

Real Estate

# Mineral Exploration and Extraction

Headquarters  
Department of the Army  
Washington, DC  
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**Unclassified**

# ***SUMMARY of CHANGE***

AR 405-30

Mineral Exploration and Extraction

Real Estate

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By Order of the Secretary of the Army:

JOHN A. WICKHAM, JR  
General, United States Army  
Chief of Staff

Official:

ROBERT M. JOYCE  
Major General, United States Army  
The Adjutant General

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**History.** Not applicable.

**Summary.** This regulation implements Department of Defense; Directive 4700.3. on

mineral exploration and extraction on Army-controlled lands.

**Applicability.** This regulation applies to the Active Army, US Army Reserve, Army National Guard, and elements dealing with Army civil works.

**Proponent and exception authority.** Not applicable.

**Impact on New Manning System.** This regulation does not contain information that affects the New Manning System.

**Army management control process.** Not applicable.

**Supplementation.** Supplementation of this regulation is prohibited without prior approval from HQDA(DAEN-REM), Wash DC 20314.

**Interim changes.** Interim changes to this

regulation are not official unless they are authenticated by the Adjutant General. Users will destroy interim changes on their expiration dates unless sooner superseded or rescinded.

**Suggested Improvements.** The proponent agency of this regulation is the Office the Chief of Engineers. Users are invited to send comments and suggested improvements on DA Form 2028 (Recommended Changes to Publications and Blank Forms) directly to HQDA(DAEN-REM), Wash DC 20314.

**Distribution.**

To be distributed in accordance with DA Form 12–9A requirements for AR, Real Estate. Active Army, C; ARNG, D; USAR, D.

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## 1. Purpose

This regulation assigns responsibilities and sets policies and procedures for mineral exploration and extraction on Army controlled lands.

## 2. References

### a. Required publications.

(1) AR 385–64 (Ammunition and Explosives Safety Standards). Cited in paragraph 6.

(2) AR 405–80 (Granting use of Real Estate). Cited in paragraphs 7, 8, and 10.

b. *Related publications.* (A related publication is merely a source of additional information. The user does not have to read it to understand this regulation.)

(1) AR 405–90 (Disposal of Real Estate).

(2) 43 CFR 3160 (On Shore Oil and Gas Order No. 1)

(3) DODD 4700.3 (Mineral Exploration and Extraction on DOD Lands.)

## 3. Explanation of abbreviations and terms

Abbreviations and special terms used in this regulation are explained in the glossary.

## 4. Responsibilities

a. The Assistant Secretary of the Army (Installations, Logistics, and Financial Management (ASA(IL&FM)) oversees the Army mineral exploration and extraction program and gives final approval of nonavailability determinations or refusals to consent.

b. The Chief of Engineers—

(1) Coordinates and approves availability determinations for mineral leasing on military lands, under ASA(IL&FM) guidance.

(2) Issues instructions for mineral leasing.

(3) Obtains Department of Defense Explosives Safety Board (DDESB) review and approval of plans for exploration or extraction involving ammunition or explosives contamination.

c. Major Army Commands (MACOMs) will—

(1) Review reports of availability for mineral leasing and exploration requests.

(2) Furnish available environmental and cultural information to the Bureau of Land Management (BLM) on request.

d. Division and district commanders will—

(1) Provide advice on mineral leasing.

(2) Prepare statements of availability with stipulations or justifications for nonavailability for mineral leasing and exploration requests for civil works property.

(3) Approve availability of civil works lands and grant consent for mineral leasing.

(4) Notify the BLM of the Army's determination on requests for mineral leasing and of available title information.

(5) Participate in BLM inspections on surface use of civil properties.

(6) Issue licenses or request BLM to issue permits for mineral explorations.

e. Military installation commanders will—

(1) Prepare ROA or justifications for nonavailability for mineral leasing and exploration requests.

(2) Furnish available environmental and cultural information, through channels, to the BLM on request.

## 5. Type and location of mineral

a. *Leasable minerals.* The mineral leasing statute for acquired lands authorizes the BLM to lease coal, phosphate, sodium, potassium, oil, oil shale, gas, or sulfur owned by the United States within acquired lands. The statute for public domain lands authorizes the BLM to lease coal, phosphate, sodium, oil, oil shale, native asphalt, solid or semisolid bitumen, and bituminous rock or gas owned by the United States within public domain lands. These authorities do not apply to Army-controlled property if the Army does not consent

to exploration or extraction, or if the minerals are within an incorporated city, town, or village, or in tidelands, or submerged lands in acquired lands.

b. *Geothermal resources.* The BLM may also issue leases for development, production, and use of geothermal resources on withdrawn public domain lands with the consent of the Army.

c. *Locatables.* Exploration or extraction of certain hard rock minerals known as locatable in not allowed, because it could lead to a land patent.

d. *Salesables.* These materials are disposed of under AR 405–90.

## 6. Availability of minerals

Under the multiple-use principle, lands will be made available for mineral exploration and extraction to the extent possible, consistent with military operations, national defense activities, and civil works activities.

a. *Exclusions and restrictions.* Exclusions of lands from exploration and extraction and any restrictions on exploration and extraction will be necessary, justified, and based on military or civil works considerations. (See app A.) For example, classified activities, contamination, and operational incompatibility may restrict or exclude leasing.

b. *Directional drilling.* A lease may cover oil and gas in a vast tract of land, although surface-disturbing activities are limited to a specified area. It is also possible, though expensive, to reach some oil and gas by directional drilling from a site off the installation. Since directional drilling involves no surface occupancy, it is normally impossible to justify withholding consent for leasing.

c. *Ammunition and explosives facilities.* (See AR 385–64.)

(1) Mineral exploration and drilling activities will be separated for ammunition and explosives operating and storage facilities by—

(a) Public traffic route explosives safety distances if no personnel will be occupying the site when the exploration or drilling is completed.

(b) Inhabited building explosives safety distances if personnel will occupy the site after exploration or drilling is completed.

(c) Public exclusion distances if toxic chemical agents or munitions are present.

Examples of exploration activities are seismic or other geophysical tests. Examples of drilling activities are those for exploration or extraction of oil, gas, and geothermal energy.

(2) Mining activities will be separated from ammunition and explosives operating and storage facilities by—

(a) Inhabited building explosives safety distances in most cases.

(b) Public exclusion distances if toxic chemical agents or munitions are present.

Examples of mining activities are strip, shaft, open pit, and placer mining, which normally require the presence of operating personnel.

d. *Contaminated lands.* (See AR 385–64.) Exploration, drilling, and mining are prohibited on the surface of explosives or toxic chemical agent contaminated lands. Exploration and extraction is permitted by—

(1) Directional (slant) drilling at a depth greater than 50 feet under the explosives contaminated land surface.

(2) Shaft mining at a depth greater than 100 feet under the contaminated surface.

e. *Nuclear or chemical surety mission.* Military installations with a nuclear or chemical surety mission will not normally be made available.

## 7. Oil and gas leasing

a. *Application.* The party desiring a lease may consult the appropriate division and district commander to identify acquisition tract numbers. However, the party must file an officer in the proper BLM State office to obtain a lease.

b. *BLM State office.* The BLM reviews the offer for sufficiency and requires the applicant to identify the installation and tracts in

the offer. If the BLM accepts the offer, it forwards the offer and a title information request to the affected installation.

*c. Installation.* The installation decides whether and under what conditions minerals may be made available. The installation prepares an ROA for military properties under AR 404–80, or an explanation for denying leasing. When completed, it is sent through the MACOM to HQDA(DAEN–ZCI), Wash DC 20310. The division or district commander prepares such data for civil properties and forwards justifications for nonavailability to HQDA(DAEN–REM), Wash DC 20314. The division or district commander determines if civil works property is available. An ROA or civil works availability statement must indicate conditions under which exploration and extraction could be allowed, because these conditions will become part of the lease. The ROA or civil works availability statement will identify any known significant resources that may affect the lessee’s exploration and extraction plans. The ROA will also include information per paragraph 3–6B of the Appendix to AR 385–64 on leasing close to ammunition and explosives facilities or land that is contaminated or suspected to be contaminated with explosives. Stipulations will be justified and will not duplicate the BLM regulations or standard lease terms. (See app A.) Because of the technical nature of oil and gas leasing, the installation should consult the BLM or the division or district commander in developing the ROA.

*d. Chief of Engineers.* DAEN–ZCI staffs and approves the ROA or justifications for nonavailability for military properties. DAEN–REM staffs and obtains DAEN–CWO approval for nonavailability of civil properties. DAEN–REM will obtain DDESP review and approval of plans for leasing close to ammunition and explosives facilities, or for leasing land that is contaminated or suspected or suspected to be contaminated with explosives. DDAEN–REM forwards any approved ROA to the division or district commander for action and recommends that ASA (IL&FM) withhold consent for other cases.

*e. The Secretariat.* ASA(IL&FM) will review justifications for nonavailability and decide whether to withhold consent for leasing. If consent is withheld, ASA(IL&FM) will return the action to HQDA(DAEN–REM) for forwarding it to the division or district commander.

*f. Division or district commander.* Division or district commanders will—

(1) Develop available title information for acquired lands and identify outstanding interests (e.g., easements) on withdrawn public domain land. The commander will indicate when Army title records are incomplete.

(2) Consent or inform the BLM of the decision to withhold consent for leasing. Consents will include required stipulation and available title information. The commander will request an opportunity to review the mineral lease before execution in the case of noncompetitive leasing or before the offer of the mineral interest for sale in the case of competitive leasing. The commander will require an opportunity to review new or changed stipulations in advance. The affected installation will take part in such a review.

*g. Leasing.* As the lead agency, the BLM will prepare necessary environmental and cultural documents before deciding to lease. BLM may consult the Army as cooperating agency for available environmental and cultural information. Then the BLM grants the lease, with the stipulations required by the Army, and furnishes a completed copy to the division or district commander or the installation commander who sends a copy to the division or district commander. The division or district commander will mark the installation map to identify mineral leases on the property.

## 8. Oil and gas lease operations

Where surface occupancy is allowed under a lease, a separate procedure, detailed in 43 CFR 3160, is followed to approve the lessee’s operations. The procedure is described generally below. Lessees must obtain prior approval for any surface disturbing activities.

*a. Advance action by lessees.* Before applying to the BLM for approval, the lessee may contact the installation for information to

develop a surface use program, which the installation will approve. The installation will provide available information on properties in, or eligible for, the National Register for Historic Places, threatened or endangered species, and critical habitats on the leased area.

*b. Drilling operations.*

(1) *Notice of staking (NOS).* The lessee may furnish the BLM and the installation an NOS before filing an Application for Permit to Drill (APD) to the BLM. The installation will review the NOS and determine if an additional license is needed for the lessee to work outside the leased area. If so, the installation will prepare an ROA in accordance with AR 405–80.

(2) *Applications for Permit to Drill (APD).* The lessee must file an APD with the BLM. The BLM will consult with the installation on the surface use of the program of the drilling plan in the APD.

(3) *Operations approval.* The installation will take part in the predrill inspection and promptly give the BLM any additional surface protection, safety, or reclamation stipulations. If plans not approved by DDESB involve exploration or extraction close to ammunition and explosives facilities, or on land that is contaminated or suspected to be contaminated with explosives, the installation must submit a proposal under paragraph 3–6B of the appendix to AR 385–64. Stipulations will relate directly to details of the proposed plan of operations, and each stipulation must be objectively justifiable, based on military or civil works considerations. The BLM will normally schedule the inspection within 15 days after receiving the NOS or APD. The BLM will include the added stipulations in the completed application before approval. At the same time, the installation should review the surface use program of the ADP for adequacy and advise the BLM of any needed changes. An adequate program is safe, protects the surface, and describes proper acceptable reclamation measures. (See app B.)

(4) *Subsequent operations approval.* Subsequent operations approval. Except in emergencies, the BLM must consult with the installation that must approve, in advance, a change not already approved in the APD for surface use due to new construction, reconstruction, or alterations. The installation will attend site inspections arranged by the BLM.

(5) *Lease extension.* The BLM must extend leases as long as oil and gas are produced in paying quantities.

(6) *Well abandonment.* The BLM will not approve final abandonment until the installation advises that it is satisfied with the reclamation work, as required by the APD or the approved abandonment notice. The BLM will consult with the installation. The installation may assume responsibility for a well with fresh water if funds are available to reimburse the lessee for recoverable casing and well-head equipment used only for the conversion to a water well. The lessee is still responsible to complete surface cleanup. Otherwise, the installation will advise the BLM of any further reclamation measures required.

*c. Cancellation.* Unlike most other leases, mineral leases convey more than a right to use and occupy property. They also convey a right to the property itself, i.e., all leased minerals in place and all that the lessee severs or extracts, unless such right is affected by a stipulation in the lease. Therefore, lease cancellation involves taking possibly valuable property rights where minerals are known to exist. BLM has established the following procedures for canceling or otherwise ending a lease:

(1) The Secretary of the Interior may cancel a lease after giving notice if the leased area contains valuable oil and gas deposits, and if after notice of noncompliance, the lessee or bona fide purchase of the lease interest continues to violate the mineral leasing statute, regulations, or provisions.

(2) The BLM may suspend a lease, i.e., temporarily discontinue the right to explore and extract oil and gas. Usually, the BLM extends the lease term for the suspension period. The Secretary of the Army or designee may also suspend lease operation under a lease stipulation (app A). Also, a lessee may give up a lease or any legal subdivision of a lease. Finally, the lease automatically terminates for nonpayment of rent under certain conditions, but may later be reinstated by the BLM.

## 9. Other mineral leases

As explained in paragraph 5, the BLM may grant leases for other types of minerals. Leases for these minerals are less frequent and procedures are usually more complicated. This regulation also applies to such leases. However, DAEN-REM will advise MACOMs on specific procedures on each case.

## 10. Permission to explore for minerals

In some cases, a party may request permission to conduct geophysical tests to explore for minerals before requesting a lease. Seismic testing is most common.

*a. Army licenses.* Usually the Army will grant permission in the form of a license. The affected installation will require a detailed operations plan from the interested party. The installation will prepare an ROA or similar data for civil works property with required stipulations and environmental and cultural information. The MACOM or its designee must approve an ROA for military property. The division or district commander will issue the license under AR 405-80. Licenses will prohibit extraction and require the operator to contact the installation before entry. The licensee must furnish a performance bond under BLM regulations and advise the BLM of its findings. These findings are the licensee's property, and they are confidential until disclosure of the findings does not adversely affect the competitive position of the licensee. The division or district commander will monitor license compliance.

*b. BLM permits.* In unusual circumstances, the BLM may be asked to issue a permit for exploration. Unusual circumstances include requests involving complex technology requiring the expertise of BLM, that may result in litigation, or to explore in Alaska. The affected military designee for approval. The division or district commander will ask the BLM to issue the permit. The BLM, as the lead agency, will insure compliance with the National Environmental Protection Act before issuing the permit. The affected installation will give available environmental and cultural information to the BLM or request. On completion of work, the permittee will advise the BLM and the installation of compliance with all permit requirements. The installation will advise the district commander and the BLM within 60 days if further restoration is required. The BLM will assist the installation and the district commander in monitoring license compliance.

## Appendix A Stipulations

### A-1. Stipulations

Mineral leases grant the right to operate in the leased area for mineral production. Stipulations are contract terms that restrict the lessee's right to operate. The authority to deny lessee operations must be established by lease stipulations.

### A-2. Drafting

To prevent challenges to lease, stipulations should be carefully written. They should be clear enough for the potential lessee to estimate the value of leasing. Stipulations should specify the reason for restricting operations and the land affected. For example, "The lessee may not operate in Tract A because it contains a critical wildlife habitat." Stipulations should also permit a waiver of the restriction if pertinent conditions change or if the lessee can operate without causing unacceptable effects. For example, "Operations on Tract B will not be approved, unless it is shown to the satisfaction of the installation commander that mineral operations will not interfere with training."

### A-3. Mandatory stipulations

All leases will contain the following stipulations:

*a.* The Secretary of the Army or designee reserves the right to require suspension of operations in a national emergency or if the Army needs the lease area for a mission that is not compatible with lease operations. Use of this right will have prior MACOM concurrence. On approval from higher authority, the installation commander for military property or the project manager for civil works property will give the lessee written notice, or when time permits, request the BLM to give notice of the requirement to suspend operations. Copies of this notice must be simultaneously provided to the MACOM; HQDA(DAEN-REM), Wash DC 20314; the appropriate district commander; the operator; and the BLM. The lessee and the operator agree to this condition and waive the right to compensation for its exercise. The lessee and the operator agree to this condition and waive the right to compensation for its exercise.

*b.* If the installation commander (military) or project manager (civil work) finds an imminent danger to safety or security, the installation commander or the project manager may order an immediate stop of such activities. The regional director of BLM; the MACOM; HQDA(DAEN-REM), Wash DC 20314; the appropriate district commander, and the lessee will be notified immediately. On receipt of the notice, the regional director will review the order and determine the need for other remedial action.

*c.* The operator will immediately stop work if contamination is found in the operating area and ask the installation commander for help.

### A-4. Necessity

Stipulations must be necessary.

*a.* Proposed stipulations that duplicate standard lease terms, published regulations, or published operating orders should be eliminated.

*b.* Stipulations that restrict economical extraction of a mineral should be included.

### A-5. Justification

Stipulations must be justified.

*a.* Proposed stipulations that restrict operations, because they are incompatible with resources, values, uses, or users elsewhere at no cost to the United States during the period of operations.

*b.* Installations should be prepared at all times to explain why the stipulations are required. Installations should similarly be prepared to show that less restrictive stipulations were considered but rejected as not promoting the national defense or not being in the public interest. This may be done by referring to mission statements, plans or similar materials, by separate explanation or by another reasonable method. Explanations should contain enough information on

surface resources, values, uses, and users to show which lands require the protection of a stipulation.

### A-6. Information notices

At the time of leasing, the installation may wish to give the lessee information that will not restrict lessee operations. This information might help the lessee write an acceptable plan of operations or clarify administrative matters. In such cases, the installation should recommend that the information be included in the lease as an information notice and not as a stipulation.

### A-7. BLM assistance

Installations are encouraged to consult the BLM or the division or district commander for help in drafting leasing stipulations.

## Appendix B Adequate Surface Use Program

The lessee will furnish information under guidelines to BLM. The installation must review the information to insure that the surface use program is safe, protects the surface, and describes acceptable reclamation measures.

### B-1. Existing access

Provide for maintenance of existing access roads per installation standards. (Use of any rail facilities, piers, and docks will also be addressed.)

### B-2. Other access

Give detailed information on construction or reconstruction of access roads.

### B-3. Wells

Locate all existing wells on a map or plat.

### B-4. Proposed construction

Locate existing and proposed production facilities and lines on a map or plat, with dimensions of proposed construction.

### B-5. Water supply

Describe in writing, or depict on a map or plat, the source of the water supply to be used in drilling and the method of transporting water from or across Federal or Indian lands.

### B-6. Construction materials

Describe in writing or depict on a map or plat the source of federally owned construction materials, such as sand, gravel, stone, and soil. BLM will approve use of construction materials on acquired lands for use off the installation, under existing disposal instructions.

### B-7. Disposal of waste material

Describe in writing, methods and locations for containment and disposal of waste, and plans for disposal of drilling fluids, oil, and water recovered during operations.

### B-8. Ancillary facilities

Describe in writing and depict on a map or plat the location, required land areas, and construction methods and standards for ancillary facilities.

### B-9. Site layout

Describe the well-site layout. Locate the drill pad, reserve and burn pits, access roads to the pad, turnaround areas, parking areas, living facilities, soil material stock piles, and the orientation of the rig on a plat. Furnish a cross-section diagram of the drill pad showing any cuts and fills. Describe plans to line the reserve pit.

### B-10. Reclamation

State plans for reclamation of the surface, with a time for commencement and completion.

## **Glossary**

### **Section I Abbreviations**

#### **APD**

Application for Permit to Drill

#### **BLM**

Bureau of Land Management

#### **CFR**

Code of Federal Regulations

#### **DDESB**

Department of Defense Explosive Safety Board

#### **DOD**

Department of Defense

#### **MACOM**

major Army command

#### **NOS**

notice of staking

#### **ASA(IL&FM)**

Assistant Secretary of the Army (Installations, Logistics, and Financial Management)

#### **ROA**

report of availability

### **Section II Terms**

#### **Abandonment**

Any process to reclaim or restore real estate under a plan approved by the BLM and the Army, where operations (including a dry hole) or production has occurred and has ceased.

#### **Acquired Lands**

Lands owned by the United States obtained by purchase, gift, or condemnation.

#### **Directional Drilling**

Drill from a point of the installation to reach oil or gas under the installation. Slant drilling.

#### **Geophysical testing**

A search for a mineral that involves a physical presence on the land, and testing may cause damage. Does not include core drilling for geological information or extraction of the mineral.

#### **Installation**

A military or civil works project.

#### **Leasables**

US-owned minerals, including oil and gas, subject to lease under the mineral leasing laws.

#### **Locatables**

US-owned minerals, including gold and silver, on public domain lands subject to discovery and claim. These are not leasable or saleable materials.

#### **Public domain**

Lands owned by the United States, administered by the Department of the Interior under public land laws.

#### **Salables**

US-owned materials, including sand, clay, and gravel.

#### **Seismic testing**

A procedure to gather evidence on the potential for oil and gas reservoirs by charting sound waves into the earth and back to the surface.

#### **Withdrawn public domain lands**

Public domain lands reserved for use by a US agency for a specific purpose.

### **Section III Special Abbreviations and Terms**

This section contains no entries.

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