corporation

By: [Signature]

Title: President

ATTEST:

[Signature]

Title: [Signature]

STATE OF KENTUCKY)
 : ss.
COUNTY OF JEFFERSON)

The foregoing Acceptance of Assignment was acknowledged before me this 28th day of OCTOBER, 1991, by ROBERT ANDERSON JR., of AMCA Coal Leasing, Inc., a Delaware corporation.

Elizabeth B. Jones
NOTARY PUBLIC
Residing at: 2146 BOWENCASTLE AVE, LOUISVILLE, KY

My Commission Expires:
3-31-93

EXHIBIT A

EXHIBIT A TO ASSIGNMENT OF LEASEHOLD DATED AS OF
December 9, 1991, BETWEEN BLACKHAWK COAL COMPANY
AS "GRANTOR," AND ANDALEX RESOURCES, INC. AS "GRANTEE."

This Exhibit A contains the specific description of the leasehold interest, situated in Carbon County, State of Utah, referred to in the attached Agreement for Assignment of Leasehold Interest as being more particularly described in Exhibit A.

All of the Grantor's right, title, interest and estate in and to the Centennial Seam of coal only under approximately 800 acres contained within that certain Coal Lease, issued by the United States of America, as lessor, bearing the serial number indicated below and covering the following described lands:

United States Coal Lease Serial No. SL-048442-050115 dated November 21, 1930, insofar as said Lease covers the following lands:

TOWNSHIP 13 SOUTH, RANGE 10 EAST, SLB&M

Section 1:	SW $\frac{1}{4}$	160 acres
Section 12:	Lots 2 through 11	441.48 acres
	W $\frac{1}{2}$ W $\frac{1}{2}$	160.00 acres
	NE $\frac{1}{4}$ SW $\frac{1}{4}$	<u>40.00 acres</u>
	Total	<u>801.48 acres</u>

The Centennial Seam is that certain deposit of coal shown in the log of McCulloch drill hole 191-78 completed on June 8, 1978 as lying between depth 183.5 feet and 189.34 feet. A copy of said drill log is attached to this Exhibit A.

T. Sevinch

DRILL HOLE LOG

McCULLOCH DRILL HOLE # 191-78

LOCATION: SE $\frac{1}{4}$, NE $\frac{1}{4}$, Sec. 12, T. 13 S., R. 10 E., Deadman Canyon
Carbon County, Utah

LATITUDE:	503,594.472
DEPARTURE:	2,214,512.653
COLLAR ELEVATION:	7,282.91
TOTAL DEPTH:	887'
INCLINATION:	90°

DRILLED BY: Jack Withers, Longyear Company

LOGGED BY: Don A. Stephens and Mark Bunnell/American Electric Power
Service Corporation

DATE STARTED: 5/29/78

DATE FINISHED: 6/8/78

LITHOLOGY	MC-191-70	Page 1	DESCRIPTION	RECOVERED	FROM	TO
	HQ 0 - 279.9	HQ 279.9 - 887				
	Rock Bit			--	0	17
Sandstone	Yellowish gray (5Y8/1) to very light gray (N8) fine-medium grained with siltstone cross bedding in places			18.2	17	35.2
Siltstone	Light gray (N7) to medium dark gray (N4) slightly sandy to very sandy in places including some carbonaceous material with shale interbeds as follows: 1.7 @ 40.1 with sandstone interbeds as follows 1.1 @ 44.3, 1.5 @ 56, .8 @ 62.8			31.8	35.2	67.0
Sandstone	White (N9) to very light gray (N8) fine-medium grained with siltstone cross bedding in places with siltstone interbeds as follows: .4 @ 69.9, 1.5 @ 76.4			23.6	67.0	90.6
Siltstone	Medium light gray (N6) to brownish gray (5YR4/1) sandy in places with coal seams as follows: Top of coal 90.9 coal 0.52, Top of coal 96.5 coal/very silty 0.13, Top of coal 97.0 coal 1.0 siltstone/coal stringers 0.2 Top of coal 100.2 coal/siltstone stringer 0.2, Top of coal 103.7 coal 1.0			14.1	90.6	104.7
Sandstone	Very light gray (N8) to white (N9) fine to medium grained with siltstone cross bedding in places with siltstone interbeds as follows: 1.6 @ 129.1			58.7	104.7	163.4
Siltstone	Light gray (N7) to brownish gray (5YR4/1) slightly sandy to very sandy in places with siltstone/coal stringers as follows: .6 @ 179.5			20.1	163.4	183.5
Coal	0.95 Coal, bright, hard		5.84 Seam	5.84	183.5	189.5
	0.10 siltstone/coal stringers					
	4.65 coal, bright hard, with resin					
	0.09 siltstone/coal stringers					
	0.15 coal, bright, hard					

LITHOLOGY	DESCRIPTION	RECOVERED	FROM	TO
Sandstone	Light gray (N7) to very light gray (N8) fine to medium grained, carbonaceous with siltstone cross bedding in places, with siltstone/coal stringers	12.76	189.34	202.1
	Interbeds as follows: 2.2 @ 189.34 with siltstone interbeds as follows: .5 @ 191.5			
Siltstone	Medium gray (N5) to light gray (N7) to dark gray (N3) slightly sandy to very sandy in places, with sandstone interbeds as follows: 4.1 @ 228.1, with coal seams as follows: Top of coal 213.95 coal/slightly silty 1.6 coal/siltstone stringers .8, Top of coal 216.5 coal .6 coal/siltstone stringers .5, with siltstone/coal stringers interbedding as follows: 1.7 @ 205.8, .4 @ 217.6, .9 @ 220.9, 1.3 @ 226.4	32.6	202.1	234.7
Sandstone	Very light gray (N8) mottled, siltstone cross bedding in places carbonaceous in places, with coal seams as follows: Top of coal 243.3 coal 1.8 coal/siltstone stringers .4 with siltstone/coal stringers as follows: 1.2 @ 245.8	26.5	234.7	261.2
Siltstone	Dark gray (N3) to light gray (N7) sandy to very sandy in places, carbonaceous with siltstone/coal stringers as follows: .2 @ 262.2, 1 @ 265.3, .3 @ 276.7, .3 @ 297.9, .6 @ 315.4, .5 @ 317.5, .3 @ 320.5, 1.9 @ 327.7, with coal seams as follows: Top of coal 261.2 coal/siltstone stringers 1.1, Top of coal 276.4 coal/siltstone stringers .3 , Top of coal 297.15 coal .65 , Top of coal 318.05 coal 2.2 coal/siltstone stringers .3 with sandstone interbeds as follows: 3.9 @ 311.6	70.3	261.2	331.5

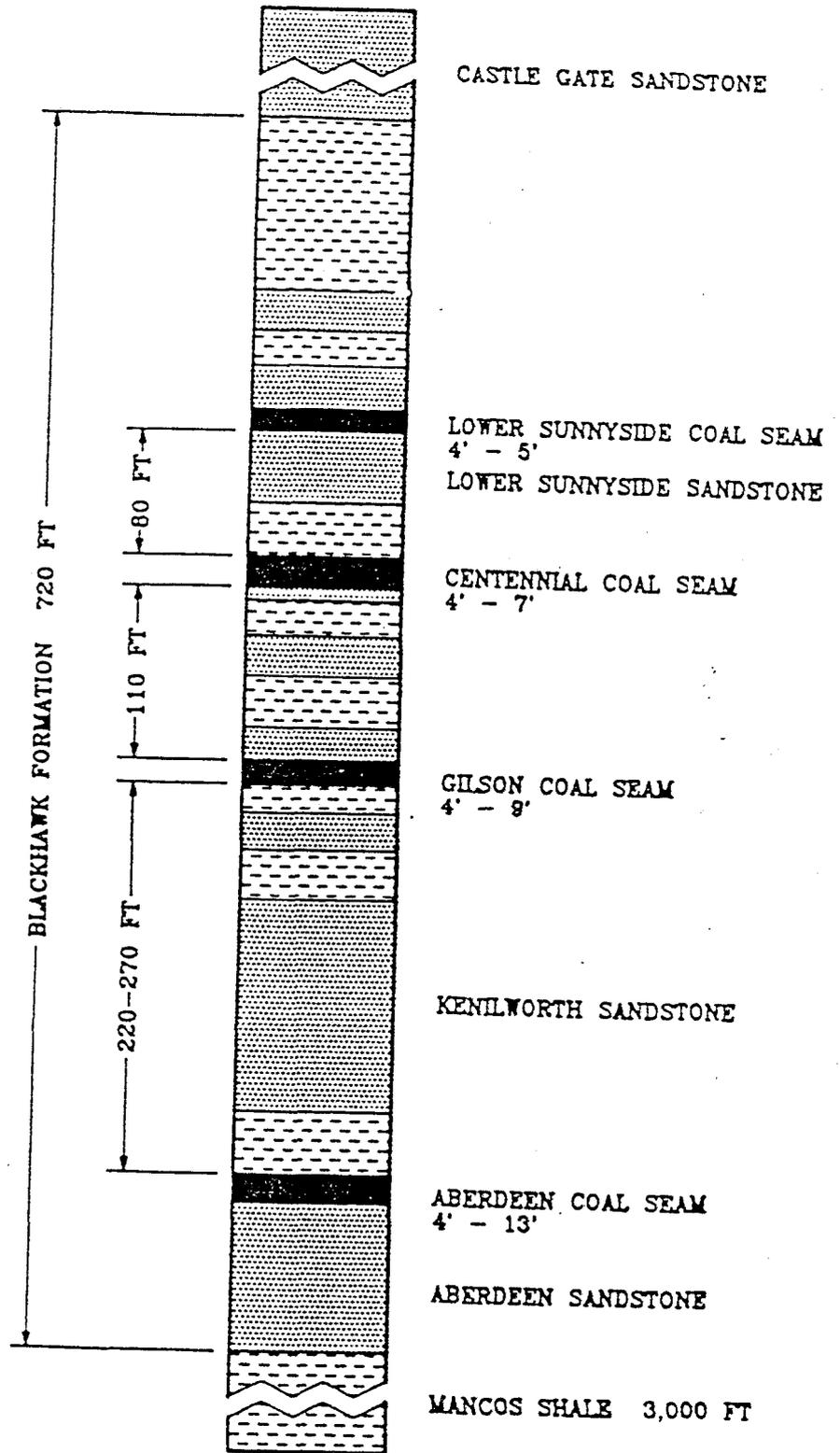
		RECOVERED	FROM	TO
Sandstone	Very light gray (N8) fine to medium grained, mottled with siltstone cross bedding, with fossiliferous siltstone interbeds as follows: .4 @ 363.6 with coal seams as follows: Top of coal 364.0 coal/siltstone stringers .2 coal .65 coal/siltstone stringers .2, Top of coal 365.75 coal/siltstone stringers .25, Top of coal 382.15 coal 2.0 with siltstone/coal stringer interbeds as follows: .7 @ 365.1, .4 @ 365.95, .25 @ 381.9 with siltstone interbeds as follows: .9 @ 366.3	52.65	331.5	384.
Siltstone	Medium gray (N5) to medium dark gray (N4) slightly sandy in places with fossils as follows: 2.7 @ 390.8, 9.9 @ 399.9 with sandstone interbeds as follows: 4.8 @ 394.5 with coal seams as follows: Top of coal 409.3 coal .13, Top of coal 409.6 coal/siltstone stringers .75, with siltstone/coal stringers .2 @ 410.4	34.65	384.15	418
Sandstone	Very light gray (N8) to light gray (N7) fine to medium grained with siltstone cross bedding in places	79.1	418.8	497
Siltstone	Light gray (N7) to medium gray (N5) very sandy in places with sandstone lamina, carbonaceous	18.25	497.9	516
Coal	2.8 Coal, bright, hard, resinous	2.8	516.15	518
Siltstone	Medium gray (N5) to light gray (N7) slightly to very sandy with sandstone lamina, carboniferous	26.0	518.95	545
Sandstone	Very light gray (N8) to light gray (N7) fine to medium grained, carboniferous with siltstone cross bedding	13.75	545.0	558
Coal	0.2 Coal, bright, hard, resinous	3.77	558.75	562
	0.22 Coal/siltstone stringers			
	3.3 Coal, bright, hard, resinous			

3.77 Seam

Continued Page 4

Coal (Cont.)	0.02 Siltstone			
	0.03 Coal, bright, hard, resinous			
Siltstone	Medium dark gray (N4) slightly sandy	3.05	562.52	565.1
Coal	2.4 Coal, bright, hard, resinous	9.85 Seam	565.57	575.1
	1.35 Coal, taken for gas test			
	6.1 Coal, bright, hard, resinous			
Sandstone	Very light gray (N8) to light gray (N7) fine to medium grained with some siltstone cross bedding with some carboniferous partings with siltstone interbeds as follows: .4 @ 575.42, 1.6 @ 592.8	19.01	575.42	594.1
Coal	2.42 Coal, hard, black, resinous	2.46 Seam	594.43	596.1
	.04 Coal/siltstone stringers			
Sandstone	Very light gray (N8) fine to medium grained with some siltstone cross bedding slightly carbonaceous in places with carbonaceous partings, some pyrite with siltstone interbeds as follows: 2.9 @ 596.89 with fractures as follows: 4.8 @ 659.7	68.51	596.89	665.1
Siltstone	Light gray (N7) to medium light gray (N6) very sandy to slightly sandy, slightly carbonaceous with sandstone interbeds as follows: 1.1 @ 673.4	20.9	665.4	686.1
Sandstone	Very light gray (N8) to light gray (N7) very fine to medium grained with siltstone cross bedding, carbonaceous in places, with siltstone interbeds as follows: .6 @ 710.9	46.3	686.3	732.1
Siltstone	Light gray (N7) to medium gray (N5) slightly sandy to very sandy in places with sandstone lamina	64.6	732.6	797.1

CENTENNIAL PROJECT
DEADMAN CANYON



GENERALIZED SECTION, BLACKHAWK FORMATION
NOT TO SCALE



Underwriters Safety & Claims, Inc.
 P.O. Box 23790 Louisville, Kentucky 40223
 (502) 244-1343 Fax (502) 244-1411

BOND TRANSMITTAL



Richard Waddle
 Andalex Resources, Inc.

DATE
4/13/92slo

PRINCIPAL	BOND NUMBER	AMOUNT OF BOND
AMCA Coal Leasing, Inc.	SU 1515581	\$5000.00
OBLIGEE: U.S. Department of the Interior		

In accordance with your request we are attaching above bond.

Very Truly Yours,
BOND DEPARTMENT
 Underwriters Safety & Claims, Inc.

UTICA MUTUAL INSURANCE COMPANY

NEW HARTFORD, NEW YORK

137

No.

POWER OF ATTORNEY

Know all men by these Presents, the UTICA MUTUAL INSURANCE COMPANY, a New York Corporation, having its principal office in the Town of New Hartford, County of Oneida, State of New York, does hereby make, constitute and appoint
Bruce L. Ferguson, Bruce W. Ferguson, Scott C. Ferguson, Patricia S. Lee, Susan L. Osborn
Louisville, Kentucky

its true and lawful Attorney(s)-in-fact in their separate capacity if more than one is named above to make, execute, sign, seal and deliver for and on its behalf as surety and as its act and deed (without power of redelegation) any and all bonds and undertakings and other writings obligatory in the nature thereof (except bonds guaranteeing the payment of principal and interest of notes, mortgage bonds and mortgages) provided the amount of no one bond or undertaking exceeds Five hundred thousand & 00/100 Dollars (\$ 500,000.00).

The execution of such bonds and undertakings shall be as binding upon said UTICA MUTUAL INSURANCE COMPANY as fully and to all intents and purposes as if the same had been duly executed and acknowledged by its regularly elected officers at its Home Office in New Hartford, New York.

This Power of Attorney is granted under and by authority of the following resolution adopted by the Directors of the UTICA MUTUAL INSURANCE COMPANY on the 27th day of November, 1961.

"Resolved, that the President or any Vice-President, in conjunction with the Secretary or any Assistant Secretary, be and they are hereby authorized and empowered to appoint Attorneys-in-fact of the Company, in its name and as its acts, to execute and acknowledge for and on its behalf as Surety any and all bonds, recognizances, contracts of indemnity and all other writings obligatory in the nature thereof, with power to attach thereto the seal of the Company. Any such writings so executed by such Attorneys-in-fact shall be as binding upon the Company as if they had been duly acknowledged by the regularly elected Officers of the Company in their own proper persons.

"Now Therefore, the signatures of such officers and the seal of the Company may be affixed to any such Power of Attorney by a facsimile, and any such Power of Attorney bearing such facsimile signatures or seal shall be valid and binding upon the Company."

In Witness Whereof, the UTICA MUTUAL INSURANCE COMPANY has caused these presents to be signed by its Authorized Officers, this 21st day of January, 19 92.

UTICA MUTUAL INSURANCE COMPANY

George P. Wardley
Secretary



Wallace H. Watkins
President

STATE OF NEW YORK }
COUNTY OF ONEIDA } ss:

On this 21st day of January, 19 92, before me, a Notary Public in and for the State of New York, personally came WALLACE H. WATKINS and JOHN P. SULLIVAN to me known, who acknowledged execution of the preceding instrument and, being by me duly sworn, do depose and say, that they are President and Secretary respectively of UTICA MUTUAL INSURANCE COMPANY; and that the seal affixed to said instrument is the corporate seal of UTICA MUTUAL INSURANCE COMPANY; and that said corporate seal is affixed and their signatures subscribed to said instrument by authority and order of the Board of Directors of said Corporation.

In Testimony Whereof, I have hereunto set my hand at New Hartford, New York, the day and year first above written.

STATE OF NEW YORK }
COUNTY OF ONEIDA } ss:



Rosemary Wadae
Notary Public

I, Stephen J. Lorenz Assistant Secretary of the UTICA MUTUAL INSURANCE COMPANY do hereby certify that the foregoing is a true and correct copy of a Power of Attorney, executed by said UTICA MUTUAL INSURANCE COMPANY, which is still in full force and effect.

In Witness Whereof, I have hereunto set my hand and affixed the Seal of the said Corporation at New Hartford, New York, this 13th day of April, 19 92.

Stephen J. Lorenz
Assistant Secretary



State of Utah

DEPARTMENT OF NATURAL RESOURCES
DIVISION OF OIL, GAS AND MINING

Norman H. Bangarter
Governor
Dee C. Hansen
Executive Director
Dianne R. Nielson, Ph.D.
Division Director

355 West North Temple
3 Triad Center, Suite 350
Salt Lake City, Utah 84180-1203
801-538-5340

TO: Daron Haddock, Permit Supervisor
FROM: James D. Smith 
RE: Incidental Boundary Change, Andalex Resources, Inc., Centennial Mine, ACT/007/019, Folder #2, Carbon County, Utah

Andalex Resources, Inc. has submitted an amendment to the current Mining and Reclamation Plan for the Centennial Mine operation in Deadman Canyon. The amendment will add the lease referred to as the AEP lease, which is for the Centennial coal seam only, to the west edge of the permitted area.

A request for an Incidental Boundary Change (IBC) to the existing permit has also been submitted. The IBC covers a 30 acre east-west strip extending across the AEP lease from the west edge of the current permit area. The purpose of this IBC is to allow continuation of mining of a panel from the existing permit area into the AEP lease. Continuation of the panel is the logical and possibly the only economical way to mine this section of the AEP lease. Without the IBC the Centennial seam reserves within that 30 acre area may become unrecoverable.

CONCLUSIONS

Information submitted by Andalex indicates that within and adjacent to the proposed IBC:

1. There are no springs or seeps.
2. Surface drainages are ephemeral, responding only to rain or snowfall.
3. There are no water rights and no watering ponds or other surface facilities indicating water use.
4. Although the Centennial Mine is currently discharging 100,000 gallons of water per day, perched ground water intercepted while mining, previous mining in the AEP lease boundaries found conditions completely dry.
5. Rock overlying the Centennial seam is anticipated to

be a minimum of 500 feet thick and, based on experience at mines in the Wasatch Plateau and at the Centennial Mine itself, subsidence should create no effects at the surface.

6. If there are surface effects, they should be limited to shallow surface cracks in surface tensile zones that would quickly fill with sediments during runoff events and produce no significant impact on ephemeral stream flow.

7. Subsidence monitoring of active mining areas at the Centennial Mine has detected no movement at the surface to date.

8. Mining of this coal will produce no additional surface disturbance as access will be through existing portals. The total area involved in the IBC is less than 15% of the presently permitted area.

9. The proposed IBC will not involve operations existing beyond the Cumulative Impact Area (CIA), determined in the Cumulative Hydrologic Impact Assessment (CHIA) completed in December, 1990, nor in hydrologic basins other than those authorized in the approved permit.

RECOMMENDATION

DOG M should permit this IBC and allow Andalex to continue mining of the Centennial seam from the currently permitted area into this 30 acre strip of the AEP lease.



State of Utah

DEPARTMENT OF NATURAL RESOURCES
DIVISION OF OIL, GAS AND MINING

Norman H. Bangarter
Governor

Dee C. Hansen
Executive Director

Dianne R. Nielson, Ph.D.
Division Director

355 West North Temple
3 Triad Center, Suite 350
Salt Lake City, Utah 84180-1203
801-538-5340

TO: Daron Haddock, Permit Supervisor

FROM: Wayne H. Western, Reclamation Engineer *WHW*

DATE: September 16, 1992

RE: Incidental Boundary Change, Andalex Resources Inc., Centennial Mine, ACT/007/019, Folder #2, Carbon County, Utah

Applicant's Proposal:

The Applicant has proposed to make an incidental boundary change on Federal Lease UTU-69600. The change involves the addition of an area approximately 2,600 ft. by 700 ft. in the Centennial seam.

The Applicant states that mining the additional coal will not require any additional surface facilities or disturbances. Extraction of that coal is only possible if it is recovered as part of the current mining operation.

Technical Analysis:

The incidental boundary change will not involve any new surface facilities or disturbance. The area under consideration is bounded on two sides by areas that have been, or will be, mined on one side by the lease boundary, and unminable coal on the other.

The current mining method is room and pillar. Once development is completed pillar extraction will commence. Pillar extraction will result in some caving, which will destroy access to the proposed area. If the coal in the proposed area is not recovered as part of the current operation it will be lost.

Any surface effect that the extraction of the additional coal could have is minimal. It is possible that some subsidence could occur outside the lease areas. Off site subsidence damage is expected to be minor. No subsidence damage is expected to occur to any renewable resources, surface structures, the environment, or to human health or safety.

The proposal does not contain a commitment to mitigate any off site subsidence damage. A commitment to mitigate any off site subsidence damage must be included in the proposal.

Deficiencies:

1. The Applicant must commit to mitigate any damage off site resulting from subsidence.



United States Department of the Interior

BUREAU OF LAND MANAGEMENT

3400
U-69600
(U-066)

IN REPLY REFER TO:

Moab District
Price River Resource Area
900 North 700 East
Price, Utah 84501

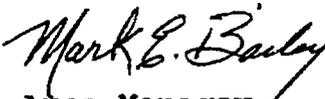
Michael W. Glasson
Andalex Resources, Inc.
Tower Division
P.O. Box 902
Price, Utah 84501

SEP - 9 1992

Dear Mr. Glasson:

This letter responds to your inquiry received in this office on September 3, 1992. We see no problems with the incidental boundary change. We have been assured by the coal office that there is little likelihood of surface expression of your mining.

We therefore have no comments and look forward to the Utah Department of Oil, Gas and Mining acting favorably on your request in the near future.

Sincerely yours,

Area Manager



United States
Department of
Agriculture

Soil
Conservation
Service

P.O. Box 11350
Salt Lake City, Utah 84147

September 23, 1992

Michael W. Glasson
ANDALEX Resources Inc.
P.O. Box 902
Price, Utah 84051

Dear Sir:

In response to your letter dated September 4, 1992, to George Cook, Range Conservationist, Utah, we are furnishing you the enclosed completed Form AD-1006.

There are no Important Farmlands (prime, unique, or statewide important) in the project area referred to in your letter as "Incidental Boundary Change", federal lease UTU-69600.

If we can be of further assistance, please call on us.

Sincerely,

FERRIS P. ALLGOOD
State Soil Scientist

Enclosure



0077019



United States Department of the Interior

FISH AND WILDLIFE SERVICE
FISH AND WILDLIFE ENHANCEMENT
UTAH STATE OFFICE
2078 ADMINISTRATION BUILDING
1745 WEST 1700 SOUTH
SALT LAKE CITY, UTAH 84104-5110



In Reply Refer To

FWE

September 16, 1992

Daron R. Haddock, Permit Supervisor
Utah Division of Oil, Gas & Mining
355 West North Temple
3 Triad Center, Suite 350
Salt Lake City, UT 84180-1203

RECEIVED

SEP 17 1992

DIVISION OF
OIL, GAS & MINING

Dear Mr. Haddock:

We have received your letter of September 10, 1992 concerning the proposed Incidental Boundary Change to extend underground mining at Andalex Resources' Centennial Mine.

The U.S. Fish and Wildlife Service (Service) advises that no listed or proposed threatened or endangered species are known to occur in the area of the proposed project. If the Utah Division of Wildlife Resources has determined that there will be no impacts to nesting raptors, as is indicated in the September 4, 1992, letter from Andalex Resources, then the Service has no further concerns regarding this project proposal.

If you have any questions please contact Susan Linner, Fish and Wildlife Biologist, at (801)524-5630.

Sincerely,

Robert D. Williams
Robert D. Williams
State Supervisor



Norman H. Bangertter
Governor
Max J. Evans
Director

300 Ho Grande
Salt Lake City, Utah 84101-1182
(801) 533-5755
FAX: (801) 364-6436

Department of Community & Economic Development
Division of State History
Utah State Historical Society

September 18, 1992

Michael W. Glasson
Senior Geologist
Andalex Resources, Inc.
P. O. Box 902
Price, Utah 84501

RE: Incidental Boundary Change, T13S, R10E, Section 1

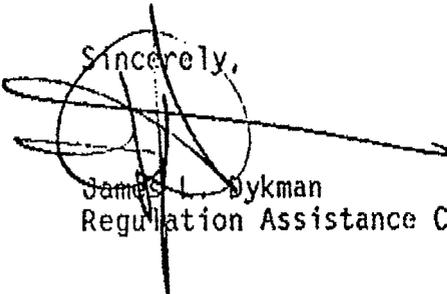
In Reply Please Refer to Case No. K439

Dear Mr. Glasson:

The Utah State Historic Preservation Office received the above referenced letter and map on September 9, 1992. It appears that most of the area that you are interested in has been surveyed with no sites located. Our office would recommend that the possibility of locating sites in the new project area is limited.

If you have questions or need additional assistance, please contact me at (801) 533-7039.

Sincerely,


James L. Dykman
Regulation Assistance Coordinator

JLD:K439 OR

AFFIDAVIT OF PUBLICATION

RECEIVED

SEP 21 1992

DIVISION OF
OIL GAS & MINING

STATE OF UTAH)
 ss.
County of Carbon,)

I, Dan Stockburger, on oath, say that I am the Publisher of the Sun Advocate, a twice-weekly newspaper of general circulation, published at Price, State and County aforesaid, and that a certain notice, a true copy of which is hereto attached, was published in the full issue of such newspaper for One (1) consecutive issues, and that the first publication was on the

17th day of September, 1992

and that the last publication of such notice was in the issue of such newspaper dated the

.....day of....., 19.....

Dan Stockburger

Subscribed and sworn to before me this

.....17th.....day of...September....., 1992

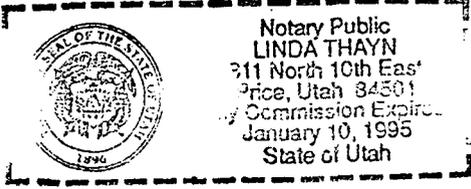
Linda Thayn
Notary Public

My Commission expires January 10, 1995

Residing at Price, Utah

Publication fee, \$ 11.20

PUBLIC NOTICE
Notice is hereby given that Andalex Resources, Inc., P.O. Box 902, Price, Utah 84501 has applied for an incidental boundary change to its existing, approved Mining and Reclamation Plan, ACT 007/019. The existing plan is approved under the permanent program of the Utah Department of Natural Resources, Division of Oil, Gas and Mining. This incidental boundary change involves the extension of existing underground workings, with no surface disturbance through a corridor in a portion of the southwest quarter of Section 1, T.13S., R.10E., SLM. The surface over this corridor is owned by the Bureau of Land Management and the coal is part of Andalex's federal coal lease UTU-69600. Comments should be addressed to the Utah Division of Oil, Gas & Mining, 355 West North Temple, 3 Triad Center, Suite 350, Salt Lake City, Utah 84180-1203.
Published in the Sun Advocate, September 17, 1992.





State of Utah

DEPARTMENT OF NATURAL RESOURCES
DIVISION OF OIL, GAS AND MINING

Norman H. Bangerter
Governor

Dee C. Hansen
Executive Director

Dianne R. Nielson, Ph.D.
Division Director

355 West North Temple
3 Triad Center, Suite 350
Salt Lake City, Utah 84180-1203
801-538-5340

September 22, 1992

TO: Daron R. Haddock, Permit Supervisor *DRH*

FROM: Joseph C. Helfrich, Regulatory Program Coordinator *JCH*

RE: Compliance Review for Section 510(c) Findings, Andalex Resources/
Tower Division, Pinnacle Mine, Portion of Federal Lease Addition,
ACT/007/019, Folder #5, Carbon County, Utah

As of the writing of this letter, there are no NOV's or CO's which are not corrected or in the process of being corrected pending verification from the Kentucky Department of Surface Mining. Therefore, it is recommended that the partial lease application be conditioned pending notification from the Kentucky Department of Surface Mining of no outstanding air or water quality violations.

Andalex Resources, Inc. does not have a demonstrated pattern of willful violations, nor have they been subject to any bond forfeitures for any operation in the state of Utah.

jbe
A:\510(C)

STATE: UT APPNO: ACT007019 SEQNO: 0 PAGE: 1
APPLICANT'S ENTITY ID: 123355
APPLICANT'S NAME : ANDALEX RESOURCES INC / TOWER DIVISION

SYSTEM RECOMMENDATION IS BASED ON ENTITY OFT

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* SYSTEM RECOMMENDATION            :        ISSUE            *
* PREVIOUS SYSTEM RECOMMENDATION:    ISSUE(920109)       *
* OSMRE RECOMMENDATION            :        ISSUE(920109)       *
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F2/PROCEED F3/QUIT F4/MAIN F6/REPORT F9/V.VIOL F10/V.OFT