DEPARTMENT OF THE INTERIOR

Bureau of Land Management

National Petroleum Reserve - Alaska, Oil and Gas Lease Sale 2006

AGENCY: Bureau of Land Management, Alaska State Office

ACTION: Detailed Statement of Sale

1. Authority.

The Bureau of Land Management (BLM) is issuing this detailed statement of sale under the authority of the Department of the Interior Appropriations Act (P.L. 96-514; the Naval Petroleum Reserves Production Act of 1976 (42 U.S.C. 6504 et seq.), as amended; the Federal Land Policy and Management Act of 1976, except that sections 202 and 603 do not apply (43 U.S.C. 1701 et. seq.), as amended; and the regulations in Title 43 of the Code of Federal Regulations (CFR) Part 3130. Pursuant to 43 CFR 3131.4-1(a), a Notice of Availability of this Detailed Statement must be published in the Federal Register at least 30 days prior to September 27, 2006, the scheduled date of sale.

The lands described in this statement are being offered for competitive oil and gas lease by sealed bid to the highest qualified bidder. The United States reserves the right to withdraw any tract from this sale prior to issuance of a written acceptance of a bid. Also reserved is the right to reject any and all bids received for any tract, regardless of the amount offered. Locator Maps and descriptions of tracts being offered are provided in the Exhibits of this Detailed Statement of Sale.

The tracts being offered in this sale are within the Northeast NPR-A Planning Area and the Northwest NPR-A Planning Area, and are subject to stipulations and required operating procedures established by each respective Record of Decision (ROD). These tracts are listed in Exhibits C, D, and E. Stipulations and Required Operating Procedures (ROPs) are in Exhibits F and G. Tracts affected by the site-specific K stipulations are identified in the tract descriptions in Exhibits C, D, and E by reference designation, such as “K-1(h)”.

2. Litigation Summary.

There are two pending lawsuits challenging BLM decisions to open the northeast portion of the NPR-A to oil and gas leasing: Wilderness Society, et al. v. Norton, et al., No. 1:98-02395 CV (D.D.C.) and National Audubon Society, et al. v. Norton, J05-088 CV (D. Alaska). Both cases have been fully briefed (the Wilderness Society case to the D.C. Federal District Court and the National Audubon case to the Alaska Federal District Court), and decisions on both cases are pending. Bidders are advised to check the status of these cases prior to submitting a bid on a subject parcel.

3. <u>Minimum Bid, Yearly Rental, and Royalty System</u>.

The lands described herein are offered for competitive oil and gas lease sale by sealed bid to the qualified bidder submitting the highest bonus bid in accordance with the statutory and regulatory authorities cited above. The minimum bid, yearly rental, and royalty rate that apply to this sale are specified below.

The minimum bid amount stated below is the minimum amount acceptable to be considered a valid bid. To ensure that the Government receives fair market value for the conveyance of lease rights in this sale, each tract receiving a bid will be evaluated to determine its fair market value. Any bid which does not meet or exceed the fair market value may be rejected.

Leases issued as a result of this sale will have primary terms of ten (10) years.

Variable	**High Potential Tracts**	**Low Potential Tracts**	**Tracts A thru G**
Tract Size	¼ township (± 5,760 acres)	½ township (± 11, 500 acres)	40,000 to 60,000 acres
Minimum Bid	$25.00 or more per acre or fraction thereof	$5.00 or more per acre or fraction thereof	$25.00 or more per acre or fraction thereof
Fixed Royalty Rate	16 2/3 percent	12 ½ percent	16 2/3 percent
Rental Rate	$5.00 per acre or fraction thereof	$3.00 per acre or fraction thereof	$3.00 per acre or fraction thereof

4. <u>Description of the Areas Offered for Bids</u>.

Land status data regarding tracts offered for lease may be found on the official plats available for review or sale at $1.10 each in the BLM Public Room located on the first floor of the Federal Building and Courthouse, 222 W. Seventh Avenue, #13, Anchorage, Alaska 99513-7599. These tracts are shown on the Locator Maps of Exhibit A and B and are described in detail in Exhibit C, D, and E of this Detailed Statement of Sale.

5. <u>Lease Terms and Stipulations</u>.

(a) Leases resulting from this sale will have initial terms of 10 years. A copy of the lease form is available as Exhibit N of this statement.

(b) The applicability of standard and special lease stipulations and required operating procedures are explained in Exhibits F for the Northeast and G for the Northwest. The standard

stipulations will become a part of all leases. The special stipulations affecting each tract are identified in the tract descriptions on Exhibits C, D, and E and will become a part of the leases for those tracts.

.

6. Acreage and Land Status.

The acreage shown above is only a general approximation. The acreage for each tract is shown on Exhibits C, D, and E. The successful bidders will be advised of any required adjustments (additional payments or refunds) to the advanced rental payments prior to lease issuance. High bonus bids will be based on the highest bid per tract, and will not be affected by such acreage adjustments. Tracts may be subject to encumbrances such as conveyances to Native Allottees, or by Air Navigation Sites or other surface ownership or uses which may restrict surface access. Responsibility for assessing the existence of, and importance of, encumbrances rests with bidders. An oil and gas lease does not in itself authorize any on-the-ground activity

7. Split Estate Parcels.

The lessee will be responsible for negotiating any surface use and access issues with the surface owner or managing surface agency for split-estate lands. For Native Allotments, the lessee must also obtain approval from the Bureau of Indian Affairs. If a bidder wants to review the land status of particular tracts prior to bidding, details for obtaining the pertinent status plats are found at paragraph 4.

For applicants bidding on tracts with no surface occupancy allowed, the lessee is responsible for making appropriate arrangements with the BLM and the adjacent lessee to obtain an easement for using an adjacent tract to establish a drilling pad. While the BLM has the sole authority to issue such an easement, coordination with the adjacent lessee is required to assure the easement does not materially interfere with that lessee's operations. The cost of the easement will be in addition to the costs of the bonus bid and rentals paid on the leased tract per 43 CFR 3131.4-1. The format of this lease sale utilizes a bidding system based upon bidding systems included in Section 205(a)(1)(H) of the Outer Continental Lands Act Amendments of 1978 (43 U.S.C.1801, et. seq.)

8. Filing of Bids.

Bidders must comply with the following requirements and all other provisions of applicable law. Times specified hereafter are Alaska Standard Time unless otherwise indicated.

(a) No bid will be accepted for less than an entire tract as described in Exhibits C, D, and E. For each tract bid upon, a bidder must submit a separate signed bid in a sealed envelope labeled "Sealed Bid for NPR-A Oil and Gas Lease Sale Tract No. 2006-(alpha-numeric designation or alpha-alpha, as appropriate i.e. 2006-H-000, 2006-L-000, or 2006-H-A)" for the Northeast or 2006-000 for the Northwest, not to be opened until 9 a.m., September 27, 2006 at the Wilda Marston Theater, located at the Loussac Library. The total amount bid must be in a

whole dollar amount (U.S. dollars); any cent amount above the whole dollar will be ignored by the BLM. Details of the information required on the bid(s) and the bid envelope(s) are specified in the document "Bid Form and Envelope" included as Exhibit I.

Each bid must be accompanied by a bid deposit of 1/5th the amount of the bonus bid amount in U.S. currency or by certified or cashier's check, bank draft, or certified check, payable to the Department of the Interior, Bureau of Land Management. This deposit will be forfeited if a bidder, after being determined the highest qualified bidder, fails to sign the lease or otherwise comply with applicable regulations.

Bidders submitting joint bids must state on the bid form (Exhibit K) the proportionate interest of each participating bidder, in percent to a maximum of five decimal places, e.g., 33.33333 percent. The BLM may require bidders to submit other documents in accordance with 43 CFR Part 3130 et. seq. The BLM warns bidders that they are bound by 18 U.S.C. 1860 which prohibits unlawful combination or intimidation of bidders. In accordance with 43 CFR 3132.5(b), "The United States reserves the right to reject any and all bids received for any tract, regardless of the amount offered."

Submission of a bid constitutes certification of compliance with the regulations found in 43 CFR 3130 et. seq. Per 43 CFR 3132.2(c), each bid shall be accompanied by a anyone seeking to acquire a Federal oil and gas lease may be required to submit additional information to show compliance with the regulations. A statement to this effect must be included on each bid (see the document "Bid Form and Envelope" contained in the Detailed Statement Package as Exhibit I).

(b) Sealed bids must be received by the Department of the Interior's BLM Alaska State Office, 222 West Seventh Avenue #13, Anchorage, Alaska 99513-7599, during normal business hours (8 a.m. to 3:45 p.m.) until the Bid Submission Deadline at 3:45 p.m., September 22, 2006. If bids are received later than the time and date specified above, they will be returned unopened to the bidders. Bidders may not modify or withdraw their bids unless the BLM receives a written modification or written withdrawal request prior to 3:45 p.m. September 22, 2006.

(c) Bid Opening Time will be 9:00 a.m., September 27, 2006, at the Wilda Marston Theater located at the Loussac Library. The opening of the bids is for the sole purpose of publicly announcing and recording the bids received, and no bids will be accepted or rejected at that time.

(d) Natural Disasters. In the event of a natural disaster or any other force majeure, the Alaska State Office may extend the bid submission deadline. Bidders may call (907) 271-5960 for information about the possible extension of the bid submission deadline due to such an event.

9. Deposit of Payment.

Any payments made in accordance with paragraph 8(b) will be deposited by the Government in a non-interest-bearing account during the period the bids are being considered. Such a deposit does not constitute and shall not be construed as acceptance of any bid on behalf of the United States.

10. Acceptance, Rejection, or Return of Bids.

No lease for any tract will be awarded to any bidder, unless, in addition to compliance with all procedures set forth at 43 CFR 3132.5:

(a) the bidder has complied with all requirements of this Detailed Statement of Sale, including the requirements listed on documents contained therein, and the applicable regulations;

(b) the bid is the highest valid bid; and

(c) the amount of the bid has been determined by the authorized officer to be at or above fair market value.

No bid will be considered for acceptance unless it provides for a bonus bid as specified in paragraph 3 above. Any bid submitted which does not conform to the requirements of this Detailed Statement of Sale, the laws and regulations cited in above, and other applicable regulations may be returned to the person submitting that bid by the BLM and not considered for acceptance.

11. Successful Bidders.

In addition to other conditions imposed by applicable law, the following requirements apply to successful bidders in this sale:

(a) Lease Issuance. The BLM will require each person who has submitted a bid accepted by the authorized officer to execute copies of lease Form AK-3130-1 (March 2002) shown as Exhibit N of this statement, pay the balance of the bonus bid along with the first year's annual rental for each lease issued in accordance with the requirements of 43 CFR 3132.3, and satisfy the bonding requirements of 43 CFR 3134.

(b) Who May Hold A Lease. In accordance with 43 CFR 3132.1, a lease issued may be held only by:

(1) Citizens and nationals of the United States;

(2) Aliens lawfully admitted for permanent residence in the United States as defined in 8 U.S.C. 1101(a)(20);

(3) Private, public or municipal corporations organized under the laws

of the United States or of any State or of the District of Columbia, the Commonwealth of Puerto Rico, the Virgin Islands, Guam, American Samoa, or any of its territories; or

(4) Associations of such citizens, nationals, resident aliens or private, public, or municipal corporations.

(c) Bonding Requirements. Pursuant to 43 CFR 3134 et. seq., prior to issuance of a lease, an individual lease surety or personal bond must be furnished to the Authorized Officer in the sum of $100,000 conditioned on compliance with all the lease terms and in accordance with the provisions of 43 CFR 3104.1, including rentals and royalties, and stipulations. An individual lease bond will not be required if a bidder already maintains or furnishes an NPR-A wide bond in the sum of $300,000 conditioned on compliance with the terms, conditions, and stipulations of all oil and gas leases held by the bidder within the NPR-A, or maintains or furnishes a nationwide bond as set forth in 43 CFR 3104(b) and furnishes a rider thereto sufficient to bring total coverage to $300,000 to cover the bidder's oil and gas leases within NPR-A. A copy of the bond form is included in the Detailed Statement of Sale Package as Exhibit L.

13. Supplemental Lease Terms.

Supplemental lease terms are identified on a document titled, "Supplemental Lease Terms" as Exhibit H. These supplemental lease terms will become part of all leases.

14. Information to Lessees.

1. The Northwest and Northeast Planning Area Records of Decision (RODs) established Required Operating Procedures (ROP's) for lands covered by the RODs. These are pre-application requirements, procedures, management practices, or design features that BLM has adopted as operational requirements. These requirements will be addressed through the permitting process. An oil and gas lease does not in itself authorize any on-the-ground activity. Seismic operations, drilling, ice road construction, pipeline construction, etc. require additional land use authorizations. Any applicant requesting such authorization will have to address the required operating procedures either before submitting the application (e.g., subsistence consultation, brant surveys) or as part of the application proposal (e.g., proposal states garbage will not be buried, or pipelines and roads will be separated by 500 ft or more). Requirements that are met prior to submission of the application, as well as procedures, practices, and design features that are an integral part of a proposal, do not need to be stipulated in a permit or lease. Because ROP's are operational requirements, not lease stipulations, their applicability goes beyond the oil and gas leasing to any permitted activity where the requirement is relevant.

The Authorized Officer (AO) may add more restrictive stipulations as determined necessary by further NEPA analysis and as developed through consultation with other federal, state, and NSB regulatory and resource agencies. Laws or regulations may require other federal, state, and NSB permits (e.g., Clean Water Act [CWA] Section 404) for an oil and gas project to proceed. Specific state permits are required when the state has authority, under federal or state law or regulation, to enforce the provision in question. Specific permits issued by federal agencies other

than BLM could include permit conditions that are more stringent than those identified in the ROD.

Appendix B of the respective RODs provides the Stipulations and ROPs for each planning area. A thorough discussion of ROPs is in each Appendix; we have provided the language contained therein as Exhibits F and G of this Detailed Statement of Sale.

2. On April 11, 2002, the Final Rulemaking was published in the Federal Register establishing the NPR-A regulations providing for unitization, lease suspensions, and subsurface storage agreements.

3. Energy Policy Act of 2005 On August 8, 2005, the Energy Policy Act of 2005 was signed into law. The Act allows lessees to extend NPR-A leases by virtue of drilling a well "capable" of producing in paying quantities, allows lessees to renew leases for a period of 10 years if there is an oil and gas discovery that is not capable of producing in paying quantities, and allows lessees to renew leases for a period of 10 years without a discovery for a fee of $100 per acre provided exploration has been pursued diligently. Prior to the Act being passed, leases in the NPR-A were issued for a period of 10 years and lessees could only extend the leases by actual production. The BLM has issued a proposed rulemaking to implement the change in lease terms mandated by the Act and the final regulations should be in effect by this time next year. The change in lease terms mandated by the Act will be applicable to all existing leases and all leases issued through this lease sale.

4. Conservation of Surface Values for Northwest and Northeast NPR-A Planning Area Lands

The lessee, his agents, contractors, subcontractors and operators (hereafter referred to as "Lessee") will operate within the resource management policy of the Bureau of Land Management (BLM). This policy is outlined in the National Petroleum Reserves Production Act of 1976 (NPRPA) (90 Stat. 303), as amended, and the Federal Land Policy and Management Act (40 U.S.C. 1701 et seq.) which states that " . . . public lands will be managed in a manner that will protect the quality of scientific, scenic, historical, ecological, environmental, air and atmospheric, water resources, and archeological values . . . that will provide food and habitat for fish and wildlife and domestic animals; and that will provide for outdoor recreation and human occupancy and use . . . " The Lessee will be required to protect these identified resource values and to operate in a manner which minimizes environmental impacts to physical, biological, cultural and aesthetic resources. Areas requiring special protection are identified by the Northeast National Petroleum Reserve-Alaska Final Integrated Activity Plan / Environmental Impact Statement and the related Record of Decision. In this regard, the NPRPA also provides "Any exploration within the Utukok River, the Teshekpuk Lake areas, and other areas designated by the Secretary of the Interior containing any significant subsistence, recreational, fish and wildlife, or historical or scenic value, shall be conducted in a manner which will assure the maximum protection of such surface values to the extent consistent with the requirements of this Act for the exploration of the reserve. (42 U.S.C. 6504(b)). These requirements apply to both exploration and production under this lease sale (42 U.S.C. 6508). Operational procedures

designed to protect resource values will be cooperatively developed during Surface Use Plan preparation, and additional protective measures may be required beyond the standard and special stipulations identified in the above-referenced documents.

Prior to entry upon the National Petroleum Reserve in Alaska (NPR-A) for purposes of conducting geophysical operations, the Lessee shall obtain a permit authorizing specific geophysical exploration activities from the BLM Northern Field Office. Such permit shall provide for conditions, restrictions, and prohibitions as the Authorized Officer deems necessary or appropriate to mitigate reasonably foreseeable and significant adverse effects upon the surface resources, including bonding for geophysical activities not covered by a lease bond, NPR-A-wide bond or Nationwide bond with NPR-A and geophysical exploration riders.

Lessee's activities are subject to all federally approved coastal zone plans and ordinances. A Lessee requesting a federal permit on the lease (e.g., an Application for Permit to Drill) must acquire a state consistency determination.

The Lessee shall comply with all federal laws and regulations, including rules and regulations of the Secretary of Health and Human Services, the Environmental Protection Agency, and state and local laws and codes governing the emission or discharge of pollutants from activities which are embraced in the lease permit. Surface disturbing activities may be prohibited during muddy and/or wet soil periods. This limitation does not apply to operations and maintenance of producing wells using authorized roads. During periods of adverse conditions due to climatic factors, all activities creating irreparable impacts may be suspended. The lessee is advised that during the conduct of all activities related to leases issued as a result of this lease sale, it will be subject to the 43 CFR 3130 and the 43 CFR 3160 regulations and to the provisions of the Onshore Oil and Gas Order No. 1. BLM will add such site specific stipulations derived from the Environmental Assessment / Environmental Impact Statement and the adjoining field examination, as necessary, to insure conservation of resource values. These will be in addition to stipulations attached to and made a part of each oil and gas lease.

5. Early Filing of APD Recommended

The Lessee, the Authorized Officer, and Northern District Office representatives should hold a conference at least one year prior to each specific drill site occupation to discuss pertinent stipulations, applicable regulations, other permits, and any research survey and/or analysis and report formats required of the Lessee to complete the APD or to be considered in the formulation of a drilling plan. Common practice dictates that Environmental Assessments / Environmental Impact Statements and staking must coincide with the snow-free season.

It is recommended that APDs be filed by early to mid-summer and at least six months prior to proposed commencement of drilling operations. This will aid BLM in completing necessary surface and environmental field inspections which can be completed only during the summer months. It will also provide the time required to gather site specific subsistence information and allow for analysis and coordination with other federal, state, and local entities. Early filing of an

APD will provide a greater likelihood of a timely decision.

6. Other Permits

The Lessee is responsible for obtaining all required federal, state, local, or private permits and authorizations prior to commencing any operations.

7. Gravel Extraction

The oil and gas lease does not entitle the Lessee to NPR-A gravel resources. Use of federal gravel resources must be in compliance with BLM regulations, which require, among other things, that a mineral material sale contract be obtained from the appropriate office (Northern District Office) for the purpose of gravel extraction and use. Use of sand and gravel from Congressionally approved Native Allotments must be arranged with the allottee and the Bureau of Indian Affairs. The Lessee is advised that gravel is basically a scarce commodity within the Reserve, so conservation of gravel is of utmost concern.

8. Equal Employment Opportunity

The Lessee is advised that, during the period of operations within NPR-A, the Lessee will ensure equal employment opportunity consistent with the authority contained in Section 10 of the Oil and Gas Lease Form.

15. Detailed Statement of Sale.

Copies of this statement and the individual Exhibits contained therein are available from the BLM Alaska State Office, either by written request or by telephone request at (907) 271-5960.

The following Exhibits are included in the statement and contain additional information essential for bidders. Bidders are expected to understand the information contained therein.

Exhibit A: Locator Map Northeast Area Tracts Offered

Exhibit A-1: Record of Decision Map 1

Exhibit A-1.1 Record of Decision Map 1 a

Exhibit B: Locator Map Northwest Area Tracts Offered (includes the NE/NW split tracts).

Exhibit B-1 Record of Decision Map

Exhibit C: Description of Northeast Planning Area Tracts Offered

Exhibit D: Description of Northwest Planning Area Tracts Offered

Exhibit E Description of split Northwest/Northeast Planning Areas Tracts Offered

Exhibit F: Appendix B of the NE Record of Decision with Stipulations and Required Operating Procedures

Exhibit G: Appendix B of the NW Record of Decision with Stipulations and Required Operating Procedures

Exhibit H: Supplemental Lease Terms

Exhibit I: Bid Form and Envelope

Exhibit J: Bidder Contact Form

Exhibit K: Oil and Gas Lease Bond Form 3000-4 (This form may be used for lease, statewide, nationwide, or NPR-A-wide bonds)

Exhibit L: Geophysical Exploration Rider Form for Use with NPR-A-wide bonds

Exhibit M: Lease Form AK-3130-1(March 2002)

EXHIBIT C
Northeast Planning Area
DESCRIPTION OF AREAS OFFERED

NOTE 1: All lands are based on the Umiat Meridian.

NOTE 2: With the exception of the tract-specific K stipulations listed below, all of the stipulations in Exhibit F are applicable to all lands to be leased within the Northeast Planning Area and the Northeast Planning Area portions of the Northwest / Northeast combined tracts, and will be attached to and made a part of each such lease.

NOTE 3: Tracts shown on the Sale Map and not listed below are those which were leased previously in Sale 991 and 2002 or are now unavailable.

NOTE 4: Tracts partially within the NW Planning Area and partially within the NE Planning Area are listed separately on Exhibit E.

NOTE 5: The acreage figures for tracts 2006-H-D and 2006-H-F have been changed from the K stipulations due to corrected acreage calculations.

AREA H (High Potential Area)Tracts A thru G

Tract #	Description (Township/Range/Sections) Special Stipulations, if applicable		Acres
2006-H-A	T16N, R7W	Sec 2-11, 14-21	59,134
	T16N, R8W	Sec 1-3, 10-15, 22-24, 26, 27, 34, 35	
	T17N, R7W	All	
	T17N, R8W	Sec 1-3, 10-15, 23-26, 35, 36	
	T18N, R7W	Sec 20, 21, 25-36	
	T18N, R8W	SEC 25-27, 34-36	
		Following the ocean side of the sandspits and islands forming the barrier reefs and extending across small lagoons from point to point K-2,K-3,K-4,K-5,K-6,K-9,K-11	

2006-H-B	T17N, R5W	Sec 3-10, 15-22, 27-30	49,250	
	T17N, R6W	Sec 1-30		
	T18N, R5W	Sec 8-10, 15-22, 27-34 Following the ocean side of the sandspits and islands forming the barrier reefs and extending across small lagoons from point to point		
	T18N, R6W	Sec 23-36 Following the ocean side of the sand spits and islands forming the barrier reefs and extending across small lagoons from point to point K-2,K-4,K-5,K-6,K-11		
2006-H-C	T17N, R4W	All		46,084
	T17N, R5W	Sec 1, 2, 11-14, 23-26, 35, 36		
	T18N, R4W	Sec 14, 15, 18-36 Following the ocean side of the sandspits and islands forming the barrier reefs and extending across small lagoons from point to point		
	T18N, R5W	Sec 11, 13, 14, 23-26, 35,36 Following the ocean side of the sandspits and islands forming the barrier reefs and extending across small lagoons from point to point K-2,K-4,K-5,K-6,K-11		
2006-H-D	T16N, R2W	Sec 1-6		54,540
	T16N, R3W	Sec 1-6		
	T17N, R2w	Sec 2-36 Following the ocean side of the sand spits and islands forming the barrier reefs and extending		

		across small lagoons from point to point	
	T17N, R3W	Sec 1-36 Following the ocean side of the sand spits and islands forming the barrier reefs and extending across small lagoons from point to point	
	T18N, R2W	Sec 31-33	
	T18N, R3W	Sec 19, 25-36	
		K-2,K-4,K-5,K-6,K-11	
2006-H-E	T15N, R5W	Sec 3-10, 15, 16 those sections bordering Teshepuk Lake extending only to the buffer for the shoreline	51,388
	T15N, R6W	Sec 1-3, 10-12, 14, 15 those sections bordering Teshepuk Lake extending only to the buffer for the shoreline	
	T16N, R5W	Sec 3-10, 15-22, 27-34	
	T16N, R6W	Sec 1-29, 34-36 those sections bordering Teshepuk Lake extending only to the buffer for the shoreline	
	T16N, R7W	Sec 1, 12, 13, 24 those sections bordering Teshepuk Lake extending only to the buffer for the shoreline	
	T17N, R5W	Sec 31-34	
	T17N, R6W	sec 31-36	
		K-2,K-3,K-4,K-5,K-11	
2006-H-F	T15N, R4W	Sec 1-36 those sections bordering Teshepuk Lake extending only to the buffer for the shoreline	56,276
	T15N, R5W	Sec 1, 2, 11-14, 23-25 those sections bordering	

		Teshepuk Lake extending only to the buffer for the shoreline	
	T16N, R4W	All	
	T16N, R5W	Sec 1, 2, 11-14, 23-26, 35, 36 K-2,K-3,K-4,K-5,K-9,K-10,K-11	
2006-H-G	T15N, R2W	Sec 5-8, 18-20, 28-30 Following the ocean side of the sandspits and islands forming the barrier reefs and extending across small lagoons from point to point	56,796
	T15N, R3W	All	
	T16N, R2W	Sec 7-11, 14-22, 27-33 Following the ocean side of the sandspits and islands forming the barrier reefs and extending across small lagoons from point to point	
	T16N, R3W	Sec 7-36 K-2,K-3,K-4,K-5,K-9,K-10,K-11	

AREA H (High Potential Area)
1/4 Township Tracts [5,760 (+/-) Acres]

Tract #	Description (Township/Range/Sections) Special Stipulations, if applicable		Acres
2006-H-004	T7N, R1E:	SW 1/4 K-1(f)	5,650
2006-H-006	T7N, R1E:	NW 1/4 K-1(f)	5,627
2006-H-012	T8N, R1E:	SW 1/4 K-1(f)	5,603
2006-H-015	T8N, R1W:	SE 1/4	5,756
2006-H-016	T8N, R1W:	SW 1/4	5,603

2006-H-102	T12N, R1E:	NE 1/4 K-6	5,756
2006-H-103	T12N, R1E:	NW 1/4 K-6	5,576
2006-H-128	T13N, R1W:	SW 1/4	5,744
2006-H-130	T13N, R1W:	NW 1/4 K-5	5,719
2006-H-131	T13N, R2W:	SE 1/4 K-5	5,756
2006-H-133	T13N, R2W:	NE 1/4 K-5	5,756
2006-H-144	T13N, R5W:	SW 1/4 K-5, 5-10	5,744
2006-H-145	T13N, R5W:	NE 1/4 those sections bordering Teshepuk Lake extending only to the buffer for the shoreline K-3,K-5,K-10	5,756
2006-H-146	T13N, R5W:	NW 1/4 those sections bordering Teshepuk Lake extending only to the buffer for the shoreline K-3,K-5,K-10	5,719
2006-H-150	T14N, R1W:	SW 1/4 K-5,K-6,K-10	5,695
2006-H-151	T14N, R1W:	Portion NE 1/4 (Sections 13-15, Portion of Sections 3, 10-12) Portion NW 1/4 (Sections 16-18, Portion of Sections 4-9) K-5,K-6,K-9,K-10	7,021

2006-H-152	T14N, R2W:	SE 1/4 K-5,K-6,K-10	5,756
2006-H-153	T14N, R2W:	SW 1/4 K-5,K-6,K-10	5,695
2006-H-154	T14N, R2W: T15N, R2W:	Portion NE 1/4 (Sections 10-15, Portion of Sections 1-3) Portion SE 1/4 (Portion of Sections 34-36) K-5,K-6,K-9,K-10	5,854
2006-H-155	T14N, R2W: T15N, R2W:	NW 1/4 Portion SW 1/4 (Sections 31-32, Portion of Section 33) K-5,K-6,K-9,K-10	7,237
2006-H-158	T14N, R3W	Sections 1-6, 9-12 K-2,K-4,K-5,K-6,K-9,K-10	6,370
2006-H-159	T14N, R3W	Sections 7, 8, 17-20, 29-32 K-2,K-4,K-5,K-9,K-10	6,285
2006-H-160	T14N, R4W	Sections 1-4, 9-15 those sections bordering Teshepuk Lake extending only to the buffer for the shoreline K-2,K-3,K-4,K-5,K-9,K-10	5,739
2006-H-161	T14N, R4W	Sections 22-27, 34-36 those sections bordering Teshepuk Lake extending only to the buffer for the shoreline K-3,K-4,K-5,K-9,K-10	5,390
2006-H-162	T14N, R4W	Sections 20, 21, 28-33, 36 those sections bordering	3,490

		Teshepuk Lake extending only to the buffer for the shoreline K-3,K-4,K-5,K-9,K-10	
2006-H-163	T16N, R8W	Sections 4-9, 16-18 K-2,K-4,K-5,K-9	5,577
2006-H-164	T16N, R8W	Sections 19-21, 28-33 those sections bordering Teshepuk Lake extending only to the buffer for the shoreline K-2,K-3,K-4,K-5,K-9	5,170
2006-H-165	T17N, R8W	Sections 9, 16, 20-22, 27-34, 36 K-2,K-4,K-5,K-6	5,989

AREA L (Low Potential Area)
1/2 Township Tracts [11,520(+/-) Acres]

Tract #	Description (Township/Range/Portion)	Special Stipulations, if applicable	Acres
2006-L-022	T1N, R4W:	S 1/2	11,500
2006-L-023	T1N, R4W:	N 1/2	11,477
2006-L-024	T1N, R5W:	S 1/2	11,500
2006-L-025	T1N, R5W:	N 1/2	11,477
2006-L-034	T2N, R3W:	S 1/2 K-1(a)(c)	7,147
2006-L-035	T2N, R3W:	N 1/2 K-1(a)(c)	7,313
2006-L-036	T2N, R4W:	S 1/2 K-1(c)(e)	11,454
2006-L-037	T2N, R4W:	N 1/2 K-1(a)(c)	12,291

2006-L-038	T2N, R5W:	S 1/2 K-1(a)(e)	11,454
2006-L-039	T2N, R5W:	N 1/2 K-1(a)(e)	11,431
2006-L-047	T3N, R2W:	N 1/2 K-1(a)(c)	12,192
2006-L-048	T3N, R3W:	S 1/2 K-1(a)(c)	12,023
2006-L-051	T3N, R4W:	N 1/2 K-1(a)(c)	8,727
2006-L-052	T3N, R5W:	S 1/2 K-1(e)	11,407
2006-L-053	T3N, R5W:	N 1/2 K-1(e)	11,385
2006-L-054	T3N, R6W:	S 1/2	11,407
2006-L-055	T3N, R6W:	N 1/2	11,385
2006-L-056	T3N, R7W:	S 1/2	11,407
2006-L-057	T3N, R7W:	N 1/2	11,385
2006-L-058	T3N, R8W:	S 1/2	11,408
2006-L-059	T3N, R8W:	N 1/2	11,385
2006-L-060	T3N, R9W:	S 1/2	11,408
2006-L-061	T3N, R9W:	N 1/2	11,385
2006-L-062	T3N, R10W:	S 1/2	11,408
2006-L-063	T3N, R10W:	N 1/2	11,385
2006-L-064	T3N, R11W:	S 1/2	11,408
2006-L-065	T3N, R11W:	N 1/2	11,386

2006-L-066	T3N, R12W:	Portion S 1/2 (Sections 21-28, 33-36)	7,675
2006-L-067	T3N, R12W: T4N, R12W:	Portion N 1/2 (Sections 1-2, 11-14) Portion S 1/2 (Sections 23-26, 35-36) K-1(b)	7,675
2006-L-072	T4N, R1W:	S 1/2 K-1(a)(c)	14,192
2006-L-073	T4N, R1W:	N 1/2 K-1(a)(c)	11,933
2006-L-077	T4N, R3W:	N 1/2 K-1(a)(c),K-2	10,992
2006-L-078	T4N, R4W:	S 1/2 K-1(e)	11,361
2006-L-079	T4N, R4W:	N 1/2 K-1(e)	11,338
2006-L-080	T4N, R5W:	S 1/2	11,361
2006-L-081	T4N, R5W:	N 1/2	11,338
2006-L-082	T4N, R6W:	S 1/2	11,361
2006-L-083	T4N, R6W:	N 1/2	11,338
2006-L-084	T4N, R7W:	S 1/2	11,361
2006-L-085	T4N, R7W:	N 1/2	11,338
2006-L-086	T4N, R8W:	S 1/2	11,361
2006-L-087	T4N, R8W:	N 1/2	11,338

2006-L-088	T4N, R9W:	S 1/2 K-2	11,362
2006-L-089	T4N, R9W:	N 1/2 K-2	11,338
2006-L-090	T4N, R10W:	S 1/2 K-2	11,362
2006-L-091	T4N, R10W:	N 1/2 K-2	11,338
2006-L-092	T4N, R11W:	S 1/2	11,362
2006-L-093	T4N, R11W: T4N, R12W:	Portion N 1/2 (Sections 1-4, 7-18) Portion N 1/2 (Section 13) K-1(b)	10,760
2006-L-101	T5N, R1W:	N 1/2 K-1(a)(c)	6,690
2006-L-102	T5N, R2W:	S 1/2 K-1(a)(c)	10,421
2006-L-103	T5N, R2W:	N 1/2	11,476
2006-L-104	T5N, R3W:	S 1/2 K-2	11,500
2006-L-105	T5N, R3W:	N 1/2 K-1(e)	11,476
2006-L-106	T5N, R4W:	S 1/2 K-1(e)	11,500
2006-L-107	T5N, R4W:	N 1/2 K-1(e)	11,476
2006-L-108	T5N, R5W:	S 1/2 K-2	11,500

2006-L-109	T5N, R5W:	N 1/2 K-2	11,476
2006-L-110	T5N, R6W:	S 1/2	11,500
2006-L-111	T5N, R6W:	N 1/2 K-2	11,476
2006-L-112	T5N, R7W:	S 1/2 K-2	11,500
2006-L-113	T5N, R7W:	N 1/2 K-2	11,476
2006-L-114	T5N, R8W:	S 1/2	11,500
2006-L-115	T5N, R8W:	N 1/2 K-2	11,476
2006-L-116	T5N, R9W:	S 1/2 K-2	11,500
2006-L-117	T5N, R9W:	N 1/2 K-2	11,477
2006-L-118	T5N, R10W:	S 1/2	11,500
2006-L-119	T5N, R10W:	N 1/2	11,477
2006-L-120	T5N, R11W:	Portion S 1/2 (Sections 23-26, 35-36) K-1(b)	3,838
2006-L-121	T5N, R11W:	NE 1/4 K-1(b)	5,756
2006-L-125	T6N, R1E:	N 1/2 K-1(a)(c)	5,426
2006-L-126	T6N, R1W:	S 1/2 K-1(a)(c)	11,453
2006-L-127	T6N, R1W:	N 1/2	11,429

2006-L-129	T6N, R2W:	N 1/2 K-2	11,429
2006-L-131	T6N, R3W:	N 1/2 K-1(e)	11,428
2006-L-132	T6N, R4W:	S 1/2 K-2	11,453
2006-L-135	T6N, R5W	S 1/2 K-1(d),K-2	11,428
2006-L-137	T6N, R6W	S 1/2 K-2	11,429
2006-L-138	T6N, R7W:	S 1/2 K-2	11,453
2006-L-140	T6N, R8W:	S 1/2 K-2	11,453
2006-L-142	T6N, R9W:	S 1/2	11,453
2006-L-144	T6N, R10W:	S 1/2	11,453
2006-L-146	T6N, R11W:	SE 1/4	5,756
2006-L-147	T6N, R11W:	Portion N 1/2 (Sections 1-2, 11-15) K-1(b),K-2	4,477
2006-L-148	T7N, R1W:	S 1/2 K-1(f)	11,406
2006-L-149	T7N, R1W:	N 1/2 K-1(f)	11,383
2006-L-150	T7N, R2W:	S 1/2	11,406
2006-L-151	T7N, R2W:	N 1/2 K-1(e)	11,383

2006-L-152	T7N, R3W:	S 1/2 K-1(e)	11,406
2006-L-153	T7N, R3W:	N 1/2 K-1(e)	11,382
2006-L-154	T7N, R4W:	S 1/2 K-2	11,405
2006-L-155	T7N, R4W:	N 1/2	11,382
2006-L-157	T7N, R5W:	N 1/2 K-1(f)	11,382
2006-L-158	T7N, R6W:	S 1/2 K-2	11,405
2006-L-159	T7N, R6W:	N 1/2 K-2	11,382
2006-L-160	T7N, R7W:	S 1/2 K-2	11,406
2006-L-161	T7N, R7W:	N 1/2 K-2	11,382
2006-L-162	T7N, R8W:	S 1/2 K-2	11,406
2006-L-163	T7N, R8W:	N 1/2 K-2	11,383
2006-L-165	T7N, R9W:	N 1/2 K-2	11,383
2006-L-167	T7N, R10W:	N 1/2 K-2	11,383
2006-L-168	T7N, R11W:	Portion S 1/2 (Sections 22-27, 35-36) K-1(b),K-2	5,117
2006-L-169	T7N, R11W:	Portion N 1/2	7,675

		(Sections 1-2, 11-14)	
	T8N, R11W:	Portion S 1/2 (Sections 23-26, 35-36) K-1(b)	
2006-L-170	T8N, R2W:	S 1/2 K-1(e)	11,358
2006-L-172	T8N, R3W:	S 1/2 K-2	11,358
2006-L-173	T8N, R3W:	N 1/2 K-2	11,335
2006-L-174	T8N, R4W:	S 1/2 K-1(d),K-2	11,358
2006-L-175	T8N, R4W:	N 1/2 K-1(d),K-2	11,335
2006-L-178	T8N, R6W:	S 1/2 K-2	11,358
2006-L-179	T8N, R6W:	N 1/2 K-2	11,335
2006-L-180	T8N, R7W:	S 1/2 K-2	11,358
2006-L-181	T8N, R7W:	N 1/2 K-2	11,335
2006-L-182	T8N, R8W:	S 1/2 K-2	11,359
2006-L-183	T8N, R8W:	N 1/2 K-2	11,335
2006-L-184	T8N, R9W:	S 1/2 K-2	11,359

2006-L-185	T8N, R9W:	N 1/2 K-2	11,335
2006-L-186	T8N, R10W:	S 1/2 K-2	11,359
2006-L-187	T8N, R10W:	N 1/2 K-2	11,335
2006-L-189	T8N, R11W:	Portion N 1/2 (Sections 1-3, 11-14) K-1(b	4,477
2006-L-190	T9N, R3W:	S 1/2 K-1(d)	11,499
2006-L-192	T9N, R4W:	S 1/2 K-2	11,499
2006-L-196	T9N, R6W:	S 1/2 K-2	11,499
2006-L-198	T9N, R7W:	S 1/2 K-2	11,500
2006-L-200	T9N, R8W:	S 1/2 K-2	11,500
2006-L-201	T9N, R8W:	N 1/2 K-2	11,476
2006-L-202	T9N, R9W:	S 1/2 K-2	11,500
2006-L-203	T9N, R9W:	N 1/2 K-2	11,476
2006-L-204	T9N, R10W: T9N, R11W:	S 1/2 Portion S 1/2 (Sections 24-26, 35-36) K-1(b),K-2	14,698
2006-L-205	T9N, R10W:	N 1/2	12,116

	T9N, R11W:	Portion N 1/2 (Section 13) K-1(b)	
2006-L-212	T10N, R6W:	S 1/2 K-2	11,451
2006-L-213	T10N, R6W:	N 1/2 K-2	11,427
2006-L-215	T10N, R7W:	N 1/2 K-2	11,427
2006-L-216	T10N, R8W:	S 1/2 K-2	11,452
2006-L-217	T10N, R8W:	N 1/2 K-2	11,427
2006-L-218	T10N, R9W:	S 1/2 K-2	11,452
2006-L-219	T10N, R9W:	N 1/2 K-2	11,428
2006-L-220	T10N, R10W:	S 1/2 K-2	11,452
2006-L-221	T10N, R10W:	N 1/2 K-2	11,428
2006-L-223	T10N, R11W:	Portion N 1/2 (Sections 1-5, 8-17) Portion S 1/2 (Sections 20-24) K-1(b),K-2	12,791
2006-L-226	T11N, R7W:	S 1/2 K-2	11,404
2006-L-227	T11N, R7W:	N 1/2 K-2	11,379

2006-L-228	T11N, R8W:	S 1/2 K-2	11,404
2006-L-229	T11N, R8W:	N 1/2 K-2	11,380
2006-L-230	T11N, R9W:	S 1/2 K-2	11,404
2006-L-231	T11N, R9W:	N 1/2 K-2	11,380
2006-L-232	T11N, R10W:	S 1/2 K-2	11,404
2006-L-233	T11N, R10W:	N 1/2 those sections Bordering Teshepuk Lake Extending only to the buffer for the shoreline K-3	11,380
2006-L-234	T11N, R11W:	Portion S 1/2 (Sections 20-29, 32-36) K-1(b),K-2	9,594
2006-L-235	T11N, R11W:	Portion N 1/2 (Sections 1-17) K-1(b),K-2	10,782
2006-L-238	T12N, R7W:	S 1/2 K-2,K-5	11,355
2006-L-240	T12N, R8W:	S 1/2 K-2,K-5	11,356
2006-L-241	T12N, R8W:	N 1/2 K-5	11,332
2006-L-242	T12N, R9W:	S 1/2 K-5	11,356
2006-L-243	T12N, R9W:	N 1/2 K-2,K-5	11,332

2006-L-244	T12N, R10W:	S 1/2 K-2,K-5	11,356
2006-L-245	T12N, R10W:	N 1/2 K-5	11,332
2006-L-246	T12N, R11W:	S 1/2 K-2	11,356
2006-L-247	T12N, R11W:	N 1/2 K-2,K-5	11,333
2006-L-250	T13N, R7W:	S 1/2 those sections those sections bordering Teshepuk Lake extending only to the buffer for the shoreline K-2,K-3,K-5,K-10	11,499
2006-L-252	T13N, R8W:	S 1/2 those sections bordering Teshepuk Lake extending only to the buffer for the shoreline K-2,K-3,K-5,K-10	11,499
2006-L-253	T13N, R8W:	N 1/2 those sections bordering Teshepuk Lake extending only to the buffer for the shoreline K-2,K-3,K-5,K-10	11,475
2006-L-254	T13N, R9W:	S 1/2 K-2,K-5,K-10	11,500
2006-L-255	T13N, R9W:	N 1/2 K-2,K-5,K-10	11,475
2006-L-256	T13N, R10W:	S 1/2 K-10	11,500
2006-L-257	T13N, R10W:	N 1/2 K-10	11,475

2006-L-258	T13N, R11W:	Portion S 1/2 (Sections 20-29, 32-36) K-1(b),K-5	9,594
2006-L-262	T14N, R9W:	S 1/2 those sections bordering Teshepuk Lake extending only to the buffer for the shoreline K-2,K-3,K-5,K-10	11,451

EXHIBIT D
Northwest Planning Area
DESCRIPTION OF AREAS OFFERED

NOTE 1: All lands are based on the Umiat Meridian.

NOTE 2: With the exception of the tract-specific K stipulations listed below, all of the stipulations listed in Exhibit G are applicable to all lands to be leased within the Northwest Planning Area and the Northwest Planning Area portions of the Northwest / Northeast combined tracts, and will be attached to and made a part of each such lease.

NOTE 3: Sequential tract numbers which are missing from the Sale Map are those which were deleted either because the lands they would have encompassed were combined into other adjacent tracts, because a decision was made not to offer those lands in this sale.

NOTE 4: Tracts shown on the locator map but not listed below were previously leased in the 2004 sale.

NOTE 5: All tracts in this sale are deemed low potential, and are generally 1/2 township [11,520(+/-) Acres] in size, although some variance exists due to water boundaries or tier acreage.

NOTE 6: Tracts partially within the NW Planning Area and partially within the NE Planning Area are listed separately on Exhibit E.

Tract #	Description (Township/Range/Meridian/Portion) Special Stipulations, if applicable		Acres
2006-001	T2S, R9W	S 1/2 K-1(h)	11,416
2006-002	T2S, R9W	N 1/2 K-1(h)	11,396
2006-003	T2S, R10W	S 1/2 K-1(h)	11,416
2006-004	T2S, R10W	N 1/2 K-1(h)	11,395

2006-005	T2S, R11W	S 1/2	11,416
2006-006	T2S, R11W	N 1/2 K-1(h)	11,396
2006-007	T1S, R6W	S 1/2	11,373
2006-008	T1S, R6W	N 1/2	11,350
2006-009	T1S, R7W	S 1/2	11,373
2006-010	T1S, R7W	N 1/2	11,350
2006-011	T1S, R8W	S 1/2	11,373
2006-012	T1S, R8W	N 1/2	11,350
2006-013	T1S, R9W	S 1/2	11,373
2006-014	T1S, R9W	N 1/2	11,350
2006-015	T1S, R10W	S 1/2 K-1(h)	11,373
2006-016	T1S, R10W	N 1/2	11,350
2006-017	T1S, R11W	S 1/2 K-1 (b)(g)(h)	11,373
2006-018	T1S, R11W	N 1/2 K-1(b)	11,351
2006-019	T1S, R12W	S 1/2 K-1(b)(g)(h)	11,373
2006-020	T1S, R12W	N 1/2 K-1(b)	11,351
2006-021	T1S, R13W	S 1/2	11,373
2006-022	T1S, R13W	N 1/2	11,350
2006-023	T1N, R6W	S 1/2	11,509
2006-024	T1N, R6W	N 1/2	11,486

2006-025	T1N, R7W	S 1/2	11,510
2006-026	T1N, R7W	N 1/2	11,487
2006-027	T1N, R8W	S 1/2	11,509
2006-028	T1N, R8W	N 1/2	11,486
2006-029	T1N, R9W	S 1/2	11,510
2006-030	T1N, R9W	N 1/2	11,487
2006-031	T1N, R10W	S 1/2	11,510
2006-032	T1N, R10W	N 1/2	11,487
2006-033	T1N, R11W	S 1/2	11,509
2006-034	T1N, R11W	N 1/2	11,486
2006-035	T1N, R12W	S 1/2 K-1(b)	11,510
2006-036	T1N, R12W	N 1/2 K-1(b)	11,487
2006-037	T1N, R13W	S 1/2	11,510
2006-038	T1N, R13W	N 1/2	11,486
2006-039	T2N, R6W	S 1/2	11,460
2006-040	T2N, R6W	N 1/2	11,440
2006-041	T2N, R7W	S 1/2	11,461
2006-042	T2N, R7W	N 1/2	11,440
2006-043	T2N, R8W	S 1/2	11,460
2006-044	T2N, R8W	N 1/2	11,440
2006-045	T2N, R9W	S 1/2	11,461
2006-046	T2N, R9W	N 1/2	11,440

2006-047	T2N, R10W	S 1/2	11,461
2006-049	T2N, R11W	S 1/2	11,460
2006-051	T2N, R12W	S 1/2 K-1(b)	11,461
2006-052	T2N, R12W	N 1/2 K-1(b)	11,440
2006-053	T2N, R13W	S 1/2	11,461
2006-054	T2N, R13W	N 1/2 K-1(b)	11,440
2006-055	T2N, R14W	S 1/2	11,460
2006-056	T2N, R14W	N 1/2	11,440
2006-057	T2N, R15W	S 1/2	11,461
2006-058	T2N, R15W	N 1/2 K-1(f)	11,440
2006-059	T2N, R16W	S 1/2 K-1(f)	11,461
2006-060	T2N, R16W	N 1/2 K-1(f)	11,440
2006-061	T3N, R13W	S 1/2 K-1(b)	11,417
2006-062	T3N, R13W	N 1/2 K-2	11,394
2006-063	T3N, R14W	S 1/2	11,417
2006-064	T3N, R14W	N 1/2 K-1(f)	11,394
2006-065	T3N, R15W	S 1/2 K-1(f)	11,417
2006-066	T3N, R15W	N 1/2 K-1(f)	11,394

2006-067	T3N, R16W	S 1/2	11,417
2006-068	T3N, R16W	N 1/2	11,394
2006-069	T3N, R17W	S 1/2	11,417
2006-070	T3N, R17W	N 1/2	11,394
2006-071	T3N, R18W	S 1/2	11,417
2006-072	T3N, R18W	N 1/2	11,394
2006-073	T3N, R19W	S 1/2	11,417
2006-074	T3N, R19W	N 1/2	11,394
2006-075	T3N, R20W	S 1/2	11,417
2006-076	T3N, R20W	N 1/2	11,394
2006-077	T3N, R21W	S 1/2 K-1(f)	11,417
2006-078	T3N, R21W	N 1/2	11,394
2006-079	T3N, R22W	S 1/2 K-1(k)	11,417
2006-080	T3N, R22W	N 1/2 K-1(k)	11,394
2006-081	T3N, R23W	S 1/2 K-1(k)	11,417
2006-082	T3N, R23W	N 1/2 K-1(k)	11,394
2006-083	T4N, R13W	S 1/2 K-2	11,368
2006-084	T4N, R13W	N 1/2 K-2	11,348
2006-085	T4N, R14W	S 1/2 K-1(f)	11,368

2006-086	T4N, R14W	N 1/2 K-1(f), K-2	11,347
2006-087	T4N, R15W	S 1/2 K-1(f)	11,368
2006-088	T4N, R15W	N 1/2	11,348
2006-089	T4N, R16W	S 1/2	11,368
2006-090	T4N, R16W	N 1/2	11,348
2006-091	T4N, R17W	S 1/2	11,368
2006-092	T4N, R17W	N 1/2	11,347
2006-093	T4N, R18W	S 1/2	11,368
2006-094	T4N, R18W	N 1/2	11,348
2006-102	T4N, R22W	N 1/2 K-1(k)	11,347
2006-103	T4N, R23W	S 1/2	11,368
2006-104	T4N, R24W	N 1/2	11,348
2006-105	T5N, R12W	S 1/2 K-1(b)	11,510
2006-106	T5N, R12W	N 1/2 K-1(b)	11,483
2006-107	T5N, R13W	S 1/2 K-1(f), K-2	11,510
2006-108	T5N, R13W	N 1/2 K-1(f)	11,484
2006-109	T5N, R14W	S 1/2 K-1(f), K-2	11,510
2006-110	T5N, R14W	N 1/2 K-1(f), K-2	11,483
2006-111	T5N, R15W	S 1/2	11,510

2006-112	T5N, R15W	N 1/2 K-1(e)	11,484
2006-113	T5N, R16W	S 1/2	11,510
2006-114	T5N, R16W	N 1/2	11,484
2006-115	T5N, R17W	S 1/2	11,510
2006-116	T5N, R17W	N 1/2	11,484
2006-122	T5N, R20W	N 1/2	11,483
2006-124	T5N, R21W	N 1/2 K-1(k)	11,483
2006-125	T5N, R22W	S 1/2 K-1(k)	11,510
2006-127	T5N, R23W	S 1/2	11,510
2006-128	T5N, R23W	N 1/2	11,483
2006-129	T5N, R24W	S 1/2 K-1(q)	11,510
2006-130	T5N, R24W	N 1/2 K-1(q)	11,484
2006-131	T6N, R12W	S 1/2 K-1(b), (f)	11,463
2006-132	T6N, R12W	N 1/2 K-1(b), (f)	11,436
2006-133	T6N, R13W	S 1/2 K-1(f)	11,463
2006-134	T6N, R13W	N 1/2 K-1(e), K-2	11,436
2006-135	T6N, R14W	S 1/2 K-1(e), K-2	11,463

2006-136	T6N, R14W	N 1/2 K-1(e), K-2	11,436
2006-137	T6N, R15W	S 1/2 K-1(e), K-2	11,463
2006-138	T6N, R15W	N 1/2 K-2	11,436
2006-139	T6N, R16W	S 1/2 K-2	11,463
2006-140	T6N, R16W	N 1/2 K-2	11,436
2006-141	T6N, R17W	S 1/2	11,463
2006-142	T6N, R17W	N 1/2	11,436
2006-143	T6N, R18W	S 1/2	11,463
2006-144	T6N, R18W	N 1/2	11,436
2006-145	T6N, R19W	S 1/2	11,463
2006-146	T6N, R19W	N 1/2	11,436
2006-147	T6N, R20W	S 1/2	11,463
2006-148	T6N, R20W	N 1/2	11,436
2006-149	T6N, R21W	S 1/2 K-1(k)	11,463
2006-150	T6N, R21W	N 1/2 K-1(k)	11,436
2006-153	T6N, R23W	S 1/2	11,463
2006-155	T6N, R24W	S 1/2 K-1(q)	11,463
2006-156	T6N, R24W	N 1/2 K-1(q)	11,436

2006-157	T7N, R12W	S 1/2 K-1(b), (f), K-2	11,416
2006-158	T7N, R12W	N 1/2 K-1(b), K-2	11,389
2006-159	T7N, R13W	S 1/2 K-1(e), K-2	11,416
2006-160	T7N, R13W	N 1/2 K-1(e), K-2	11,389
2006-161	T7N, R14W	S 1/2 K-1(e), K-2	11,416
2006-162	T7N, R14W	N 1/2 K-1(e)	11,389
2006-163	T7N, R15W	S 1/2 K-2	11,416
2006-164	T7N, R15W	N 1/2 K-2	11,389
2006-165	T7N, R16W	S 1/2 K-2	11,416
2006-166	T7N, R16W	N 1/2 K-2	11,389
2006-167	T7N, R17W	S 1/2	11,416
2006-168	T7N, R17W	N 1/2 K-1(i), K-2	11,389
2006-169	T7N, R18W	S 1/2	11,416
2006-170	T7N, R18W	N 1/2	11,389
2006-171	T7N, R19W	S 1/2	11,416
2006-172	T7N, R19W	N 1/2	11,389
2006-173	T7N, R20W	S 1/2	11,416
2006-174	T7N, R20W	N 1/2	11,389

2006-181	T7N, R24W	S 1/2 K-1(q)	11,416
2006-182	T7N, R24W	N 1/2	11,389
2006-183	T7N, R25W	S 1/2 K-1(q)	11,415
2006-184	T7N, R25W	N 1/2	11,389
2006-185	T8N, R12W	S 1/2 K-2	11,369
2006-186	T8N, R12W	N 1/2 K-1(b), K-2	11,342
2006-187	T8N, R13W	S 1/2 K-2	11,369
2006-188	T8N, R13W	N 1/2	11,342
2006-189	T8N, R14W	S 1/2 K-1(e), K-2	11,369
2006-190	T8N, R14W	N 1/2 K-1(e), K-2	11,342
2006-191	T8N, R15W	S 1/2 K-1(j), K-2	11,369
2006-192	T8N, R15W	N 1/2 K-2	11,342
2006-193	T8N, R16W	S 1/2 K-1(j), K-2	11,369
2006-194	T8N, R16W	N 1/2 K-1(j), K-2	11,342
2006-195	T8N, R17W	S 1/2 K-1(i)	11,369
2006-196	T8N, R17W	N 1/2 K-1(i), K-2	11,342

2006-197	T8N, R18W	S 1/2 K-1(l)	11,369
2006-198	T8N, R18W	N 1/2 K-1(l), K-2	11,342
2006-199	T8N, R19W	S 1/2	11,369
2006-200	T8N, R19W	N 1/2	11,342
2006-201	T8N, R20W	S 1/2	11,369
2006-202	T8N, R20W	N 1/2	11,342
2006-203	T8N, R21W	S 1/2 K-1(k)	11,369
2006-204	T8N, R21W	N 1/2 K-1(k)	11,342
2006-206	T8N, R22W	N 1/2	11,342
2006-208	T8N, R23W	N 1/2 K-1(m)	11,342
2006-211	T8N, R25W	S 1/2 K-2	11,369
2006-212	T8N, R25W	N 1/2 K-1(n), K-2	11,342
2006-213	T9N, R12W	S 1/2 K-2	11,510
2006-214	T9N, R12W	N 1/2 K-2	11,483
2006-215	T9N, R13W	S 1/2 K-1(e)	11,510
2006-216	T9N, R13W	N 1/2 K-1(e), K-2	11,483
2006-217	T9N, R14W	S 1/2 K-1(e), K-2	11,510

2006-218	T9N, R14W	N 1/2 K-1(e), K-2	11,483
2006-219	T9N, R15W	S 1/2 K-1(j), K-2	11,510
2006-220	T9N, R15W	N 1/2 K-2	11,483
2006-221	T9N, R16W	S 1/2 K-1(i)(j), K-2	11,510
2006-222	T9N R16W	N 1/2 K-1(i)(j), K-2	11,483
2006-223	T9N, R17W	S 1/2 K-2	11,510
2006-224	T9N, R17W	N 1/2 K-2	11,483
2006-225	T9N, R18W	S 1/2 K-2	11,510
2006-226	T9N, R18W	N 1/2 K-2	11,483
2006-227	T9N, R19W	S 1/2 K-1(l)	11,510
2006-228	T9N, R19W	N 1/2 K-1(l), K-2	11,483
2006-229	T9N, R20W	S 1/2 K-1(k)	11,510
2006-230	T9N, R20W	N 1/2 K-1(k), K-2	11,483
2006-231	T9N, R21W	S 1/2 K-1(k)	11,510
2006-232	T9N, R21W	N 1/2	11,483
2006-233	T9N, R22W	S 1/2 K-1(m)	11,510

2006-234	T9N, R22W	N 1/2 K-1(m)	11,483
2006-235	T9N, R23W	S 1/2 K-1(m)	11,510
2006-236	T9N, R23W	N 1/2 K-1(m)	11,483
2006-237	T9N, R24W	S 1/2	11,510
2006-238	T9N, R24W	N 1/2	11,483
2006-239	T9N, R25W	S 1/2	11,510
2006-240	T9N, R25W	N 1/2 K-2	11,483
2006-241	T10N, R13W	S 1/2 K-1(e), K-2	11,462
2006-242	T10N, R13W	N 1/2 K-1(e)	11,436
2006-243	T10N, R14W	S 1/2 K-2	11,462
2006-244	T10N, R14W	N 1/2 K-2	11,435
2006-245	T10N, R15W	S 1/2 K-2	11,462
2006-246	T10N, R15W	N 1/2	11,436
2006-247	T10N, R16W	S 1/2 K-1(i)	11,462
2006-248	T10N, R16W	N 1/2 K-1(i), K-2	11,436
2006-249	T10N, R17W	S 1/2 K-2	11,462
2006-250	T10N, R17W	N 1/2 K-2	11,435

2006-251	T10N, R18W	S 1/2 K-2	11,462
2006-252	T10N, R18W	N 1/2	11,436
2006-253	T11N, R13W	S 1/2 K-1(e), K-2	11,414
2006-254	T11N, R13W	N 1/2 K-1(e), K-2	11,388
2006-255	T11N, R14W	S 1/2 K-2	11,414
2006-256	T11N, R14W	N 1/2 K-2	11,387
2006-257	T11N, R15W	S 1/2 K-1(i), K-2	11,414
2006-258	T11N, R15W	N 1/2 K-1(i), K-2	11,388
2006-259	T11N, R16W	S 1/2 K-1(i), K-2	11,414
2006-260	T11N, R16W	N 1/2 K-1(i), K-2	11,388
2006-261	T11N, R17W	S 1/2 K-2	11,414
2006-262	T11N, R17W	N 1/2 K-2	11,387
2006-263	T11N, R18W	S 1/2 K-2	11,414
2006-264	T11N, R18W	N 1/2 K-2	11,388
2006-265	T12N, R13W	S 1/2 K-1(d), (e), K-2	11,364

2006-266	T12N, R13W	N 1/2 K-1(d), K-2	11,342
2006-267	T12N, R14W	S 1/2 K-2	11,363
2006-268	T12N, R14W	N 1/2 K-2	11,342
2006-269	T12N, R15W	S 1/2 K-1(i), K-2	11,364
2006-271	T12N, R16W	S 1/2 K-1(i), K-2	11,364
2006-272	T12N, R16W	N 1/2 K-1(i), K-2	11,342
2006-273	T12N, R17W	S 1/2 K-2	11,363
2006-274	T12N, R17W	N 1/2 K-2	11,342
2006-275	T12N, R18W	S 1/2 K-1(l), K-2	11,364
2006-276	T12N, R18W	N 1/2 K-1(l), K-2	11,342
2006-277	T12N, R19W	S 1/2 K-1(l), K-2	11,364
2006-278	T12N, R19W	N 1/2 K-1(l), K-2	11,342
2006-279	T12N, R20W	S 1/2 K-1(l)	11,364
2006-280	T12N, R20W	N 1/2 K-1(l)	11,343
2006-281	T12N, R21W	S 1/2 K-1(k)	11,363

2006-282	T12N, R21W	N 1/2 K-1(k), (l),	11,341
2006-283	T12N, R22W	S 1/2	11,364
2006-284	T12N, R22W	N 1/2 K-1(k), K-2	11,342
2006-285	T13N, R13W	S 1/2 K-2	11,508
2006-286	T13N, R13W	N 1/2 K-1(d), K-2	11,483
2006-291	T13N, R16W	S 1/2 K-2	11,507
2006-293	T13N, R17W	S 1/2 K-2	11,507
2006-294	T13N, R17W	N 1/2 K-2	11,483
2006-295	T13N, R18W	S 1/2 K-1(l), K-2	11,508
2006-296	T13N, R18W	N 1/2 K-2	11,483
2006-297	T13N, R19W	S 1/2 K-1(l), K-2	11,507
2006-298	T13N, R19W	N 1/2 K-1(l), K-2	11,483
2006-299	T13N, R20W	S 1/2 K-1(l)	11,508
2006-300	T13N, R20W	N 1/2 K-1(l)	11,483
2006-301	T13N, R21W	S 1/2 K-1(k)	11,507
2006-302	T13N, R21W	N 1/2 K-1(k), (l)	11,483

2006-303	T13N, R22W	S 1/2 K-1(n), K-2	11,507
2006-304	T13N, R22W	N 1/2 K-1(n), K-2	11,483
2006-318	T14N, R18W	N 1/2 K-1(k), K-2	11,437
2006-319	T14N, R19W	S 1/2 K-2	11,458
2006-320	T14N, R19W	N 1/2	11,437
2006-321	T14N, R20W	S 1/2	11,459
2006-322	T14N, R20W	N 1/2 K-1(k)	11,437
2006-323	T14N, R21W	S 1/2 K-1(l)(k)	11,458
2006-324	T14N, R21W	N 1/2 K-1(k)	11,437
2006-325	T14N, R22W	S 1/2 K-1(k)(n)	11,458
2006-326	T14N, R22W	N 1/2 K-1(k)	11,437
2006-327	T14N, R23W	S 1/2 K-1(n), (p)	11,459
2006-328	T14N, R23W	N 1/2 K-1(p)	11,437
2006-329	T14N, R24W	S 1/2 K-1(p)	11,458
2006-330	T14N, R24W	N 1/2	11,437
2006-339	T15N, R16W	S 1/2 K-1(i)	11,410

2006-341	T15N, R17W	S 1/2 K-1(k)	11,410
2006-342	T15N, R17W	N 1/2 K-1(k)	11,385
2006-343	T15N, R18W	S 1/2 K-1(k), K-2	11,410
2006-344	T15N, R18W	N 1/2 K-1(k)	11,386
2006-345	T15N, R19W	S 1/2 K-1(k)	11,410
2006-346	T15N, R19W	N 1/2 K-1(k)	11,385
2006-347	T15N, R20W	S 1/2 K-1(k)	11,410
2006-348	T15N, R20W	N 1/2 K-1(k)	11,386
2006-349	T15N, R21W	S 1/2 K-1(k)	11,410
2006-351	T15N, R22W	S 1/2 K-1(k), (p)	11,410
2006-353	T15N, R23W	S 1/2 K-1(p)	11,410
2006-355	T15N, R24W	S 1/2	11,410
2006-367	T16N, R17W	S 1/2 K-1(k), K-2	11,361
2006-368	T16N, R17W	N 1/2 K-1(k), K-2	11,336
2006-369	T16N, R18W	S 1/2 K-1(k)	11,361
2006-370	T16N, R18W	N 1/2 K-1(k)	11,337

2006-371	T16N, R19W	S 1/2 K-1(k)	11,361
2006-372	T16N, R19W	N 1/2	11,336
2006-373	T16N, R20W	S 1/2 K-1(k)	11,361
2006-374	T16N, R20W	N 1/2 K-1(o)	11,337
2006-376	T16N, R21W	N 1/2 K-1(o)	11,336
2006-378	T16N, R22W	N 1/2 K-1(o)	11,336
2006-380	T16N, R23W	N 1/2 K-2	11,337
2004-384	T17N, R10W	Section 18	11,336
	and	Those portions of Sections 6-8, 13-17 along the coast of Smith Bay lying south of a line delineated by the ocean side of the sandspits and islands forming the barrier reefs and extending across small lagoons from point to point, where such barrier reefs are not over three miles offshore. If the barrier reef is over three miles offshore the boundary shall be the highest highwater mark of the coast of the mainland.	
and	T18N,R10W	Those portions of Sections 6-7, 18-19, 30-31 along the coast of Smith Bay lying south of a line delineated by the ocean side of the sandspits and islands forming the barrier reefs and extending across small	

		lagoons from point to point, where such barrier reefs are not over three miles offshore. If the barrier reef is over three miles offshore the boundary shall be the highest highwater mark of the coast of the mainland. K-3, K-6	
2006-395	T17N, R16W	S 1/2 K-1(k), K-2, K-3, K-6	11,511
2006-396	T17N, R16W	N 1/2 K-1(k), K-3, K-6	11,483
2006-397	T17N, R17W	S 1/2 K-1(k)	11,510
2006-398	T17N, R17W	N 1/2 K-1(k)	11,483
2006-399	T17N, R18W	S 1/2 K-1(k), K-2	11,510
2006-401	T17N, R19W	S 1/2 K-1(o), K-2	11,510
2006-403	T17N, R20W	S 1/2 K-1(o)	11,510
2006-404	T17N, R20W	N 1/2 K-1(o)	11,483
2006-405	T17N, R21W	S 1/2	11,510
2006-406	T17N, R21W	N 1/2 K-1(r)	11,483
2006-407	T17N, R22W	S 1/2	11,510
2006-408	T17N, R22W	N 1/2	11,483
2006-409	T17N, R23W	S 1/2 K-2, K-6	11,510
2006-410	T17N, R23W	Sections 1, 10-17,	7,840

		and	
		Those portions of Sections 2-4, 7-9, 18 lying along the coast of the Chukchi Sea lying south of a line delineated by the ocean side of the sandspits and islands forming the barrier reefs and extending across small lagoons from point to point, where such barrier reefs are not over three miles offshore. If the barrier reef is over three miles offshore the boundary shall be the highest highwater mark of the coast of the mainland. K-6	
2006-413	T18N, R11W	S 1/2 K-3, K-6	11,458
2006-419	T18N, R14W	S 1/2 K-3, K-6	11,458
2006-420	T18N, R14W	N 1/2 K-3, K-6	11,433
2006-421	T18N, R15W	S 1/2 K-3	11,458
2006-422	T18N, R15W	N 1/2 K-3	11,433
2006-423	T18N, R16W	S 1/2 K-1(k), K-2, K-3, K-6	11,458
2006-424	T18N, R16W	N 1/2 K-3, K-6	11,433
2006-425	T18N, R17W	S 1/2 K-1(k), K-3, K-6	11,458
2006-433	T18N, R21W	S 1/2 K-1(r)	11,458
2006-435	T18N, R22W	Sections 13, 22-28, 32-36,	12,253

	and	Those portions of Sections 1, 11-12, 14-16, 20-21, 29-31 lying along the coast of the Chukchi Sea lying south of a line delineated by the ocean side of the sandspits and islands forming the barrier reefs and extending across small lagoons from point to point, where such barrier reefs are not over three miles offshore. If the barrier reef is over three miles offshore the boundary shall be the highest highwater mark of the coast of the mainland.	
and	T18N, R23W	Those portions of Sections 35-36 lying along the coast of the Chukchi Sea lying south of a line delineated by the ocean side of the sandspits and island forming the barrier reefs and extending across small lagoons from point to point, where such barrier reefs are not over three miles offshore. If the barrier reef is over three miles offshore the boundary shall be the highest highwater mark of the coast of the mainland. K-6	
2006-440	T19N, R12W	N 1/2 K-2, K-3, K-6	11,383
2006-441	T19N, R13W	S 1/2 K-2, K-3, K-6	11,408
2006-442	T19N, R13W	N 1/2 K-3, K-6	11,383
2006-443	T19N, R14W	S 1/2 K-3, K-6	11,408

2006-444	T19N, R14W	N 1/2 K-3, K-6	11,383
2006-445	T19N, R15W	S 1/2 K-3, K-6	11,408
2006-446	T19N, R15W	N 1/2 K-3, K-6	11,383
2006-454	T20N, R11W	Sections 18-20, 28-34	9,589
	and		
		Those portions of Sections 6-8, 16-17, 21-22, 26-27, 35-36 along the coast of the Beaufort Sea lying south of a line delineated by the ocean side of the sandspits and islands forming the barrier reefs and extending across small lagoons from point to point, where such barrier reefs are not over three miles off shore. If the barrier reef is over three miles offshore the boundary shall be the highest highwater mark of the coast of the mainland. K-3, K-6	
2006-455	T20N, R12W	S 1/2 K-3, K-6	11,358
2006-456	T20N, R12W	Sections 2-18	11,143
	and		
		That portion of Section 1 along the coast of the Beaufort Sea lying south of a line delineated by the ocean side of the sandspits and islands forming the barrier reefs and extending across small lagoons from point to point, where such barrier reefs are not over three miles offshore. If the barrier reef is over three	

		miles offshore the boundary shall be the highest highwater mark of the coast of the mainland. K-3, K-6	
2006-457	T20N, R13W	S 1/2 K-3, K-6	11,358
2006-458	T20N, R13W	N 1/2 K-3, K-6	11,333
2006-459	T20N, R14W	S 1/2 K-3, K-6	11,358
2006-460	T20N, R14W	N 1/2 K-3, K-6	11,333
2006-461	T20N, R15W	S 1/2 K-6	11,358
2006-462	T20N, R15W	N 1/1/2	11,333
2006-467	T21N, R12W	Sections 19, 28-34	8,135
	and		
		Those portions of Sections 17-18, 20-22, 26-27, 35-36, lying south of a line delineated by the highest highwater mark on the outer shore of the Plover Islands forming the groups and extending between the most adjacent points of these islands and the sandspits at either end.	
and	T21N, R11W	That portion of Section 31, lying south of a line delineated by the highest highwater mark on the outer shore of the Plover Islands forming the groups and extending between the most adjacent points of these islands and the sandspits at either end. K-3, K-6	

2006-468		T21N, R13W		S 1/2 K-3, K-6	11,508
2006-469		T21N, R13W		Sections 7, 16-18	5,806
			and	Those portions of Sections 5-6,8-11, 13-15, lying south of a line delineated by the highest highwater mark on the outer shore of the Plover Islands forming the groups and extending between the most adjacent points of these islands and the sandspits at either end.	
	and	T22N, R13W		That portion of Section 31, lying south of a line delineated by the highest highwater mark on the outer shore of the Plover Islands forming the groups and extending between the most adjacent points of these islands and the sandspits at either end. K-3, K-6	
2006-470		T21N, R14W		S 1/2 K-3, K-6	11,508
2006-471		T21N, R14W		N 1/2	16,857
	and	T22N, R14W		Sections 31-34	
			and	Those portions of Sections 19-20, 26-30, 35-36, lying south of a line delineated by the highest highwater mark on the outer shore of the Plover Islands forming the groups and extending between the most adjacent points of these islands and the sandspits at either end. K-3, K-6	

2006-472	T21N, R15W	S 1/2 K-6	11,508
2006-473	T21N, R15W	N 1/2 K-3, K-6	11,483
2006-474	T21N, R16W	S 1/2 K-3, K-6	11,508
2006-475	T21N, R16W	N 1/2 K-3, K-6	11,482
2006-476	T21N, R17W	S 1/2	11,508
2006-477	T21N, R17W	Sections 1-3, 9-17	7,680
2006-478	T21N, R18W and	Sections 5-8, 17-20, 25-30, 33-36 (all oil and gas); Sections 3-4, 9, 16, 21-24, all oil and gas excluding“ . . . that portion of the subsurface estate, if any, . . . capable of producing fluid hydrocarbons from the sandstone unit within the Kingak shale of Jurassic age, locally called the “Barrow gas sands”, and from the basal unconformity sand of Juro-Cretaceous age at or near the contact of the pebble shale “Cretaceous” on the Kingak shale. The Barrow gas sands are generally separated by a thin shale unit into two subunits referred to as the “lower Barrow gas sand” and the “upper Barrow gas sand.” The producing zone in the discovery well, South Barrow No. 2 located in Township 22 north, range 18 west, section 14, is identified on the Schlumberger electric logs of said well dated March 3, 1949, as follows: Basal sands at drill depths 2326’ to 2330’ and Barrow sands at drill depths 2340’ to 2388’.”, as	16,592

			specified in the September 22, 1983 agreement between the United States Department of the Interior and the North Slope Borough.	
2006-479		T21N, R19W	Sections 1-3, 9-16, 20-24, 29, 31-32;	14,827
			and	
			Those portions of Sections 4-5, 8, 17-19, 30 lying along the coast of the Chukchi Sea lying south of a line delineated by the ocean side of the sandspits and islands forming the barrier reefs and extending across small lagoons from point to point, where such barrier reefs are not over three miles offshore. If the barrier reef is over three miles offshore the boundary shall be the highest highwater mark of the coast of the mainland.	
	and	T21N, R20W	Those portions of Sections 25, 36 lying along the coast of the Chukchi Sea lying south of a line delineated by the ocean side of the sandspits and islands forming the barrier reefs and extending across small lagoons from point to point, where such barrier reefs are not over three miles offshore. If the barrier reef is over three miles offshore the boundary shall be the highest highwater mark of the coast of the mainland. K-6	
2006-480		T22N, R15W	Sections 19-21, 27-36,	9,982
			and	
			Those portions of Sections 22-23, 25-26, lying south of a	

		line delineated by the highest highwater mark on the outer shore of the Plover Islands forming the groups and extending between the most adjacent points of these islands and the sandspits at either end. K-3, K-6	
2004-481	T22N, R15W and	Sections 6-7, 17-18, Those portions of Sections 5, 8-9, 15-16, lying south of a line delineated by the highest highwater mark on the outer shore of the Plover Islands forming the groups and extending between the most adjacent points of these islands and the sandspits at either end. K-3, K-6	3,861
2006-482	T22N, R16W	Sections 1-15, 24,25, all oil and gas Sections 22-23, 26-27, 32-36, all oil anf gas excluding“ . . . that portion of the subsurface estate, if any, . . . capable of producing fluid hydrocarbons from the sandstone unit within the Kingak shale of Jurassic age, locally called the “Barrow gas sands”, and from the basal unconformity sand of Juro-Cretaceous age at or near the contact of the pebble shale “Cretaceous” on the Kingak shale. The Barrow gas sands are generally separated by a thin shale unit into two subunits referred to as the“lower Barrow gas sand” and the“upper Barrow gas sand.” The producing zone in the discovery well, South Barrow	17,458

		No. 2 located in Township 22 north, range 18 west, section 14, is identified on the Schlumberger electric logs of said well dated March 3, 1949, as follows: Basal sands at drill depths 2326' to 2330' and Barrow sands at drill depths 2340' to 2388'.", as specified in the September 22, 1983 agreement between the United States Department of the Interior and the North Slope Borough. K-3, K-6	
2006-483	T23N, R15W	Those portions of Sections30-32, lying south of a line delineated by the highest highwater mark on the outer shore of the Plover Islands forming the groups and extending between the most adjacent points of these islands and the sandspits at either end.	10,916
and	T23N, R16W and	Sections 19-20, 27-36, Those portions of Sections 7, 16-18, 21-23, 25-26, lying south of a line delineated by the highest highwater mark on the outer shore of the Plover Islands forming the groups and extending between the most adjacent points of these islands and the sandspits at either end. K-3, K-6	
2006-484	T23N, R17W	S 1/2 K-3, K-6	11,404
2004-485	T23N, R17W and	Sections 9, 13-18, Those portions of Sections	7,747

		3-5,7-8, 10-12, lying southwest of a line delineated by the highest highwater mark on the outer shore of the Plover Islands forming the groups and extending between the most adjacent points of these islands and the sandspits at either end; and southeast of a line along the coast of the Chukchi Sea delineated by the ocean side of the sandspits and islands forming the barrier reefs and extending across small lagoons from point to point, where such barrier reefs are not over three miles offshore. If the barrier reef is over three miles offshore the boundary shall be the highest highwater mark of the coast of the mainland.
and	T24N, R17W	Those portions of Sections 32-33, lying southwest of a line delineated by the highest highwater mark on the outer shore of the Plover Islands forming the groups and extending between the most adjacent points of these islands and the sandspits at either end to the northernmost point of land, and southeast of a line running from that northernmost point of land southwest along the coast of the Chukchi Sea as delineated by the ocean side of the sandspits and islands forming the barrier reefs and extending across small lagoons from point to point, where such barrier reefs are not over three miles offshore. If the barrier reef is over three

			miles offshore the boundary shall be the highest highwater mark of the coast of the mainland. K-3, K-6	
2006-486		T22N, R17W	Sections 1-12, 16-21, 28-30, 32-33 K-3, K-6	14,902
2006-487		T22N, R18W	Sections 1-5, 7-9, 16-20, 29-32,	16,746
		and	That portion of Section 6 lying along the coast of the Chukchi Sea lying south of a line delineated by the ocean side of the sandspits and islands forming the barrier reefs and extending across small lagoons from point to point, where such barrier reefs are not over three miles offshore. If the barrier reef is over three miles offshore the boundary shall be the highest highwater mark of the coast of the mainland.	
	and		Portions of U.S. Survey 4227, Lot 2, and U.S. Survey 4615 (situated within the boundaries of T22N,R19W).	
	and	T22N, R19W	Sections 24-26,35-36,	
		and	Section 12, Government lots 1 and 2, and portions of Sections 13-14, 22-23, 27,33-34 lying along the coast of the Chukchi Sea lying south of a line delineated by the ocean side of the sandspits and islands forming the barrier reefs and extending across small lagoons from point to point, where such barrier reefs are not over three miles offshore. If the barrier reef is over	

		three miles offshore the boundary shall be the highest highwater mark of the coast of the mainland. K-3, K-6	
2006-488	T23N, R18W	Section 12, Government Lot 1; Section 13, Government Lot 1; Section 24, Government Lot 1; Section 25, Government Lot 1; Section 32, Government Lot 1; Section 33, Government Lots 1 and 2; Section 34, Government Lot 1; Section 35, Government Lot 1; Section 36, Government Lots 1 and 2. K-3, K-6	3,288
2006-489	T2S,R12W	S 1/2 K-1(g)	11,419
2006-490	T2S,R12W	N 1/2 K-(g)	11,396
2006-491	T2S,R13W	S 1/2 K-1(g)	11,419
2006-492	T2S,R13W	N 1/2 K-1(g)	11,396
2006-493	T2S, R14W	S 1/2 K-1(g)	11,419
2006-494	T2S,R14W	N 1/2 K-1(g)	11,396
2006-495	T2S,R15W	S 1/2 K-1(g)	11,419
2006-496	T2S,R15W	N 1/2 K-1(g)	11,396

2006-497	T2S,R16W	S 1/2	11,419
2006-498	T2S,R16W	N 1/2 K-1(g)	11,396
2006-499	T2S,R17W	N 1/2	11,396
2006-500	T2S,R18W	N 1/2	11,396
2006-501	T2S,R19W	N 1/2	11,396
2006-502	T1S,R14W	S 1/2	11,374
2006-503	T1S,R14W	N 1/2	11,351
2006-504	T1S,R15W	S 1/2	11,374
2006-505	T1S,R15W	N 1/2	11,351
2006-506	T1S,R16W	S 1/2 K-1(g)	11,374
2006-507	T1S,R16W	N 1/2	11,351
2006-508	T1S,R17W	S 1/2 K-1(g)	11,374
2006-509	T1S,R17W	N 1/2 K-1(g)	11,351
2006-510	T1S,R18W	S 1/2 K-1(g)	11,374
2006-511	T1S,R18W	N 1/2 K-1(g)	11,351
2006-512	T1S,R19W	S 1/2 K-1(g)	11,374
2006-513	T1S,R19W	N 1/2 K-1(g)	11,351
2006-514	T1S,R20W	S 1/2 K-1(g)	11,374

2006-515	T1S,R20W	N 1/2 K-1(g)	11,351
2006-516	T1N,R14W	S 1/2	11,510
2006-517	T1N,R14W	N 1/2	11,487
2006-518	T1N,R15W	S 1/2	11,510
2006-519	T1N,R15W	N 1/2	11,487
2006-520	T1N,R16W	S 1/2	11,510
2006-521	T1N,R16W	N 1/2	11,487
2006-522	T1N,R17W	S 1/2	11,510
2006-523	T1N,R17W	N 1/2 K-1(f)	11,487
2006-524	T1N,R18W	S 1/2	11,510
2006-525	T1N,R18W	N 1/2 K-1(f)	11,487
2006-526	T1N,R19W	S 1/2	11,510
2006-527	T1N,R19W	N 1/2	11,487
2006-528	T1N,R20W	S 1/2	11,510
2006-529	T1N,R20W	N 1/2	11,487
2006-530	T1N,R21W	S 1/2	11,510
2006-531	T1N,R21W	N 1/2	11,487
2006-532	T1N,R22W	N 1/2	11,486
2006-533	T1N,R23W	N 1/2	11,486
2006-534	T2N,R17W	S 1/2 K-1(f)	11,464
2006-535	T2N,R17W	N 1/2	11,441

2006-536	T2N,R18W	S 1/2 K-1(f)	11,464
2006-537	T2N,R18W	N 1/2	11,441
2006-538	T2N,R19W	S 1/2 K-1(f)	11,464
2006-539	T2N,R19W	N 1/2 K-1(f)	11,441
2006-540	T2N,R20W	S 1/2 K-1(f)	11,464
2006-541	T2N,R20W	N 1/2 K-1(f)	11,441
2006-542	T2N,R21W	S 1/2	11,464
2006-543	T2N,R21W	N 1/2 K-1(f)	11,441
2006-544	T2N,R22W	S 1/2	11,464
2006-545	T2N,R22W	N 1/2 K-1(f)	11,441
2006-546	T2N,R23W	S 1/2	11,464
2006-547	T2N,R24W	N 1/2 K-1(k)	11,440
2006-548	T9N,R26W	S 1/2 K-1(q)	11,510
2006-549	T9N,R26W	N 1/2 K-1(q)	11,486
2006-550	T9N,R27W	S 1/2	11,510
2006-551	T9N,R27W	N 1/2 K-1(q)	11,486
2006-552	T10N,R19W	S 1/2 K-1(l)	11,461

2006-553	T10N,R19W	N 1/2 K-1(l)	11,437
2006-554	T10N,R20W	S 1/2 K-1(k)	11,461
2006-555	T10N,R20W	N 1/2 K-1(k)(l)	11,437
2006-556	T10N,R21W	S 1/2 K-1(k)	11,461
2006-557	T10N,R21W	N 1/2 K-1(k)(m)	11,437
2006-558	T10N,R22W	S 1/2 K-1(m)	11,461
2006-559	T10N,R22W	N 1/2 K-1(m)	11,437
2006-560	T10N,R23W	S 1/2	11,461
2006-561	T10N.R23W	N 1/2	11,437
2006-562	T10N,R24W	S 1/2 K-1(n)	11,461
2006-563	T10N,R24W	N 1/2 K-1(n)	11,437
2006-564	T10N,R25W	S 1/2 K-2	11,462
2006-565	T10N,R25W	N 1/2 K-1(n)	11,437
2006-566	T10N, R26W	S 1/2	11,462
2006-567	T10N,R26W	N 1/2	11,437
2006-568	T10N,R27W	S 1/2	11,462
2006-569	T10N,R27W	N 1/2	11,437
2006-570	T11N, R19W	S 1/2 K-1(l), K-2	11,413

2006-571	T11N,R19W	N 1/2 K-1(l), K-2	11,389
2006-572	T11N,R20W	S 1/2 K-1(k)(l), K-2	11,413
2006-573	T11N,R20W	N 1/2 K-1(k)(l)	11,389
2006-574	T11N,R21W	S 1/2 K-1(k)(m)	11,413
2006-575	T11N,R21W	N 1/2 K-1(k)(m)	11,389
2006-576	T11N,R22W	S 1/2	11,413
2006-577	T11N,R22W	N 1/2	11,389
2006-578	T11N,R23W	S 1/2	11,413
2006-579	T11N,R23W	N 1/2	11,389
2006-580	T11N,R24W	S 1/2	11,413
2006-581	T11N,R24W	N 1/2	11,389
2006-582	T11N,R25W	S 1/2 K-1(n)	11,413
2006-583	T11N,R25W	N 1/2 K-1(n)	11,389
2006-584	T11N,R26W	S 1/2	11,413
2006-585	T11N,R26W	N 1/2	11,389
2006-586	T11N,R27W	S 1/2	11,413
2006-587	T11N,R27W	N 1/2 K-2	11,389
2006-588	T12N,R23W	S 1/2	11,365

2006-589	T12N,R23W	N 1/2 K-1(n)	11,341
2006-590	T12N,R24W	S 1/2 K-1(n)	11,365
2006-591	T12N,R24W	N 1/2 K-1(n)	11,341
2006-592	T12N,R25W	S 1/2 K-1(n)	11,365
2006-593	T12N,R25W	N 1/2 K-1(n)	11,341
2006-594	T12N,R26W	S 1/2	11,365
2006-595	T12N,R26W	N 1/2	11,341
2006-596	T12N,R27W	S 1/2 K-2	11,365
2006-597	T12N,R27W	N 1/2 K-1	11,341

EXHIBIT E

DESCRIPTIONS FOR NPR-A TRACTS PARTIALLY WITHIN THE NORTHWEST AND PARTIALLY WITHIN THE NORTHEAST PLANNING AREAS

NOTE 1: These tracts are identified with "D" designators, signifying that each tract carries different stipulations for the NW planning area portion than it does for the NE planning area portion. The planning area boundary separating the two planning areas is the eastern bank of the Ikpikpuk River K-1(b), as described in the Final IAP/EIS for each planning area.

NOTE 2: With the exception of the tract-specific K stipulations listed below, all of the stipulations listed in Exhibits F and G are applicable to all lands to be leased within the Northeast and Northwest Planning Area portions of the Northwest / Northeast combined tracts, and will be attached to and made a part of each such lease.

NOTE 3: All lands are based on the Umiat Meridian

Tract #		Description (Township/Range/Portion) Special Stipulations		Acres
2004-D1		T 3 N, R 12 W	Sections 3-10, 15-20, 29-32 As to NE portion: K-1(b) As to NW portion: K-1(b)	11,290
2004-D2		T 4 N, R 11 W	Sections 5-6 As to NE portion: K-1(b) As to NW portion: K-1(b)	19,455
	and	T 4 N, R 12 W	Sections 1-12, 14-22, 27-34 As to NE portion: K-1(b) As to NW portion: K-1(b)	
2004-D3		T 5 N, R 11 W	Sections 4-9, 16-22, 27-34 As to NE portion: K-1(b) As to NW portion: K-1(b)	13,393
2004-D4		T 6 N, R 11 W	Sections 3-10, 16-21, 28-33 As to NE portion: K-1(b) As to NW portion: K-1(b)	12,659

2004-D5		T 7 N, R 11 W	Sections 3-10, 15-21, 28-34 As to NE portion: K-1(b) As to NW portion: K-1(b)	13,845
2004-D6		T 8 N, R 11 W	Sections 4-10, 15-22, 27-34 As to NE portion: K-1(b) As to NW portion: K-1(b)	14,391
2004-D7		T 9 N, R 11 W	Sections 14-23, 27-34 As to NE portion: K-1(b) As to NW portion: K-1(b)	11,499
2004-D8		T 9 N, R 11 W	Sections 1-12 As to NE portion: K-1(b) As to NW portion: K-1(b)	15,914
	and	T 10N, R 11W	Sections 19, 25-36 As to NE portion: K-1(b) As to NW portion: K-1(b)	
2004-D9		T 10 N, R 12 W	Sections 19-36 As to NE portion: K-1(b) As to NW portion: K-1(b)	11,462
2004-D10		T 10 N, R 11 W	Sections 6, 7, 18 As to NE portion: K-1(b) As to NW portion: K-1(b)	13,271
	and	T 10 N, R 12 W	Sections 1-18 As to NE portion: K-1(b) As to NW portion: K-1(b)	
2004-D11		T 11 N, R 11 W	Sections 19, 30-31 As to NE portion: K-1(b) As to NW portion: K-1(b)	13,226
	and	T 11 N, R 12 W	Sections 19-36 As to NE portion: K-1(b) As to NW portion: K-1(b)	
2004-D12		T 11 N, R 11 W	Section 18 As to NE portion: K-1(b) As to NW portion: K-1(b)	11,986
	and	T 11 N, R 12 W	Sections 1-18 As to NE portion: K-1(b)	

			As to NW portion: K-1(b)	
2004-D13		T 12 N, R 12 W	Sections 19-36 As to NE portion: K-1(b) As to NW portion: K-1(b)	11,364
2004-D14		T 12 N, R 12 W	Sections 1-18 As to NE portion: K-1(b) As to NW portion: K-1(b)	11,342
2004-D15		T 13 N, R 11 W	Sections 19, 30-31 As to NE portion: K-1(b), K5 As to NW portion: K-1(b)	13,415
	and	T 13 N, R 12 W	Sections 19-36 As to NE portion: K-1(b), K-5 As to NW portion: K-1(b)	
2004-D16		T 13 N, R 11 W	Sections 5-7, 18 As to NE portion: K-1(b), K-5 As to NW portion: K-1(b)	14,006
	and	T 13 N, R 12 W	Sections 1-18 As to NE portion: K-1(b), K-5 As to NW portion: K-1(b)	

APPENDIX B
STIPULATIONS AND REQUIRED OPERATING PROCEDURES

As discussed in Chapter 1 (Introduction) of the Final Amended IAP/EIS, a set of performance-based lease stipulations and ROPs were developed to protect natural and cultural resources in the Northwest National Petroleum Reserve-Alaska. Similar developed for this amendment, will result in a more consistent set of protective measures for both the Northwest and Northeast Planning Areas of the National Petroleum Reserve–Alaska. This mitigation will provide BLM greater flexibility to adapt management decisions to changing and uncertain environmental conditions on the ground. This mitigation differs from the prescriptive-based lease stipulations developed for the 1998 Northeast IAP/EIS (and which also apply to the No Action Alternative), in that they:

- Do not include actions that already exist in the form of regulation or law; and

- Provide the BLM and other land users, including industry, greater adaptability in protecting surface resources by emphasizing the intent or objective of the mitigation. This principle is often referred to as "Outcome-based Planning or Adaptive Management Concepts." These principles will help the BLM make decisions effectively by utilizing a rigorous combination of management, research, and monitoring so that credible information is gained and management activities can be modified, over time, based on continuous experience.

These performance-based lease stipulations and ROPs were developed to allow the BLM and industry greater adaptability to mitigate impacts when more information specific to individual projects becomes available. They are based on knowledge of the resources in the Planning Area and industry practices, and are consistent with existing policies and laws. The BLM developed these mitigations measures through the Final Amended IAP/EIS process and has eliminated the redundancy of requirements that already exist in the form of regulation or law. The lease stipulations and ROPs are requirements, procedures, management practices, or design features that the BLM, through the ROD, could adopt as operational requirements.

These requirements will be addressed through the permitting process. An oil and gas lease does not in itself authorize any on-the-ground activity. Seismic operations, drilling, ice road construction, pipeline construction, etc., require additional land use authorizations. Any applicant requesting such authorization will have to address the lease stipulations and ROPs either before submitting the application (e.g., for subsistence consultation, brant surveys) or as part of the application proposal (e.g., for a proposal stating that garbage will not be buried, or that pipelines and roads will be separated by 500 feet or more). Requirements that are met prior to submission of the application, and procedures, practices, and design features that are an integral part of a proposal, do not need to be stipulated in a permit or lease. Because mitigating ROPs will be identified in the ROD as operational requirements, and not as general lease stipulations, their applicability goes beyond the oil and gas lease to any permitted activity where the requirement is relevant.

The AO may add additional site-specific restrictions as deemed necessary by further NEPA analysis and as developed through consultation with other Federal, State, and NSB regulatory and resource agencies. Laws or regulations may require other Federal, State, and NSB permits (e.g., Clean Water Act Section 404) for an oil and gas project to proceed. Specific State permits may be required when the State has primary authority, under Federal or State law or regulation, to enforce the provision in question. Specific permits issued by Federal agencies other than the BLM could include permit conditions that are more stringent than those presented below.

Definitions

The following definitions in the context of this document, apply to general and site specific lease stipulations (K-Lease stipulations) and Required Operating Procedures (ROPs):

Active Floodplain: The lowland and relatively flat areas adjoining inland and coastal waters, including the flood-prone areas of offshore islands, composing, at a minimum, that area subject to a 1 percent or greater chance of flooding in any given year (also referred to as the 100-year or base floodplain).

Authorized Officer (AO): A position of authority for approval of various activities through delegation from the Secretary of the Interior. Currently, the designated AO in the State of Alaska for leasing, surface use, and permitting are 1) State Director, 2) Manager of the Northern Field Office in Fairbanks, and 3) Deputy State Director, Division of Energy and Solid Minerals.

Body of Water or Water body: A lake, river, stream, creek, or pond that holds water throughout the summer and supports a minimum of aquatic life.

Buffer: A zone extending outward or inward from the periphery of a "protected" feature for a specified distance. Activities and development may be prohibited or limited by type or time within the buffer dependent on the goal associated with applying the buffer.

Consultation: Consultation, as it is referenced in the lease stipulations, does not infer formal consultation as required under other legal mandates such as "Section 7 Consultation" under the ESA. Rather, consultation implies that the BLM or the Lessee/Permittee will contact other agencies or entities to either inform them of potential actions and/or to seek input on noted topics. This includes informal contacts, and written, electronic, and/or verbal communication.

Development Activities: Any activity associated with construction and operation of facilities or equipment post exploration.

Field: The term used to describe the area containing surface infrastructure above one or more subsurface reservoirs. In this sense, "field" is analogous to "a Unit participating area or collection of participating areas." The infrastructure in the field includes, but is not limited to, drilling and production pads, service roads, perhaps an airstrip, and processing and support facilities. Field infrastructure may be used in the development and production of several oil/gas accumulations in different subsurface reservoirs. Fields typically have a primary reservoir that supports initial development in addition to satellite reservoirs that are developed later and tie into the main facilities. Although oil and gas reservoirs may vary greatly in subsurface depth and other geologic characteristics, because they are located in the same geographic area it is more efficient to coordinate and share the necessary surface infrastructure. Fields may or may not be connected by permanent roads to adjacent fields or transportation facilities outside the field area.

In-field Roads: "In-field roads" are a component of the potential "footprint" of permanent oil and gas facilities. BLM defines "in-field roads" as gravel roads utilized by industry to conduct operational activities associated with development and production activities. The actual length/width and construction details of any gravel used for roads will be required as a component of any permit application for permanent facilities.

Lease Stipulation: Mitigation developed through BLM planning process/NEPA process that is specifically attached to any lease issued in the Northeast Planning Area.

No Surface Occupancy: No permanent oil and gas facilities will be allowed. Pipeline placement and construction will be the subject of a workshop prior to permitting.

Permanent Oil and Gas Facilities: Permanent Facilities include production facilities, pipelines, roads, airstrips, production pads, docks and other bottom-founded structures, seawater-treatment plants, and other structures associated with an oil and gas operation that occupy land for more than one winter season; also included are material sites such as sand and gravel. Exploration wellheads and seasonal facilities such as ice roads and ice pads are excluded, even when the pads are designed for use in successive winters. This definition does not include over-summering ice pads for exploration purposes.

Required Operating Procedure: Mitigation developed through the BLM planning process/NEPA process that is not attached to the oil and gas lease but is required, implemented and enforced at the operational level for all authorized (not just oil and gas) activities in the Planning Area.

Compliance with Required Operating Procedures: Required Operating Procedures were developed with various mechanisms in place to ensure compliance. These mechanisms include the following:

1) Some ROPs are pre-application requirements; therefore compliance will precede approval of the proposed activity. For example, ROP H-1 a. requires consultation with affected communities prior to submission of an application for relevant activities within the Northeast Planning Area. If consultation has not taken place, the application will be rejected or will be considered incomplete until such time that the consultation has occurred.
2) Other ROPs are required design features, and will have to be incorporated into the applicant's proposal. As an integral part of the proposal and the authorization, the requirement does not need to be stipulated to be enforceable. For example, a minimum pipeline height of 7 feet for above ground pipelines is a required design of any approved above ground pipeline (ROP E-7). Since the authorization (a ROW in this case) authorizes a pipeline with a minimum height of 7 feet, anything less (unless specifically approved through additional NEPA analysis and the permit) is not in compliance and enforcement actions may be taken even if the permit does not specify a minimum of 7 feet.
3) Other ROPs will become conditions of approval on post oil and gas lease land use authorizations and they will be enforceable. For example, ROP C-1 prohibits heavy equipment used for cross-country moves within ½ mile of occupied grizzly bear dens.

Site Specific Lease Stipulation (K-Stipulations): A mitigation measure developed through the BLM planning process/NEPA process attached only to leases issued within spatially defined areas in the Northeast Planning Area (See Map 1).

Temporary Platform: A facility that does not require the use of an ice or gravel pad to support oil and gas and related exploration activities. An example of a temporary platform recently used on the North Slope is Anadarko Petroleum's Arctic Drilling Platform used for the company's Hot Ice Project during the winters of 2003-2004. The facility consisted of a series of platform modules joined together and supported above the tundra surface on steel legs. Once the project was completed the platform was disassembled and the support legs were removed, leaving the tundra surface undisturbed.

The Permitting/Authorization and Exception Processes

Permitting/Authorization Process

The Required Operating Procedures identified in the following sections will not be attached as conditions of an oil and gas lease. The oil and gas lease is a binding agreement between BLM and the lessee that does not authorize subsequent surface disturbing activity. All surface disturbing activities such as exploratory drilling, road/pipeline construction, seismic acquisition, and overland moves require additional authorization(s) issued subsequent to leasing. This authorization or permitting process which includes permits, leases, and rights-of-way, is a multi-step process as follows:

- Pre-application consultation – The BLM meets and consults with the potential applicant and other affected parties prior to submission of any written application(s). At the time of the pre-application consultation, the applicant is informed of the BLM procedures and operating requirements, including any other Federal, State, or local permit requirements, so that any inadequacies and deficiencies in the verbal proposal can be addressed with the submittal of the application. Also, at this time, the BLM, the applicant and other affected parties may visit the proposed site to identify unknown issues.
- Applications associated with permanent facility construction relative to development, require that the Subsistence Advisory Panel (SAP), the Research and Monitoring Team (RMT), and/or its NSSI descendants, and affected North Slope Community members be given the necessary time to review and comment/and or recommend alternate standards prior to granting and exception.

- Review of Written Application for Completeness – Based on an initial review of the written application, additional information may be requested or application may be rejected.
- Evaluation of Application – An Interdisciplinary Team (ID) reviews the proposal to:

    1) Determine if the proposal complies with the outcome Objectives of the Lease stipulations and Required Operating Procedures; this may be accomplished by adhering to the recommended requirements/standards or by the use of new techniques/practices that meet the objectives.
    2) Based on additional analysis (e.g., NEPA EA or EIS), new mitigations may be identified based on site- and project-specific information including any new issues identified throughout this process.
    3) Identify appropriate levels of monitoring to determine the effectiveness of the mitigations.

- Issue authorization with appropriate terms and conditions of approval identified or attached.

Exception Process

The permitting process in conjunction with the greater flexibility afforded by the proposed performance-based lease stipulations and ROPs that are focused on resource management outcome/objectives, should result in the need for few, if any, exceptions. BLM anticipates however, there will remain a need to consider exceptions and/or modifications on a case-by-case basis. The following guidelines will be used for considering and granting exceptions to the proposed lease stipulations or ROPs.

In the event that an exception to a lease stipulation or ROP is requested, and before an exception may be granted, the lessee/permittee shall demonstrate to the satisfaction of the AO that:

1. a) implementation of the lease stipulation or ROP is technically not feasible, or
   b) implementation of the lease stipulation or ROP is economically prohibitive, or
   c) there is an environmentally preferable alternative available, and
2. the alternative proposed by the lessee/permittee fully satisfies the objective(s) of the lease lease stipulation or ROP.

The lessee/permittee shall notify the AO in a timely manner that an exception is going to be requested. In demonstrating to the AO that the alternative proposal meets the above criteria, the lessee/permittee shall provide sufficient documentation (technical reports, new/revised procedures, results of scientific research, etc.) to allow for a thorough review and evaluation of the proposal.

Before the consideration or granting of an exception to a ROP, consultation requirements must be met. Except in the case of an emergency, the AO shall consult with the appropriate Federal, State, and NSB regulatory and resource agencies before an exception may be granted. The AO's power to grant exceptions to a ROP is limited to those subjects, uses, and permits over which the BLM has authority. Exceptions may be granted in emergencies involving human health and safety.

Exceptions associated with permanent facility construction associated with development, require that the SAP, the RMT, and/or its NSSI descendants, and affected North Slope Community members be given the necessary time to review (up to 45 days) and comment/and or recommend alternate standards prior to granting and exception.

The BLM may initiate an exception to a ROP when information (technical reports, new/revised procedures, results of scientific research, etc.) becomes available that demonstrates the alternative proposal satisfies the objective of the ROP and meets the management objectives for the area in which the alternative is proposed. Before granting an exception (other than those granted for emergencies), whether proposed by the lessee/permittee or the BLM, the action shall undergo appropriate NEPA review.

Lease Stipulations and Required Operating Procedures

A. Waste Prevention, Handling, Disposal, Spills, and Public Safety

A-1 Required Operating Procedure
Objective: Protect the health and safety of oil field workers and the general public by avoiding the disposal of solid waste and garbage near areas of human activity.
Requirement/Standard: Areas of operation shall be left clean of all debris.

A-2 Required Operating Procedure
Objective: Minimize impacts on the environment from non-hazardous waste generation. Encourage continuous environmental improvement. Protect the health and safety of oil field

workers and the general public. Avoid human-caused changes in predator populations. Requirement/Standard: Lessees/permitees shall prepare and implement a comprehensive waste management plan for all phases of exploration and development, including seismic activities. The plan shall be submitted to the AO for approval, in consultation with Federal, State, and NSB regulatory and resource agencies, as appropriate (based on agency legal authority and jurisdictional responsibility), as part of a plan of operations or other similar permit application. Management decisions affecting waste generation shall be addressed in the following order of priority: 1) Prevention and reduction, 2) Recycling, 3) Treatment, and 4) Disposal. The plan shall consider and take into account the following requirements:

a. Methods to avoid attracting wildlife to food and garbage. All feasible precautions shall be taken to avoid attracting wildlife to food and garbage. (A list of approved precautions, specific to the type of permitted use, can be obtained from the AO.)
b. Disposal of putrescible waste. Requirements prohibit the burial of garbage. Lessees and permitted users shall have a written procedure to ensure that the handling and disposal of putrescible waste will be accomplished in a manner that prevents the attraction of wildlife. All putrescible waste shall be incinerated, backhauled, or composted in a manner approved by the AO. All solid waste, including incinerator ash, shall be disposed of in an approved waste-disposal facility in accordance with U.S. Environmental Protection Agency (USEPA) and Alaska Department of Environmental Conservation (ADEC) regulations and procedures. The burial of human waste is prohibited except as authorized by the AO.
c. Disposal of pumpable waste products. Except as specifically provided, the BLM requires that all pumpable solid, liquid, and sludge waste be disposed of by injection in accordance with USEPA, ADEC, and the Alaska Oil and Gas Conservation Commission (AOGCC) regulations procedures. On-pad temporary mud and cuttings storage, as approved by ADEC, will be allowed as necessary to facilitate annular injection and/or backhaul operations.
d. Disposal of wastewater and domestic wastewater. The BLM prohibits wastewater discharges or disposal of domestic wastewater into bodies of fresh, estuarine, and marine water, including wetlands, unless authorized by the National Pollution Discharge Eliminations System (NPDES) or State permit.

A-3 Required Operating Procedure
Objective: Minimize pollution through effective hazardous-materials contingency planning. Requirement/Standard: For oil and gas-related activities, a Hazardous Materials Emergency Contingency Plan shall be prepared and implemented before transportation, storage, or use of

fuel or hazardous substances. The plan shall include a set of procedures to ensure prompt response, notification, and cleanup in the event of a hazardous substance spill or threat of a release. Procedures applicable to fuel and hazardous substances handling (associated with transportation vehicles) may consist of Best Management Practices if approved by the AO. The plan shall include a list of resources available for response (e.g., heavy-equipment operators, spill-cleanup materials or companies), and names and phone numbers of Federal, State, and NSB contacts. Other Federal and State regulations may apply and require additional planning requirements. All staff shall be instructed regarding these procedures.

A-4 Required Operating Procedure

Objective: Minimize the impact of contaminants on fish, wildlife and the environment, including wetlands, marshes and marine waters, as a result of fuel, crude oil and other liquid chemical spills. Protect subsistence resources and subsistence activities. Protect public health and safety.

Requirement/Standard: Before initiating any oil and gas or related activity or operation, including field research/surveys and/or seismic operations, lessees/permitees shall develop a comprehensive spill prevention and response contingency plan per 40 CFR § 112 (Oil Pollution Act). The plan shall consider and take into account the following requirements:

a. On-site Clean-up Materials. Sufficient oil-spill-cleanup materials (absorbents, containment devices, etc.) shall be stored at all fueling points and vehicle-maintenance areas and shall be carried by field crews on all overland moves, seismic work trains, and similar overland moves by heavy equipment.
b. Storage Containers. Fuel and other petroleum products and other liquid chemicals shall be stored in proper containers at approved locations. Except during overland moves and seismic operations, fuel, other petroleum products, and other liquid chemicals designated by the AO in excess of 1,320 gallons in storage capacity shall be stored within an impermeable lined and diked area or within approved alternate storage containers such as over packs, capable of containing 110 percent of the stored volume. Storage of liquid chemicals and other hazardous materials within 500 feet of the active floodplain of any fish bearing waterbody and 100 feet from non-fish bearing waterbodies is prohibited. Also see ROP A-5.
c. Liner Materials. Liner material shall be compatible with the stored product and capable of remaining impermeable during typical weather extremes expected throughout the storage period.
d. Permanent Fueling Stations. Permanent fueling stations shall be lined or have impermeable protection to prevent fuel migration to the environment from overfills and spills.

e. Proper Identification of Containers. All fuel containers, including barrels and propane tanks, shall be marked with the responsible party's name, product type, and year filled or purchased.
f. Notice of Reportable Spills. Notice of any reportable spill (as required by 40 CFR 300.125 and 18 AAC [Alaska Administrative Code] 75.300) shall be given to the AO as soon as possible, but no later than 24 hours after occurrence.
g. Identification of Oil Pans ("duck ponds"). All oil pans shall be marked with the responsible party's name.

A-5 Required Operating Procedure
Objective: Minimize the impact of contaminants from refueling operations on fish, wildlife, and the environment.
Requirement/Standard: Refueling of equipment within 500 feet of the active flood plain of any fish-bearing water body and 100 feet from non-fish-bearing water bodies is prohibited. Small caches (up to 210 gallons) for motorboats float planes, ski planes, and small equipment, e.g. portable generators and water pumps, will be permitted. The AO may allow storage and operations at areas closer than the stated distances if properly designed to account for local hydrologic conditions.

A-6 Required Operating Procedure
Objective: Minimize the impact on fish, wildlife, and the environment from contaminants associated with the exploratory drilling process.
Requirement/Standard: Surface discharge of reserve-pit fluids is prohibited unless authorized by applicable NPDES, ADEC, and NSB permits (as appropriate) and approved by the AO.

A-7 Required Operating Procedure
Objective: Minimize the impacts to the environment of disposal of produced fluids recovered during the development phase on fish, wildlife, and the environment.
Requirement/Standard: Procedures for the disposal of produced fluids shall meet the following requirements:

a. In upland areas, including wetlands, disposal will be by subsurface-disposal techniques. The AO may permit alternate disposal methods if the lessee demonstrates that subsurface disposal is not feasible or prudent and the alternative method will not result in adverse environmental effects.
b. In marine waters, approval of discharges by the AO will be based on a case-by-case review of environmental factors and consistency with the conditions of an

NPDES permit. Discharge of produced fluids will be prohibited at locations where currents and water depths, in combination with other conditions, are not adequate to prevent impacts to known biologically sensitive areas. Alternate disposal methods will require an NPDES permit certified by the State.

A-8 Required Operating Procedure
Objective: Minimize conflicts resulting from interaction between humans and bears during leasing and associated activities.
Requirement: Oil and gas lessees and their contractors and subcontractors will, as a part of lease operation planning, prepare and implement bear-interaction plans to minimize conflicts between bears and humans. These plans shall include measures to:

a. Minimize attraction of bears to the drill sites.
b. Organize layout of buildings and work areas to minimize human/bear interactions.
c. Warn personnel of bears near, or on drill sites, and identify proper procedures to be followed.
d. Establish procedures, if authorized, to discourage bears from approaching the drill site.
e. Provide contingencies in the event bears do not leave the site or cannot be discouraged by authorized personnel.
f. Discuss proper storage and disposal of materials that may be toxic to bears.
g. Provide a systematic record of bears on the site and in the immediate area.
h. Encourage lessee/permitee to participate and comply with the Incidental Take Program under the Marine Mammal Protection Act.

B. Water Use for Permitted Activities

B-1 Required Operating Procedure
Objective: Maintain populations of, and adequate habitat for, fish and invertebrates.
Requirement/Standard: Water withdrawal from rivers and streams during winter is prohibited.

B-2 Required Operating Procedure
Objective: Maintain natural hydrologic regimes in soils surrounding lakes and ponds. Maintain populations of, and adequate habitat for, fish and invertebrates, and waterfowl.
Requirement/Standard: Water withdrawal from lakes may be authorized on a site-specific basis depending on lake size, water volume, and depth, and fish population and species diversification. Water withdrawal requirements specify:

a. Lakes that are ≥7 ft with sensitive fish (any fish except ninespine stickleback or

Alaska blackfish): water available for withdrawal is limited to 15% of calculated volume deeper than 7 ft. Lakes that are between 5 and 7 ft with sensitive fish: water available for withdrawal will be calculated on a case-by-case basis.

b. Lakes that are ≥5 ft with only non-sensitive fish (i.e., ninespine stickleback or Alaska blackfish): Water available for withdrawal is limited to 30% of calculated volume deeper than 5 ft.
c. Any lake with no fish present, regardless of depth: Water available for withdrawal is up to 100% as specified within the permit.
d. A water-monitoring plan may be required to assess draw down and water quality changes before, during, and after pumping any fish-bearing lake or lake of special concern.
e. The removal of naturally grounded ice may be authorized from lakes and shallow rivers on a site-specific basis depending upon its size, water volume, and depth, and fish population and species diversification.
f. Removed ice aggregate shall be included in the 15 percent or 30 percent withdrawal limits--whichever is the appropriate case--unless otherwise approved.
g. Any water intake structures in fish bearing or non-fish bearing waters shall be designed, operated, and maintained to prevent fish entrapment, entrainment, or injury. Note: All water withdrawal equipment must be equipped and must utilize fish screening devices approved by the Alaska Department of Natural Resources (ADNR).
h. Compaction of snow cover or snow removal from fish-bearing water bodies shall be prohibited except at approved ice road crossings, water pumping stations on lakes, or areas of grounded ice.

C. Winter Overland Moves and Seismic Work

The following lease stipulations and ROPs apply to overland moves, seismic work, and any similar cross-country vehicle use of heavy equipment on non-roaded surfaces during the winter season. These restrictions do not apply to the use of such equipment on ice roads after they are constructed.

C-1 Required Operating Procedure
Objective: Protect grizzly bear, polar bear, and marine mammal denning and/or birthing locations.

Requirement/Standard:

a. Cross-country use of heavy equipment and seismic activities are prohibited within ½ mile of occupied grizzly bear dens identified by the ADFG unless alternative mitigation are approved by the AO in consultation with the ADFG.
b. Cross-country use of heavy equipment and seismic activities are prohibited within 1 mile of known or observed polar bear dens or seal birthing lairs. Operators shall consult with the USFWS and/or NOAA Fisheries Service, as appropriate, before initiating activities in coastal habitat between October 30 and April 15.

C-2 Required Operating Procedure

Objective: Protect stream banks, minimize compaction of soils, and minimize the breakage, abrasion, compaction, or displacement of vegetation.

Requirement/Standard:

a. Ground operations shall be allowed only when frost and snow cover is at sufficient depths to protect the tundra. Ground operations shall cease when the spring snowmelt begins (approximately May 5 in the foothills area where elevations reach or exceed 500 feet and approximately May 15 in the northern coastal areas). The exact dates will be determined by the AO.
b. Only low-ground-pressure vehicles shall be used for on-the-ground activities off ice roads or pads. A list of approved vehicles can be obtained from the AO. Limited use of tractors equipped with wide tracks or "shoes" will be allowed to pull trailers, sleighs, or other equipment with approved undercarriage. Note: This provision does not include the use of heavy equipment such as front-end loaders and similar equipment required during ice road construction.
c. Bulldozing of tundra mat and vegetation, trails, or seismic lines is prohibited; however, on existing trails, seismic lines or camps, clearing of drifted snow is allowed to the extent that the tundra mat is not disturbed.
d. To reduce the possibility of ruts, vehicles shall avoid using the same trails for multiple trips unless necessitated by serious safety or superseding environmental concern. This provision does not apply to hardened snow trails for use by low-ground-pressure vehicles such as Rolligons.
e. The location of winter ice roads shall be designed and located to minimize compaction of soils and the breakage, abrasion, compaction, or displacement of vegetation. Offsets may be required to avoid using the same route or track in the subsequent year.
f. Motorized ground-vehicle use within the CRSA associated with overland moves,

seismic work, and any similar use of heavy equipment shall be minimized within the Colville Raptor, Passerine, and Moose Area from April 15 through August 5, with the exception that use will be minimized in the vicinity of gyrfalcon nests beginning March 15. Such use will remain ½ mile away from known raptor nesting sites, unless authorized by the AO.

C-3 Required Operating Procedure
Objective: Maintain natural spring runoff patterns, avoid flooding, prevent streambed sedimentation, protect water quality and protect stream banks.
Requirement/Standard: Crossing of waterway courses shall be made using a low-angle approach. Snow and ice bridges shall be removed, breached, or slotted before spring breakup. Ramps and bridges shall be substantially free of soil and debris.

C-4 Required Operating Procedure
Objective: Avoid additional freeze-down of deep-water pools harboring over-wintering fish and invertebrates used by fish.
Requirement/Standard: Travel up and down streambeds is prohibited unless it can be demonstrated that there will be no additional impacts from such travel to over-wintering fish or the invertebrates they rely on. Rivers and streams shall be crossed at shallow riffles from point bar to point bar whenever possible.

D. Oil and Gas Exploratory Drilling

D-1 Lease Stipulation
Objectives: Protect fish-bearing rivers, streams, and lakes from blowouts and minimize alteration of riparian habitat.
Requirement/Standard: Exploratory drilling is prohibited in rivers and streams, as determined by the active floodplain, and fish-bearing lakes.

D-2 Lease Stipulation
Objective: Minimize surface impacts from exploratory drilling.
Requirement/Standard: Exploratory drilling shall be limited to temporary facilities such as ice pads, ice roads, ice airstrips, and temporary platforms, unless a proposal is to use a previously constructed road or pad and it is environmentally preferable.

E. Facility Design and Construction

E-1 Required Operating Procedure
Objective: Protect subsistence use and access to traditional subsistence hunting and fishing areas and minimize the impact of oil and gas activities on air, land, water, fish and wildlife resources.
Requirement/Standard: All roads must be designed, constructed, maintained, and operated to create minimal environmental impacts and to protect subsistence use and access to traditional subsistence hunting and fishing areas. Subject to approval by the AO, the construction, operation, and maintenance of oil field roads is the responsibility of the lessee unless the construction, operation, and maintenance of roads are assumed by the appropriate governing entity.

E-2 Lease Stipulation
Objective: Protect fish-bearing water bodies, water quality, and aquatic habitats.
Requirement/Standard: The design and location of permanent oil and gas facilities within 500 feet of fish-bearing or 100 feet of non-fish-bearing waterbodies will only be approved on a case-by-case basis if the lessee can demonstrate that impacts to fish, water quality, and aquatic and riparian habitats are minimal. Note: Also refer to Area-Specific Lease Stipulations and ROPs for Rivers Area (Lease Stipulation K-1) and Deep Water Lakes (Lease Stipulation K-2).

E-3 Lease Stipulation
Objective: Maintain free passage of marine and anadromous fish and protect subsistence use and access to traditional subsistence hunting and fishing.
Requirement/Standard: Causeways and docks are prohibited in river mouths or deltas. Artificial gravel islands and bottom-founded structures are prohibited in river mouths or active stream channels on river deltas. Causeways, docks, artificial islands, and bottom-founded structures shall be designed to ensure free passage of marine and anadromous fish and to prevent significant changes to nearshore oceanographic circulation patterns and water quality characteristics. A monitoring program may be required to address the objectives of water quality and free passage of fish.

E-4 Required Operating Procedure
Objective: Minimize the potential for pipeline leaks, the resulting environmental damage and industrial accidents.
Requirement/Standard: All pipelines shall be designed, constructed, and operated under an AO-approved Quality Assurance/Quality Control plan that is specific to the product transported.

E-5 Required Operating Procedure
Objective: Minimize impacts of the development footprint.
Requirement/Standard: Facilities shall be designed and located to minimize the development footprint to the maximum extent practicable considering environmental, economic, and social impacts. Note: Where aircraft traffic is a concern, consideration shall be given to balancing gravel pad size and available supply storage capacity with potential reductions in the use of aircraft to support oil and gas operations.

E-6 Required Operating Procedure
Objective: Reduce the potential for ice-jam flooding, impacts to wetlands and floodplains, erosion, alteration of natural drainage patterns, and restriction of fish passage.
Requirement/Standard: Stream and marsh crossings shall be designed and constructed to ensure free passage of fish, maintain natural drainage, and minimize adverse effects to natural stream flow. Note: Bridges, rather than culverts, are the preferred method for crossing rivers. When necessary, culverts can be constructed on smaller streams, if they are large enough to avoid restricting fish passage or adversely affecting natural stream flow.

E-7 Required Operating Procedure
Objective: Minimize disruption of caribou movement and subsistence use.
Requirement/Standard: Pipelines and roads shall be designed to allow the free movement of caribou and the safe, unimpeded passage of the public while participating in traditional subsistence activities. Listed below are the accepted design practices:

a. Above ground pipelines shall be elevated a minimum of 7 feet as measured from the ground to the bottom of the pipeline at vertical support members.
b. In areas where facilities or terrain may funnel caribou movement, ramps over pipelines, buried pipelines, or pipelines buried under roads may be required by the AO after consultation with Federal, State, and NSB regulatory and resource agencies (as appropriate, based on agency legal authority and jurisdictional responsibility).
c. A minimum distance of 500 feet between roads and above ground pipelines should be maintained. Separating roads from pipelines may not be feasible within narrow land corridors between lakes and where pipelines and roads converge on a drill pad. Where it is not feasible to separate pipelines and roads, alternative pipeline routes, designs and possible burial within the road will be considered by the AO.

E-8 Required Operating Procedure
Objective: Minimize the impact of mineral materials mining activities on air, land, water, fish, and wildlife resources.
Requirement/Standard: Gravel mine site design and reclamation will be in accordance with a plan approved by the AO. The plan shall consider:

a. Locations outside the active flood plain.
b. Design and construction of gravel mine sites within active flood plains to serve as water reservoirs for future use.
c. Potential use of the site for enhancing fish and wildlife habitat.

E-9 Required Operating Procedure
Objective: Avoidance of human-caused increases in populations of predators of ground nesting birds.
Requirement/Standards:

a. Lessee shall utilize best available technology to prevent facilities from providing nesting, denning, or shelter sites for ravens, raptors, gulls and foxes. The lessee shall provide the AO with an annual report on the use of oil and gas facilities by ravens, raptors and foxes as nesting, denning, and shelter sites.
b. Feeding of wildlife is prohibited and will be subject to non-compliance regulations.

E-10 Required Operating Procedure
Objective: Prevention of migrating waterfowl, including species listed under the Endangered Species Act, from striking oil and gas and related facilities during low light conditions.
Requirement/Standard: Except for safety lighting, illumination of higher structures shall be designed to direct artificial exterior lighting inward and downward, rather than upward and outward. All drilling structures, production facilities, and other structures that exceed 20 feet in height shall be illuminated as outlined above.

E-11 Required Operating Procedure
Objective: Minimize the take of species listed under the Endangered Species Act and minimize the disturbance of other species of interest from direct or indirect interaction with oil and gas facilities.
Requirement/Standard: In accordance with the guidance below, before the approval of facility construction, aerial surveys of the following species shall be conducted within any area

proposed for development. Special Conditions in Spectacled and/or Steller's Eiders Habitats:

a. Surveys shall be conducted by the lessee for at least 3 years before authorization of construction, if such construction is within the USFWS North Slope eider survey area, and at least 1 year for construction proposed outside that area. Results of aerial surveys and habitat mapping may require additional ground nest surveys. Spectacled and/or Steller's eider surveys shall be conducted following accepted BLM-protocol during the second week of June.

b. If spectacled and/or Steller's eiders are determined to be present within the proposed development area, the applicant shall consult with the USFWS and BLM in the design and placement of roads and facilities in order to minimize impacts to nesting and brood-rearing eiders and their preferred habitats. Such consultation shall address timing restrictions and other temporary mitigating measures, construction of permanent facilities, placement of fill, alteration of eider habitat, aircraft operations, and introduction of high noise levels.

c. To reduce the possibility of spectacled and/or Steller's eiders striking above ground utility lines (power and communication), such lines shall either be buried in access roads, or suspended on vertical support members, to the extent practicable. Support wires associated with communication towers, radio antennas, and other similar facilities, shall be clearly marked along their entire length to improve visibility for low flying birds. Such markings shall be jointly developed through consultation with the USFWS. Overhead power and/or communication lines for oil and gas activities will be limited to the following circumstances.

    1. Overhead power or communication lines may be allowed when located entirely within the boundaries of a facility pad;
    2. Overhead power or communication lines may be allowed when engineering constraints at the specific location make it infeasible to bury or connect them to a vertical support member, or 3. Overhead power or communication lines may be allowed should human safety be compromised by other methods. (Note: This requirement standard will be Planning Area wide.)

<u>Special Conditions in Yellow-billed Loon Habitats</u>:

a. Aerial surveys shall be conducted by the lessee for at least 3 years before authorization of construction of facilities proposed for development which are

within 1 mile of a lake 25 acres or larger in size. These surveys along shorelines of large lakes shall be conducted following accepted BLM protocol during nesting in late June and during brood rearing in late August.

b. Should yellow-billed loons be present, the design and location of facilities must be such that disturbance is minimized. The default, standard mitigation is a 1-mile buffer around all recorded nest sites and a minimum 1,625-foot buffer around the remainder of the shoreline. Development will generally be prohibited within buffers unless no other option exists.

E-12 Required Operating Procedure
Objective: Use ecological mapping as a tool to assess wildlife habitat before development of permanent facilities to conserve important habitat types during development.
Requirement/Standard: An ecological land classification map of the development area shall be developed before approval of facility construction. The map will integrate geomorphology, surface form, and vegetation at a scale, level of resolution, and level of positional accuracy adequate for detailed analysis of development alternatives. The map shall be prepared in time to plan one season of ground-based wildlife surveys, if deemed necessary by the AO, before approval of the exact facility location and facility construction.

E-13 Required Operating Procedure
Objective: Protect cultural and paleontological resources.
Requirement/Standard: Lessees shall conduct a cultural and paleontological resources survey prior to any ground-disturbing activity. Upon finding any potential cultural or paleontological resource, the lessee or their designated representative shall notify the AO and suspend any and all surface disturbing operations in the immediate area of such discovery until written authorization to proceed is issued by the AO.

F. Use of Aircraft for Permitted Activities

F-1 Required Operating Procedure
Objective: Minimize the effects of low-flying aircraft on wildlife, traditional subsistence activities, and local communities.
Requirement/Standard: The lessee shall ensure that aircraft used for permitted activities maintain altitudes according to the following guidelines:

a. Aircraft shall maintain an altitude of at least 1,500 feet above ground level (AGL) when within ½ mile of cliffs identified as raptor nesting sites from April 15

through August 15 and within ½ mile of known gyrfalcon nest sites from March 15 to August 15, unless doing so endangers human life or violate safe flying practices. Permitees shall obtain information from the BLM necessary to plan flight routes when routes may go near falcon nests.

b. Aircraft shall maintain an altitude of at least 1,000 feet AGL (except for takeoffs and landings) over caribou winter ranges from December 1 through May 1, unless doing so endangers human life or violates safe flying practices. Caribou wintering areas will be defined annually by the AO. The AO will consult directly with the Alaska Department of Fish and Game in annually defining caribou winter ranges.

c. Land user shall submit an aircraft use plan as part of an oil and gas exploration or development proposal. The plan shall address strategies to minimize impacts to subsistence hunting and associated activities, including but not limited to the number of flights, type of aircraft, and flight altitudes and routes, and shall also include a plan to monitor flights. Proposed aircraft use plans should be reviewed by appropriate Federal, State, and Borough agencies. Consultations with these same agencies will be required if unacceptable disturbance is identified by subsistence users. Adjustments, including possible suspension of all flights, may be required by the AO if resulting disturbance is determined to be unacceptable. The number of takeoffs and landings to support oil and gas operations with necessary materials and supplies should be limited to the maximum extent possible. During the design of proposed oil and gas facilities, larger landing strips and storage areas should be considered so as to allow larger aircraft to be employed, resulting in fewer flights to the facility.

d. Use of aircraft, especially rotary wing aircraft, near known subsistence camps and cabins or during sensitive subsistence hunting periods (spring goose hunting and fall caribou and moose hunting) should be kept to a minimum. An aircraft use plan must be submitted as part of an oil and gas exploration or development proposal. The aircraft use plan shall address strategies to minimize impacts to subsistence hunting and associated activities including, but not limited to, the number of flights, type of aircraft, and flight altitudes and routes. The plan shall also include a proposal for monitoring flights. Proposed aircraft use plans should be reviewed by appropriate Federal, State, and Borough agencies. Consultations with these same agencies will be required if unacceptable disturbance is identified by subsistence users. Adjustments, including possible suspension of all flights, may be required by the AO if the resulting disturbance is determined to be unacceptable.

e. Aircraft used for permitted activities shall maintain an altitude of at least 2,000 feet AGL (except for takeoffs and landings) over the TLCHA (Map 2-2) from May 20 through August 20, unless doing so endangers human life or violates safe flying practices. Aircraft use (including fixed wing and helicopter) by oil and gas lessees in the Goose Molting Area (Map 2-2) should be minimized from May 20 through August 20, unless doing so endangers human life or violates safe flying practices. Also see Lease Stipulation K-4.

G. Oilfield Abandonment

G-1 Lease Stipulation
Objective: Ensure the final disposition of the land meets the current and future needs of the public.
Requirement/Standard: Upon abandonment or expiration of the lease, all oil and gas-related facilities shall be removed and sites rehabilitated to as near the original condition as practicable, subject to the review of the AO. The AO may determine that it is in the best interest of the public to retain some or all facilities. Within the Goose Molting Area, the AO, when determining if it is in the best interest of the public to retain a facility, will consider the impacts of retention to molting geese and goose molting habitat.

H. Subsistence Consultation for Permitted Activities

"Consultation" may take place by in-person meetings, teleconference, videoconference, and exchange of written documents, electronic mail, or other means appropriate to the circumstances. Consultation does not include public meetings that are primarily for the purpose of information distribution, unless it is explained at the beginning of the meeting that there is an open dialogue, and that comments, concerns, or other information are being actively solicited.

H-1 Required Operating Procedure
Objective: Provide opportunities for participation in planning and decision making to prevent unreasonable conflicts between subsistence uses and oil and gas and related activities.
Requirement/Standard: Operational activities will be prohibited within a minimum distance of 1 mile around cabins and campsites (as identified by the NSB's official inventory) without alternate agreement between the operator and the cabin/campsite users/owners.

Lessee/permittee shall consult directly with affected users/communities using the following guidelines:

a. Before submitting an application to the BLM, the applicant shall consult with directly affected subsistence users/communities, the NSB, and the National Petroleum Reserve-Alaska Subsistence Advisory Panel to discuss the siting, timing, and methods of proposed operations. Through this consultation, the applicant shall make every reasonable effort, including such mechanisms as conflict avoidance agreements and mitigating measures, to ensure that proposed activities will not result in unreasonable interference with subsistence activities.

b. The applicant shall submit documentation of consultation efforts as part of its operations plan. Applicants should submit the proposed plan of operations to provide an adequate time for review and comment by the National Petroleum Reserve-Alaska Subsistence Advisory Panel and to allow time for formal Government-to-Government consultation with Native Tribal governments.
The applicant shall submit documentation of its consultation efforts and a written plan that shows how its activities, in combination with other activities in the area, will be scheduled and located to prevent unreasonable conflicts with subsistence activities. Operations plans must include a discussion of the potential effects of the proposed operation, and the proposed operation in combination with other existing or reasonably foreseeable operations.

c. A subsistence plan addressing the following items must be submitted:
    1. A detailed description of the activity(s) to take place (including the use of aircraft).
    2. A description of how the lessee/permittee will minimize and/or deal with any potential impacts identified by the AO during the consultation process.
    3. A detailed description of the monitoring effort to take place, including process, procedures, personnel involved, and points of contact both at the work site and in the local community.
    4. Communication elements to provide information on how the applicant will keep potentially affected individuals and communities up-to-date on the progress of the activities and locations of possible, short-term conflicts (if any) with subsistence activities. Communication methods could include holding community meetings, open house meetings, workshops, newsletters, radio and television announcements, etc.
    5. Procedures necessary to facilitate access by subsistence users to conduct their activities.

In the event that no agreement is reached between the parties, the AO shall consult with the directly involved parties and determine which activities will occur, including the timeframes. During development, monitoring plans must be established for new permanent facilities, including pipelines, to assess an appropriate range of potential effects on resources and subsistence as determined on a case-by-case basis given the nature and location of the facilities. The scope, intensity, and duration of such plans will be established in consultation with the AO and Subsistence Advisory Panel.

H-2 Required Operating Procedures
Objective: Prevent unreasonable conflicts between subsistence activities and geophysical (seismic) exploration.
Requirement/Standard: In addition to the consultation process described in ROP H-1 for permitted activities, before applying for permits to conduct geophysical (seismic) exploration, the applicant shall consult with local communities and residents. For the purpose of this standard, a potentially affected cabin/campsite is defined as any camp or campsite within the boundary of the area subject to proposed geophysical exploration and/or within 1 mile of actual or planned travel routes used to supply the seismic operations while it is in operation.

- Because of the large land area covered by typical geophysical operations and the potential to impact a large number of subsistence users during the exploration season, the permittee/operator will notify in writing all potentially affected long-term cabin and camp users.
- The official recognized list of cabin and campsite users is the NSB's 2001 inventory of cabins and campsites.
- A copy of the notification letter and a list of potentially affected users shall also be provided to the office of the appropriate Native Tribal government.
- The AO will prohibit seismic work within 1 mile of any known, long-term, cabin or campsite unless an alternate agreement between the cabin/campsite owner/user is reached through the consultation process and presented to the AO. (Regardless of the consultation outcome, the AO will prohibit wintertime seismic work within 300 feet of a known long-term cabin or campsite.)

I. Orientation Programs Associated with Permitted Activities

I-1 Required Operating Procedure
Objective: Minimize cultural and resource conflicts.
Requirement/Standard: All personnel involved in oil and gas and related activities shall be provided information concerning applicable lease stipulations, ROPs, standards, and specific

types of environmental, social, traditional, and cultural concerns that relate to the region. The lessee/permittee shall ensure that all personnel involved in permitted activities shall attend an orientation program at least once a year. The proposed orientation program shall be submitted to the AO for review and approval and should:

a. Provide sufficient detail to notify personnel of applicable lease stipulations and ROPs and inform individuals working on the project of specific types of environmental, social, traditional, andcultural concerns that relate to the region.
b. Address the importance of not disturbing archaeological and biological resources and habitats, including endangered species, fisheries, bird colonies, and marine mammals, and provide guidance on how to avoid disturbance.
c. Include guidance on the preparation, production, and distribution of information cards on endangered and/or threatened species.
d. Be designed to increase sensitivity and understanding of personnel to community values, customs, and lifestyles in areas in which personnel will be operating.
e. Include information concerning avoidance of conflicts with subsistence and commercial fishing activities, and any pertinent mitigation.
f. Include information for aircraft personnel concerning subsistence activities and areas/seasons that are particularly sensitive to disturbance by low-flying aircraft. Of special concern is aircraft use near traditional subsistence cabins and campsites, flights during spring goose hunting and fall caribou and moose hunting seasons, and flights near North Slope communities.
g. Provide that individual training is transferable from one facility to another except for elements of the training specific to a particular site.
h. Include on-site records of all personnel who attend the program for so long as the site is active though not to exceed the 5 most recent years of operations. This record shall include the name and dates(s) of attendance of each attendee.
i. Include a module discussing bear interaction plans to minimize conflicts between bears and humans.
j. Provides a copy of 43 CFR 3163 regarding Non-Compliance Assessment and Penalties to on-site personnel.

J. Endangered Species Act - Section 7 Consultation Process

The lease areas may now or hereafter contain plants, animals, or their habitats determined to be threatened, endangered, or to have some other special status. The BLM may recommend modifications to exploration and development proposals to further its conservation and management objective to avoid BLM-approved activities that will contribute to the need to list such a species or their habitat. The BLM may require modifications to or disapprove a

proposed activity that is likely to result in jeopardy to the continued existence of a proposed or listed threatened or endangered species or result in the destruction or adverse modification of a designated or proposed critical habitat. The BLM will not approve any ground-disturbing activity that may affect any such species or critical habitat until it completes its obligations under applicable requirements of the Endangered Species Act as amended, 16 U.S.C. § 1531 et seq., including completion of any required procedure for conference or consultation.

Lease Stipulations That Apply in Biologically Sensitive Areas

In addition to the lease stipulations and ROPs developed to protect surface resources throughout the Planning Area, the BLM has eleven additional lease stipulations in this section that will specifically apply to biologically sensitive areas. Two of these lease stipulations (Rivers Area [Lease Stipulation K-1] and Deep Water Lakes [K-2]) will apply to biologically sensitive rivers and lakes throughout the Planning Area.

The other nine lease stipulations were developed to ensure that the BLM authorized activities comply with the provisions of the NPRPA that require any oil and gas exploration or development within a special area to "be conducted in a manner which will assure the maximum protection of such surface resources to the extent consistent with the requirements of [the] Act for the exploration of the reserve" (42 U.S.C. § 6504[b], 6508). In addition, oil and gas activities must include or provide for "conditions, restrictions, and prohibitions as the Secretary [of the Interior] deems necessary or appropriate to mitigate reasonably foreseeable and significantly adverse effects on the surface resources of the National Petroleum Reserve-Alaska (42 U.S.C. § 6508[1]). Stipulations K-3 through K-8 will ensure that the BLM authorized activities comply with these statutory mandates through this amendment by requiring special protections in the TLSA and CRSA. Specifically, Stipulation K-3 will ensure that exploration and development activities do not conflict with traditional subsistence users, historic travel routes, or fish and wildlife resources. Lease Stipulation K-4 will minimize disturbance to molting geese and loss of goose molting, eider, and other waterfowl habitat on or near Teshekpuk Lake from oil and gas exploration and development activities. Lease Stipulation K-5 will provide similar types of protection to caribou and their habitats near the lake. Under Lease stipulation K-6, coastal areas within the TLSA will be afforded special protection to minimize alteration of caribou movement within caribou coastal insect-relief areas and to protect other coastal and marine resources. Lease Stipulation K-7 will prohibit permanent oil and gas facilities, except for essential pipeline and road crossings, near the Colville, Kikiakrovak, and Kogosukruk Rivers within the CRSA to protect the rivers' natural

features and raptor habitat. Lease Stipulation K-8 will prohibit most surface structures in the Pik Dunes to protect caribou insect relief habitat and the geologic and scenic uniqueness of the dunes. Lease Stipulation K-9 will protect caribou movement in the areas 1) between Teshekpuk Lake and Kogru Inlet and 2) northwest of Teshekpuk Lake. Lease Stipulation K-10 minimizes disturbance to caribou calving habitat southwest, south, and southeast of Teshekpuk Lake. Lease Stipulation 11 protects key surface resources by limiting surface disturbance within identified lease tracts.

K-1 Lease Stipulation – Rivers Area
Objective: Minimize the disruption of natural flow patterns and changes to water quality; the disruption of natural functions resulting from the loss or change to vegetative and physical characteristics of floodplain and riparian areas; the loss of spawning, rearing or over-wintering habitat for fish; the loss of cultural and paleontological resources; the loss of raptor habitat; impacts to subsistence cabins and campsites; the disruption of subsistence activities; and impacts to scenic and other resource values.
Requirement/Standard: Permanent oil and gas facilities, including gravel pads, roads, airstrips, and pipelines, are prohibited in the streambed and adjacent to the rivers listed below at the distances identified. With the exception of the Ikpikpuk River, these setbacks are measured from the bank of the river as determined by the hydrology at the time of application. The standard setback is ½ mile from the bank's highest high water mark and increased to a ¾ mile setback where subsistence cabin and campsites are numerous. Along the Colville River and a portion of the Ikpikpuk a 1-mile setback as measured from the bank's highest high water mark is required to protect important raptor habitat. On a case-by-case basis in consultation with Federal, State, and NSB regulatory and resource agencies (as appropriate, based on agency legal authority and jurisdictional responsibility), essential pipeline(s) and road crossings to the main channel will be permitted (unless noted otherwise) through the setback areas. The above setbacks may not be practical within river deltas. In these situations, permanent facilities shall be designed to withstand a 200-year flood event.

a. Colville River: a 1-mile setback from the northern bluff (or bank if there is no bluff) Colville River extending the length of that portion of the river located within the Planning Area for the purposes of Raptor Protection. Note: The Planning Area excludes conveyed Native lands along the lower reaches of the Colville River. Development of road crossings intended to support oil and gas activities shall be consolidated with other similar projects and uses to the

maximum extent possible. Note: This provision does not apply to intercommunity or other permanent roads constructed with public funds for general transportation purposes. This preserves the opportunity to plan, design, and construct public transportation systems to meet the economic, transportation, and public health and safety needs of the State of Alaska and/or communities within the National Petroleum Reserve – Alaska.

b. Ikpikpuk River: (those portions of the river within the Northeast Planning Area and east of the river centerline)
   - A ¾-mile setback, as measured from the river centerline east, is required from the mouth of the Ikpikpuk River extending south to northern limit of Section 19, Township 7 North, Range 11 West, U.M. (Umiat Meridian). This is to protect numerous subsistence cabins and campsites.
   - A 1-mile setback, as measured from the river centerline east, is required from the northern boundary of Section 19, Township 7 North, Range 11 West, U.M., extending south to the northern limit of Section 4, Township 3 North, Range 12 West, U.M. This setback is for the purposes of protecting Raptors.

c. Miguakiak River: A ½ mile setback, as measured from the bank's highest high water mark isrequired along its entire length.
   Kikiakrorak and Kogosukruk Rivers: Note: The following discussion refers only to portions ofthe Kikiakrorak River downstream from the north line of Township 2 North, Range 4 West, U.M. and the Kogosukruk River (including the four ributaries off the southern bank) downstream from the north line of Township 2 North, Range 3 West, U.M. No permanent oil and gas surface facilities, except essential transportation crossings, will be allowed within 1 mile of the top of the bluff (or highest high water mark on the bank if there is no bluff) on either side of the rivers and the four identified tributaries of the Kogosukruk River.

d. Fish Creek: A 3 mile setback, as measured from the bank's highest high watermark, is required along that portion of the creek extending downstream from the east line of Section 31, Township 11 North, Range 1 East, U.M. and a ½ mile setback, as measured from the bank's highest high water mark, is required along that portion of the creek extending farther upstream. The purpose of this setback is to preclude location of permanent oil and gas surface facilities with the exception of essential transportation crossings.

e. Judy Creek (in the Planning Area): No permanent oil and gas surface facilities, except essential transportation crossings, will be allowed within ½ mile (from the bank's highest high water mark) of these waterbodies.

f. Tingmiaksiqvik River (identified as the Ublutuoch River on USGS quadrangle maps): No permanent oil and gas surface facilities, except essential transportation crossings, will be allowed within ½ mile (from the bank's highest high water mark) of this river from the eastern edge of Section 22, Township 8 North, Range 1 East U.M. (the western boundary of the CRSA) downstream to the confluence with Fish Creek.

K-2 Lease Stipulation - Deep Water Lakes
Objective: Minimize the disruption of natural flow patterns and changes to water quality; the disruption of natural functions resulting from the loss or change to vegetative and physical characteristics of deep water lakes; the loss of spawning, rearing or over wintering habitat for fish; the loss of cultural and paleontological resources; impacts to subsistence cabins and campsites; and the disruption of subsistence activities.
Requirement/Standard: Generally, permanent oil and gas facilities, including gravel pads, roads, airstrips, and pipelines, are prohibited on the lake or lakebed and within ¼ mile of the ordinary high water mark of any deep lake as determined to be in lake zone III (i.e., depth greater than 13 feet [4 meters]; Mellor 1985). On a case-by-case basis in consultation with Federal, State and NSB regulatory and resource agencies (as appropriate based on agency legal authority and jurisdictional responsibility), essential pipeline(s), road crossings, and other permanent facilities may be considered through the permitting process in these areas where the lessee can demonstrate on a site-specific basis that impacts will be minimal and if it is determined that there is no feasible or prudent alternative.

K-3 Lease stipulation - Teshekpuk Lake Shoreline
(Teshekpuk Lake (approximately 211,000 acres) will be deferred from additional oil and gas leasing)
Objective: Minimize the disruption of natural flow patterns and changes to water quality; the disruption of natural functions resulting from the loss or change to vegetative and physical characteristics of this large and regionally significant deep water lake; the loss of cultural and paleontological resources; impacts to subsistence cabins, campsites and associated activities; and to protect fish and wildlife habitat including important insect relief areas.
Requirement/Standard: Permanent oil and gas facilities, including gravel pads, roads, airstrips, and pipelines, are prohibited within ¼ mile of the ordinary high water mark of Teshekpuk Lake – No Exceptions.

K-4 Lease Stipulation - Goose Molting Area
Objective: Minimize disturbance to molting geese and loss of goose molting habitat in and around lakes in the Goose Molting Area.

Requirement/Standard (General):
Within the Goose Molting Area no permanent oil and gas facilities, except for pipelines will be allowed on the approximately 242,000 acres illustrated on Map 1. No exceptions will be considered. Prior to the permitting of a pipeline in the Goose Molting Area, a workshop will be convened to determine the best corridor for pipeline construction in efforts to minimize impacts to wildlife and subsistence resources. The workshop participants will include but will not be limited to Federal, State, and NSB representatives. In addition, only "In Field" roads will be authorized as part of oil and gas field development.
Requirement/Standard (Exploration): In the Goose Molting Area exploratory drilling shall be limited to temporary facilities such as ice pads, ice roads, ice airstrips, and temporary platforms, unless the lessee demonstrates that construction of permanent facilities (outside the identified Goose Molting NSO Areas) such as gravel airstrips, storage pads, and connecting roads is environmentally preferable (Also see Lease Stipulation K-11 regarding allowable surface disturbance). In addition, the following standards will be followed for permitted activities:

a. From June 15 through August 20 exploratory drilling and associated on the ground activities are prohibited. The intent of this rule is to restrict exploration drilling during the period when geese are present.
b. Water extraction from any lake used by molting geese shall not alter hydrological conditions that could adversely affect identified goose-feeding habitat along lakeshore margins. Considerations will be given to seasonal use by operators (generally in winter) and geese (generally in summer), and recharge to lakes from the spring snowmelt.
c. Oil and gas exploration activities will avoid alteration (e.g., damage or disturbance of soils, vegetation, or surface hydrology) of critical goose-feeding habitat types along lakeshore margins (grass/sedge/moss), as identified by the AO in consultation with the USFWS.

Requirement/Standard (Development): In the Goose Molting Area, the following standards will be followed for permitted activities:

a. Within the Goose Molting Area from June 15 through August 20, all off-pad activities and major construction activities using heavy equipment (e.g., sand/gravel extraction and transport, pipeline and pad construction, but not drilling from existing production pads) shall be suspended (see also Lease Stipulation K-5-d), unless approved by the AO in consultation with the appropriate Federal, State, and NSB regulatory and resource agencies. The intent of this requirement is to restrict activities that will disturb molting geese during the period when geese are present.

b. Water extraction from any lakes used by molting geese shall not alter hydrological conditions that could adversely affect identified goose-feeding habitat along lakeshore margins. Considerations will be given to seasonal use by operators (generally in winter) and geese (generally in summer), and recharge to lakes from the spring snowmelt.

c. Oil and gas activities will avoid altering (i.e., damage or disturbance of soils, vegetation, or surface hydrology) critical goose-feeding habitat types along lakeshore margins (grass/sedge/moss).

d. Permanent oil and gas facilities (including gravel roads, pads, and airstrips, but excluding pipelines) and material sites will be sited outside the identified buffers and NSO areas. Additional limits on development footprint apply; (also see Lease Stipulation K-11.)

e. Between June 15 and August, 20 within the Goose Molting Area, oil and gas facilities shall incorporate features (e.g., temporary fences, siting/orientation) that screen/shield human activity from view of any Goose Molting Area lake, as identified by the AO in consultation with appropriate Federal, State, and NSB regulatory and resource agencies.

f. Strategies to minimize ground traffic shall be implemented from June 15 through August 20. These strategies may include limiting trips, use of convoys, different vehicle types, etc. to the extent practicable. The lessee shall submit with the development proposal a vehicle use plan that considers these and any other mitigation. The vehicle use plan shall also include a vehicle-use monitoring plan. Adjustments will be required by the AO if resulting disturbance is determined to be unacceptable.

g. Within the Goose Molting Area, between June 15 and August 20, aircraft use (including fixed wing and helicopter) shall be restricted from June 15 through August 20 unless doing so endangers human life or violates safe flying practices. Restrictions may include: 1) limiting flights to two round-trips/week, and 2) limiting flights to corridors established by the BLM after discussions with appropriate Federal, State, and NSB regulatory and resource agencies. The lessee shall submit with the development proposal an aircraft use plan that considers these and other mitigation. The aircraft use plan shall also include an aircraft monitoring plan. Adjustments, including perhaps suspension of all aircraft use, will be required by the AO if resulting disturbance is determined to be unacceptable. Note: This site-specific lease stipulation is not intended to restrict flights necessary to survey wildlife to gain information necessary to meet the stated objective of this lease stipulation. However, flights necessary to gain this information will be restricted to the minimum necessary to collect such data.

h. Any permit for development issued under this IAP/EIS will include a requirement for the lessee to conduct monitoring studies necessary to adequately determine consequences of development and any need for change to mitigations. Monitoring studies will be site- and development-specific within a set of over-arching guidelines developed by the BLM in conjunction with appropriate Federal, State, NSB, and NSSI representatives. The study(s) will include the construction period and will continue for a minimum of 3 years after construction has been completed and production has begun. The monitoring studies will be a continuation of evaluating the effectiveness of the K-4 Lease Stipulation requirements in meeting the objective of K-4 and determine if any changes to the lease stipulation or any project specific mitigation(s) are necessary. If changes are determined to be necessary, the BLM, with the lessee and/or their representative, will conduct an assessment of the feasibility of altering development operation (e.g. reduced human activity, visibility barriers, noise abatement). Any changes determined necessary will be implemented prior to authorization of any new construction.

K-5 Lease Stipulation - Teshekpuk Lake Caribou Habitat Area (TLCHA)
Objective: Minimize disturbance and impacts to caribou, or alteration of caribou movements through portions the TLCHA that are essential for all season use, including calving and rearing, insect-relief, and migration.
Requirement/Standard: In the TLCHA the following standards will be applied to permitted activities:

a. Before authorization of construction of permanent facilities (outside NSO areas established in other lease stipulations), the lessee shall design and implement and report a study of caribou movement unless an acceptable study(s) specific to the Teshekpuk Lake Caribou Herd (TLCH) has been completed within the last 10 years. The study shall include a minimum of four years of current data on the TLCH movements and the study design shall be approved by the AO in consultation with the appropriate Federal, State, and NSB wildlife and resource agencies. The study should provide information necessary to determine facility (including pipeline) design and location. Lessees may submit individual study proposals or they may combine with other lessees in the area to do a single, joint study for the entire TLCHA. Study data may be gathered concurrently with other activities as approved by the AO and in consultation with the appropriate Federal, State, and NSB wildlife and resource agencies. A final report of the study results will be prepared and submitted. Prior to the permitting of a pipeline in the

TLCHA, a workshop will be convened to identify the best corridor for pipeline construction in efforts to minimize impacts to wildlife (specifically the TLCH) and subsistence resources. The workshop participants will include but will not be limited to Federal, State, and NSB representatives. All of these modifications will increase protection for caribou and other wildlife that utilize the TLCHA during all seasons.

b. Within the TLCHA, lessees shall orient linear corridors when laying out oil field developments to the extent practicable, to address migration and corralling effects and to avoid loops of road and/or pipeline that connect facilities.

c. Ramps over pipelines, buried pipelines, or pipelines buried under the road may be required by the AO, after consultation with appropriate Federal, State, and NSB regulatory and resource agencies, in the TLCHA where pipelines potentially impede caribou movement.

d. Major construction activities using heavy equipment (e.g., sand/gravel extraction and transport, pipeline and pad construction, but not drilling from existing production pads) shall be suspended within TLCHA from May 20 through August 20, unless approved by the AO in consultation with the appropriate Federal, State, and NSB regulatory and resource agencies. The intent of this requirement is to restrict activities that will disturb caribou during calving and insect-relief periods. If caribou arrive on the calving grounds prior to May 20, major construction activities will be suspended. The lessee shall submit with the development proposal a "stop work" plan that considers this and any other mitigation related to caribou early arrival. The intent of this latter requirement is to provide flexibility to adapt to changing climate conditions that may occur during the life of fields in the region.

e. The following ground and air traffic restrictions shall apply to permanent oil and gas-related roads in the areas and time periods indicated:

    1. Within the TLCHA, from May 20 through August 20, traffic speed shall not exceed 15 miles per hour when caribou are within ½ mile of the road. Additional strategies may include limiting trips, using convoys, using different vehicle types, etc., to the extent practicable. The lessee shall submit with the development proposal a vehicle use plan that considers these and any other mitigation. The vehicle use plan shall also include a vehicle-use monitoring plan. Adjustments will be required by the AO if resulting disturbance is determined to be unacceptable.

2. The lessee or a contractor shall observe caribou movement from May 20 through August 20, or earlier if caribou are present prior to May 20. Based on these observations, traffic will be stopped temporarily to allow a crossing by 10 or more caribou. Sections of road will be evacuated whenever an attempted crossing by a large number of caribou appears to imminent. The lessee shall submit with the development proposal a vehicle use plan that considers these and any other mitigation. The vehicle use plan shall also include a vehicle-use monitoring plan. Adjustments will be required by the AO if resulting disturbance is determined to be unacceptable.
3. Major equipment, materials, and supplies to be used at oil and gas work sites in the TLCHA shall be stockpiled prior to or after the period of May 20 through August 20 to minimize road traffic during that period.
4. Use of aircraft larger than a Twin Otter by authorized users of the Planning Area, including oil and gas lessees, from May 20 through August 20 within the TLCHA, shall be for emergency purposes only. The lessee shall submit with the development proposal an aircraft use plan that considers these and other mitigation. The aircraft use plan shall also include an aircraft monitoring plan. Adjustments, including perhaps suspension of all aircraft use, will be required by the AO if resulting disturbance is determined to be unacceptable. This lease stipulation is not intended to restrict flights necessary to survey wildlife to gain information necessary to meet the stated objective of this lease stipulation. However, flights necessary to gain this information will be restricted to the minimum necessary to collect such data.
5. Fixed-wing aircraft takeoffs and landings by authorized users of the Planning Area shall be limited to an average of one round-trip flight per day from May 20 through June 20, at aircraft facilities within the TLCHAs. The lessee shall submit with the development proposal an aircraft use plan that considers these and other mitigation. The aircraft use plan shall also include an aircraft monitoring plan. Adjustments, including perhaps suspension of all aircraft use, will be required by the AO if resulting disturbance is determined to be unacceptable.

6. Aircraft shall maintain a minimum height of 1,000 feet AGL (except for takeoffs and landings) over caribou winter ranges from December 1 through May 1, and 2,000 feet AGL over the TLCHA from May 20 through August 20, unless doing so endangers human life or violates safe flying practices. Caribou wintering ranges will be defined annually by the AO in consultation with the Alaska Department of Fish and Game.

K-6 Lease Stipulation - Coastal Area
Objective: Minimize hindrance or alteration of caribou movement within caribou coastal insect-relief areas; to prevent contamination of marine waters; loss of important bird habitat; alteration or disturbance of shoreline marshes; and impacts to subsistence resources activities.
Requirement/Standard: In the Coastal Area, permanent oil and gas facilities, including gravel pads, roads, airstrips, and pipelines established to support exploration and development activities shall be located at least ¾ mile inland from the coastline to the extent practicable. Where, as a result of technological limitations, economics, logistics, or other factors, a facility must be located within ¾ mile inland of the coastline, the practicality of locating the facility at previously occupied sites such as Camp Lonely, various Husky/USGS drill sites, and Distant Early Warning (DEW)-Line sites, shall be considered. Use of existing sites within ¾ mile of the coastline shall also be acceptable where it is demonstrated that use of such sites will reduce impacts to shorelines or otherwise be environmentally preferable. All lessees/permitees involved in activities in the immediate area must coordinate use of these new or existing sites with all other prospective users. Before conducting open water activities, the lessee shall consult with the Alaska Eskimo Whaling Commission, the Nuiqsut Whaling Association, Barrow Whaling Captains Association, and the NSB to minimize impacts to the fall and spring subsistence whaling activities of the communities of the North Slope.

K-7 Lease Stipulation - Colville River Special Area (CRSA)
Objective: Prevent or minimize loss of raptor foraging habitat (also see Lease Stipulation K-1; Rivers Area).
Requirement/Standard for Permanent Facilities: If necessary to construct permanent facilities within the CRSA, all reasonable and practicable efforts shall be made to locate permanent facilities as far from raptor nests as feasible. Within 15 miles of raptor nest sites, significant alteration of high quality foraging habitat shall be prohibited unless the lessee can demonstrate on a site-specific basis that impacts will be minimal or it is determined that there is no feasible or prudent alternative. Of particular concern are ponds, lakes, wetlands, and riparian habitats.
Note: On a case-by-case basis, and in consultation with appropriate Federal and State regulatory and resource agencies, essential pipeline and road crossings will be permitted through these areas where no other feasible or prudent options are available.

Requirement/Standard for Activities: Restriction applies to overland moves, seismic work, and any similar use of heavy equipment (other than actual excavations as part of construction) on tundra surfaces.

K-8 Lease Stipulation- Pik Dunes (identified in Section 2.2.1.8; Pik Dunes)
Objective: Retain unique qualities of the Pik Dunes, including geologic and scenic uniqueness, insect-relief habitat for caribou, and habitat for several uncommon plant species.
Requirement/Standard: Surface structures, except approximately perpendicular pipeline crossings and ice pads, are prohibited within the Pik Dunes.

K-9 Lease Stipulation – Caribou Movement Corridors
Objective: Minimize disturbance and impacts to caribou, or alteration of caribou movements (that are essential for all season use, including calving and rearing, insect-relief, and migration) in the 1.) area extending from the eastern shore of Teshekpuk Lake eastward to the Kogru Inlet and 2.) the area adjacent to the northwest corner of Teshekpuk Lake.
Requirement/Standard: Within the Caribou Movement Corridors, no permanent oil and gas facilities, except for pipelines, will be allowed on the approximately 54,700 (approximately 45,000 acres east of Teshekpuk Lake, and approximately 9,700 acres northwest of Teshekpuk Lake) illustrated on Map 1. Prior to the permitting of a pipeline in the Caribou Movement Corridors, a workshop will be convened to identify the best corridor for pipeline construction in efforts to minimize impacts to wildlife and subsistence resources. The workshop participants will include but will not be limited to Federal, State, and NSB representatives. Note: In addition to the general lease stipulations and ROPs, site-specific lease stipulations, i.e. K-3, K-4, K-5, and K-11 will also apply.

K-10 Lease Stipulation – Southern Caribou Calving Areas
Objective: Minimize disturbance and hindrance of caribou, or alteration of caribou movements (that are essential for all season use, including calving and post calving, and insect-relief) in the area south/southeast of Teshekpuk Lake.
Requirement/Standard: Within the Southern Caribou Calving Areas, no permanent oil and gas facilities, excluding pipelines, will be allowed on the approximately 233,000 acres illustrated on Map 1. Note: In addition to the general lease stipulations and ROPs, site specific lease stipulations K-4, K-5, K-6, and K-11 will also apply.

K-11 Lease Stipulation: GMA Lease Tracts A-G
Objective: To protect key surface resources and subsistence resources/activities resulting from permanent oil and gas development and associated activities.

Requirement/Standard: Surface disturbance is limited to 300 acres within the following described lease tracts (Map 1); this does not include surface disturbance activities from pipeline construction (No Exceptions). A pipeline will be considered after a workshop is convened to identify the best corridor for pipeline construction in efforts to minimize impacts to wildlife and subsistence resources. The workshop participants will include but will not be limited to Federal, State, and NSB representatives.

(Acreages are based on GIS calculations and are approximate)

A. Total Acreage: 59,134:

- 17,745 acres = NSO for Permanent Oil and Gas facilities excluding pipelines (the 17,745 acres does not include 5,605 acres of overlap from Coastal NSO).
- 41,389 acres = Area open to development subject to general and site specific lease stipulations and required operating procedures.

The total development footprint cannot exceed 300 acres (0.5 % of total acreage) within the 41,389 acres available for surface occupancy.

B. Total Acreage: 49,250:

- 28,347 acres = NSO for Permanent Oil and Gas facilities, excluding pipelines (the 28,347acres does not include 5,131 acres of overlap from Coastal NSO).
- 20,903 acres = Area open to development subject to general and site specific lease stipulations and required operating procedures.

The total development footprint cannot exceed 300 acres (0.6 % of total acreage) within the 20,903 acres available for surface occupancy.

C. Total Acreage: 46,085:

- 27,686 acres = NSO for Permanent Oil and Gas facilities, excluding pipelines (the 27,868 acres does not include 4,772 acres of overlap from Coastal NSO).
- 18,399 acres = Area open to development subject to general and site specific lease stipulations and required operating procedures.

The total development footprint cannot exceed 300 acres (0.7 % of total acreage) within the 18,398 acres available for surface occupancy.

D. Total Acreage: 53,297:

- 39,531 acres = NSO for Permanent Oil and Gas facilities excluding pipelines (the 39,531acres does not include 6,076 acres of overlap from Coastal NSO).
- 13,766 acres = Area open to development subject to general and site specific lease stipulations and required operating procedures.

The total development footprint cannot exceed 300 acres (0.5% of total acreage) within the 13,766 acres available for surface occupancy.

E. Total Acreage: 51,388:

- 27,010 acres = NSO for Permanent Oil and Gas facilities, excluding pipelines.
- 24,378 acres = Area open to development subject to general and site specific lease stipulations and required operating procedures.

The total development footprint cannot exceed 300 acres (0.6% of total acreage) within the 24,378 acres available for surface occupancy.

F. Total Acreage: 56,505:

- 41,116 acres = NSO for Permanent Oil and Gas facilities, excluding pipelines.
- 4,898 acres = Restricted area open to development subject to the results of 3 year study requirement to determine appropriate placement of permanent facility(s) (Map 1A in Appendix C.)
- 10,491 acres = Area open to development subject to general and site specific lease stipulations and required operating procedures.

The total development footprint cannot exceed 300 acres (0.5 % of total acreage) within the 15,389 acres available for surface occupancy (restricted or non-restricted.)

G. Total Acreage: 56,796:

- 37,305 acres = NSO for Permanent Oil and Gas facilities excluding pipelines
- 334 acres = Restricted area open to development subject to the results of 3 year study requirement to determine appropriate placement of permanent facility(s) (Map 1A in Appendix C.)
- 19,157 acres = Area open to development subject to general and site specific lease stipulations and required operating procedures.

The total development footprint cannot exceed 300 acres (0.5 % of total acreage) within the 19,491 acres available for surface occupancy (restricted or non-restricted.)

APPENDIX B: Stipulations and Required Operating Procedures

The stipulations and required operating procedures (ROP's) were developed through the IAP/EIS process. They are based on knowledge of the resources in the planning area and current industry practices. They are consistent with existing policies and laws.

In developing these stipulations and ROP's, BLM has tried not to include requirements that already exist as regulation or law. Most requirements identified here as stipulations constitute significant restrictions on the conduct of operations under a lease. For example, a stipulation that does not allow permanent facilities within one mile of a river could result in a well being located far enough from the (lessee's) optimum site to prevent an oil reservoir from being fully developed. Such restrictions must be attached to the lease. As part of a lease contract, lease stipulations are specific to the lessee. All oil and gas activity permits subsequently issued to a lessee will comply with the lease stipulations appropriate to the activity under review.

The ROP's are pre-application requirements, procedures, management practices, or design features that BLM adopts here as operational requirements. These requirements will be addressed through the permitting process. An oil and gas lease does not in itself authorize any on-the-ground activity. Seismic operations, drilling, ice road construction, pipeline construction, etc. require additional land use authorizations. Any applicant requesting such authorization will have to address the required operating procedures either before submitting the application (e.g., subsistence consultation, brant surveys) or as part of the application proposal (e.g., proposal states garbage will not be buried, or pipelines and roads will be separated by 500 ft or more). Requirements that are met prior to submission of the application, as well as procedures, practices, and design features that are an integral part of a proposal, do not need to be stipulated in a permit or lease. Because ROP's are identified in this ROD as operational requirements, not as lease stipulations, their applicability goes beyond the oil and gas leasing to any permitted activity where the requirement is relevant.

The Authorized Officer (AO) may add additional more restrictive stipulations as determined necessary by further NEPA analysis and as developed through consultation with other Federal, State, and NSB regulatory and resource agencies. Laws or regulations may require other Federal, State, and NSB permits (e.g., Clean Water Act [CWA] Section 404) for an oil and gas project to proceed. Specific State permits are required when the State has authority, under Federal or State law or regulation, to enforce the provision in question. Specific permits issued by Federal agencies other than BLM could include permit conditions that are more stringent than those presented below. Standardized stipulations that BLM commonly applies to authorized activities are listed in Appendix 13 of the Final IAP/EIS.

Definitions. The following definitions apply to stipulations and required operating procedures described here.

Active Floodplain: The lowland and relatively flat areas adjoining inland and coastal waters, including the flood-prone areas of offshore islands, composing, at a minimum, that area subject to a one percent or greater chance of flooding in any given year (also referred to as the 100-year or base floodplain).

Body of Water or Waterbody: A lake, river, stream, creek, or pond that holds water throughout the summer and supports a minimum of aquatic life.

Permanent Oil and Gas Facilities: Production facilities, pipelines, roads, airstrips, production pads, docks and other bottom-founded structures, seawater-treatment plants, and other structures associated with an oil and gas operation that occupy land for more than one winter season. Material sites and seasonal facilities such as ice roads and ice pads are excluded, even when the pads are designed for use in successive winters.

Exceptions to Lease Stipulations and Required Operating Procedures. As specified in Congressional legislation, exploration, development and production of the NPR-A shall be conducted in a manner that provides maximum protection for special areas, prevents unnecessary and undue surface damage, minimizes ecological disturbances, and avoids conflicts with subsistence activities. However, such protection efforts are generally not intended as a prohibition of petroleum and related activities. The BLM acknowledges that effective mitigation will come with some cost to oil and gas operations. However, a balance must be achieved to provide opportunities for successful oil and gas operations while providing maximum protection for the environment and local residents. While many prescriptive stipulations have been converted to performance-based lease stipulations and required operating procedures based on resource management objectives, there will remain a need to consider exceptions and modifications on a case-by-case basis. The following guidelines for considering and granting exceptions to stipulations or ROP's will be used.

In the event that an exception to a stipulation or ROP is requested and before an exception may be granted, the lessee/permittee shall demonstrate to the satisfaction of the AO that implementation of the stipulation or ROP is technically not feasible; or is economically prohibitive; or an environmentally preferable alternative is available and the alternative proposed by the lessee/permittee fully satisfies the objective(s) of the Lease Stipulation or ROP.

The lessee/permittee shall notify the AO in a timely manner that an exception is going to be requested. In demonstrating to the AO that the alternative proposal meets the above criteria, the lessee/permittee shall provide sufficient documentation (technical reports, new/revised procedures, scientific research results, etc.) to allow for a thorough review/evaluation of the proposal.

Before considering or granting an exception to a stipulation or ROP, consultation requirements must be met. Except in the case of an emergency, the AO shall consult with the appropriate Federal, State, and NSB regulatory and resource agencies before an exception may be granted. The AO's power to grant exceptions to a stipulation or ROP is limited to those subjects, uses, and permits over which the BLM has authority. Exceptions may be granted in emergencies involving human health and safety.

The BLM may also initiate an exception to a stipulation or ROP when information (technical reports, new/revised procedures, scientific research results, etc.) becomes available that demonstrates the alternative proposal satisfies the objective of the stipulation or ROP and meets the management objectives for the area in which the alternative is proposed. Before granting an exception (other than those granted for emergencies), whether proposed by the lessee/permittee or the BLM, the action shall undergo appropriate NEPA review.

A. Waste Prevention, Handling, Disposal; Spills, and Public Safety

A-1 Required Operating Procedure

Objective: Protect the health and safety of oil field workers and the general public by avoiding the disposal of solid waste and garbage near areas of human activity.
Requirement/Standard: Areas of operation shall be left clean of all debris.

A-2 Required Operating Procedure

Objective: Minimize impacts on the environment from non-hazardous waste generation. Encourage continuous environmental improvement. Protect the health and safety of oil field workers and the general public. Avoid human-caused changes in predator populations.
Requirement/Standard: Lessees/permittees shall prepare and implement a comprehensive waste management plan for all phases of exploration and development, including seismic activities. Management decisions affecting waste generation shall be addressed in the following order of priority: 1) prevention and reduction, 2) recycling, 3) treatment, and 4) disposal. The plan shall be submitted to the AO for approval, in consultation with Federal, State and North Slope Borough regulatory and resource agencies, as appropriate (based on agency legal authority and jurisdictional responsibility), as part of a plan of operations or other similar permit application. The plan shall consider and take into account the following requirements:
a) Methods to avoid attracting wildlife to food and garbage: All feasible precautions shall be taken to avoid attracting wildlife to food and garbage. (A current list of approved precautions, specific to type of permitted use, can be obtained from the AO.)
b) Disposal of putrescible waste: Current requirements prohibit the burial of garbage. Lessees and permitted users shall have a written procedure to ensure that the handling and disposal of putrescible waste will be accomplished in a manner that prevents the attraction of wildlife. All putrescible waste shall be incinerated, backhauled, or composted in a manner approved by the AO. All solid waste, including incinerator ash, shall be disposed of in an approved waste-disposal facility in accordance with U.S. Environmental Protection Agency (EPA) and Alaska Department

of Environmental Conservation (ADEC) regulations and procedures. The burial of human waste is prohibited except as authorized by the AO.
c) Disposal of pumpable waste products: Except as specifically provided, BLM requires all pumpable solid, liquid, and sludge waste be disposed of by injection in accordance with EPA, ADEC, and the Alaska Oil and Gas Conservation Commission regulations and procedures. On-pad temporary muds and cuttings storage, as approved by ADEC, will be allowed as necessary to facilitate annular injection and/or backhaul operations.
d) Disposal of wastewater and domestic wastewater: BLM y prohibits wastewater discharges or disposal of domestic wastewater into bodies of fresh, estuarine, and marine water, including wetlands, unless authorized by the National Pollution Discharge Elimination System (NPDES) or State permit.

A-3 Required Operating Procedure

Objective: Minimize pollution through effective hazardous-materials contingency planning.
Requirement/Standard: For oil- and gas-related activities, a Hazardous-Materials Emergency-Contingency Plan shall be prepared and implemented before transportation, storage, or use of fuel or hazardous substances. The plan shall include a set of procedures to ensure prompt response, notification, and cleanup in the event of a hazardous substance spill or threat of a release. Procedures applicable to fuel and hazardous substances handling (associated with transportation vehicles) may consist of Best Management Practices if approved by the AO. The plan shall include a list of resources available for response (e.g., heavy-equipment operators, spill-cleanup materials or companies), and names and phone numbers of Federal, State, and NSB contacts. Other Federal and State regulations may apply and require additional planning requirements. All staff shall be instructed regarding these procedures.

A-4 Required Operating Procedure

Objective: Minimize the impact of contaminants on fish, wildlife, and the environment, including wetlands, marshes and marine waters, as a result of fuel, crude oil and other liquid chemical spills. Protect subsistence resources and activities. Protect public health and safety.
Requirement/Standard: Before initiating any oil and gas or related activity or operation, including field research/surveys and/or seismic operations, lessees/permittees shall develop a comprehensive spill prevention and response contingency plan per 40 CFR 112 (OPA). The plan shall consider and take into account the following requirements:
a) On-site clean-up materials. Sufficient oil-spill-cleanup materials (absorbents, containment devices, etc.) shall be stored at all fueling points and vehicle-maintenance areas and shall be carried by field crews on all overland moves, seismic work trains, and similar overland moves by heavy equipment.
b) Storage Containers. Fuel and other petroleum products and other liquid chemicals shall be stored in proper containers at approved locations. Except during overland moves and seismic operations, fuel, other petroleum products, and other liquid chemicals designated by the AO in excess of 1,320 gallons in storage capacity, shall be stored within an impermeable lined and diked area or within approved alternate storage containers such as overpacks, capable of containing 110 percent of the stored volume.

c) Liner Materials. Liner material shall be compatible with the stored product and capable of remaining impermeable during typical weather extremes expected throughout the storage period.
d) Permanent Fueling Stations. Permanent fueling stations shall be lined or have impermeable protection to prevent fuel migration to the environment from overfills and spills.
e) Proper Identification of Containers. All fuel containers, including barrels and propane tanks, shall be marked with the responsible party's name, product type, and year filled or purchased.
f) Notice of Reportable Spills. Notice of any reportable spill (as required by 40 CFR 300.125 and 18 AAC 75.300) shall be given to the AO as soon as possible, but no later than 24 hours after occurrence.

A-5 Required Operating Procedure

Objective: Minimize the impact of contaminants from refueling operations on fish, wildlife, and the environment.
Requirement/Standard: Refueling of equipment within 500 ft of the active flood plain of any fishbearing waterbody and 100 ft from non-fish-bearing water bodies is prohibited. Small caches (up to 210 gallons) for motorboats float planes, ski planes, and small equipment, e.g. portable generators and water pumps, will be permitted. The AO may allow storage and operations at areas closer than the stated distances if properly designed to account for local hydrologic conditions.

A-6 Required Operating Procedure

Objective: Minimize the impact on fish, wildlife, and the environment from contaminants associated with the exploratory drilling process.
Standard/Requirement: Surface discharge of reserve-pit fluids is prohibited unless authorized by applicable NPDES, ADEC, and NSB permits (as appropriate) and approved by the AO.

A-7 Required Operating Procedure

Objective: Minimize the impacts to the environment of disposal of produced fluids recovered during the development phase on fish, wildlife, and the environment.
Requirement/Standard: Procedures for the disposal of produced fluids shall meet the following:
a) In upland areas, including wetlands, disposal will be by subsurface-disposal techniques. The AO may permit alternate disposal methods if the lessee demonstrates that subsurface disposal is feasible or prudent and the alternative method will not result in adverse environmental effects.
b) In marine waters, approval of discharges by the AO will be based on a case-by-case review of environmental factors and consistency with the conditions of an NPDES permit. Discharge of produced fluids will be prohibited at locations where currents and water depths, in combination with other conditions, are not adequate to prevent impacts to known biologically sensitive areas. Alternate disposal methods will require an NPDES permit certified by the State.

A-8 Required Operating Procedure

Objective: Minimize conflicts resulting from interaction between humans and bears during leasing and associated activities.

Requirement/Standard: Oil and gas lessees and their contractors and subcontractors will, as a part of preparation of lease operation planning, prepare and implement bear-interaction plans to minimize conflicts between bears and humans. These plans shall include measures to:
a) Minimize attraction of bears to the drill sites.
b) Organize layout of buildings and work areas to minimize human/bear interactions.
c) Warn personnel of bears near or on drill sites and identify proper procedures to be followed.
d) Establish procedures, if authorized, to deter bears from the drill site.
e) Provide contingencies in the event bears do not leave the site or cannot be deterred by authorized personnel.
f) Discuss proper storage and disposal of materials that may be toxic to bears.
g) Provide a systematic record of bears on the site and in the immediate area.

B. Water Use for Permitted Activities

B-1 Required Operating Procedure

Objective: Maintain populations of, and adequate habitat for, fish and invertebrates.
Requirement/Standard: Water withdrawal from rivers and streams during winter is prohibited.

B-2 Required Operating Procedure

Objective: Maintain natural hydrologic regimes in soils surrounding lakes and ponds and maintain populations of, and adequate habitat for, fish and invertebrates.
Requirement/Standard: Water withdrawal from lakes may be authorized on a site-specific basis depending on size, water volume, depth and fish population and species diversification. Current water withdrawal requirements specify:
a) Water withdrawals from any fish bearing lake 7 feet or deeper shall be limited to 15 percent of the estimated free water volume located beneath the ice.
b) Water withdrawals from lakes with depths between 5 and 7 feet that contain only ninespine stickleback and/or Alaska blackfish are limited to up to 30 percent of the under-ice volume.
c) Water withdrawal may be authorized from any lake if the proponent demonstrates that no fish exist in the lake.
d) A water-monitoring plan may be required to assess draw down and water quality changes before, during, and after pumping any fish-bearing lake.
e) The removal of naturally grounded ice may be authorized from lakes and shallow rivers on a sitespecific basis depending upon its size, water volume, depth, and fish population and species diversification.
f) Removed ice aggregate shall be included in the 15 percent or 30 percent (whichever is the appropriate case) withdrawal limits, unless otherwise approved.
g) Any water intake structures in fish-bearing waters shall be designed, operated and maintained to prevent fish entrapment, entrainment, or injury.
h) Compaction of snow cover or snow removal from fish-bearing water bodies shall be prohibited except at approved ice road crossings, water pumping stations on lakes or areas of grounded ice.

C. Winter Overland Moves and Seismic Work

The following stipulations and ROP's apply to overland moves, seismic work, and any similar cross-country vehicle use of heavy equipment on non-roaded surfaces during the winter season. These restrictions do not apply to the use of such equipment on ice roads after they are constructed.

C-1 Required Operating Procedure

Objective: Protect grizzly bear, polar bear, and marine mammal denning and/or birthing locations.

Requirement/Standard:

a) Cross-country use of heavy equipment and seismic activities are prohibited within ½ mile of occupied grizzly bear dens identified by Alaska Department of Fish & Game (ADF&G) unless alternative mitigation measures are approved by the AO in consultation with ADF&G.

b) Cross-country use of heavy equipment and seismic activities are prohibited within 1 mile of known or observed polar bear dens or seal birthing lairs. Operators shall consult with the U.S. Fish and Wildlife FWS (FWS) and/or NOAA Fisheries, as appropriate, before initiating activities in coastal habitat between October 30 and April 15.

C-2 Required Operating Procedure

Objective*:* Protect stream banks, minimize compaction of soils, and minimize the breakage, abrasion, compaction, or displacement of vegetation.

Requirement/Standard:

a) Ground operations shall be allowed only when frost and snow covers are at sufficient depths to protect the tundra. Ground operations shall cease when the spring snowmelt begins, approximately May 5 in the foothills area where elevations reach or exceed 500 ft, and approximately May 15 in the northern coastal areas. The exact dates will be determined by the AO.

b) Only low-ground-pressure vehicles shall be used for on-the-ground activities off ice roads or pads. A list of approved vehicles can be obtained from the AO. Limited use of tractors equipped with wide tracks or "shoes" will be allowed to pull trailers, sleighs, or other equipment with approved undercarriage. (**Note:** This provision does not include the use of heavy equipment such as front-end loaders and similar equipment required during ice road construction.)

c) Bulldozing of tundra mat and vegetation, trails, or seismic lines is prohibited; however, on existing trails, seismic lines or camps, clearing of drifted snow is allowed to the extent that the tundra mat is not disturbed.

d) To reduce the possibility of ruts, vehicles shall avoid using the same trails for multiple trips unless necessitated by serious safety or superseding environmental concern. This provision does not apply to hardened snow trails for use by low-ground-pressure vehicles such as Rolligons.

e) The location of winter ice roads shall be designed and located to minimize compaction of soils and the breakage, abrasion, compaction, or displacement of vegetation. Offsets may be required to avoid using the same route or track in the subsequent year.

C-3 Required Operating Procedure

Objective: Maintain natural spring runoff patterns, avoid flooding, prevent streambed sedimentation, protect water quality and protect stream banks.
Requirement/Standard: Crossing of waterway courses shall be made using a low-angle approach. Snow and ice bridges shall be removed, breached or slotted before spring breakup. Ramps and bridges shall be substantially free of soil and debris.

C-4 Required Operating Procedure

Objective: Avoid additional freeze down of deep-water pools harboring over-wintering fish and invertebrates used by fish.
Requirement/Standard: Travel up and down stream beds is prohibited. Rivers and streams shall be crossed at shallow riffles from point bar to point bar whenever possible.

D. Oil and Gas Exploratory Drilling

D-1 Lease Stipulation

Objectives: Protect fish-bearing rivers, streams and lakes from blowouts, and minimize alteration of riparian habitat.
Requirement/Standard: Exploratory drilling is prohibited in rivers and streams, as determined by the active floodplain, and fish-bearing lakes, except where the lessee can demonstrate on a site-specific basis that impacts would be minimal or it is determined that there is no feasible or prudent alternative.

D-2 Lease Stipulation

Objective: Minimize surface impacts from exploratory drilling.
Requirement/Standard: Exploratory drilling shall be limited to temporary facilities such as ice pads, ice roads, ice airstrips, temporary platforms, etc., unless the lessee demonstrates that construction of permanent facilities such as gravel airstrips, storage pads, and connecting roads is environmentally preferable or necessary to carry out exploration more economically.

E. Facility Design and Construction

E-1 Required Operating Procedure

Objective: Protect subsistence use and access to traditional subsistence hunting and fishing areas, and minimize the impact of oil and gas activities on air, land, water, fish and wildlife resources.
Requirement/Standard: All roads must be designed, constructed, maintained and operated to minimize environmental impacts and to protect subsistence use and access to traditional subsistence hunting and fishing areas. Subject to approval by the AO, the construction, operation and maintenance of oil field roads is the responsibility of the lessee. Note: This provision does not apply to intercommunity or other permanent roads constructed with public funds for general transportation purposes. This preserves the opportunity to plan, design and construct public transportation systems to meet the economic, transportation, and public health and safety needs of the State of Alaska and/or communities within NPR-A.

E-2 Lease Stipulation

Objective: Protect fish-bearing water bodies, water quality and aquatic habitats.
Requirement/Standard: The design and location of permanent oil and gas facilities within 500 feet of fish-bearing or 100 feet of non-fish-bearing water bodies will only be approved on a case-by-case basis if the lessee can demonstrate that impacts to fish, water quality, and aquatic and riparian habitats are minimal. (Note: Also refer to Area-Specific Stipulations and ROP's for Rivers (Stipulation K-1) and Deep Water Lakes (Stipulation K-2).)

E-3 Lease Stipulation

Objective: Maintain free passage of marine and anadromous fish, and protect subsistence use and access to traditional subsistence hunting and fishing.
Requirement/Standard: Causeways and docks are prohibited in river mouths or deltas. Artificial gravel islands and bottom-founded structures are prohibited in river mouths or active stream channels on river deltas. Causeways, docks, artificial islands, and bottom-founded structures shall be designed to ensure free passage of marine and anadromous fish and to prevent significant changes to nearshore oceanographic circulation patterns and water quality characteristics. A monitoring program may be required to address the objectives of water quality and free passage of fish.

E-4 Required Operating Procedure

Objective*:* Minimize the potential for pipeline leaks, the resulting environmental damage and industrial accidents.
Requirement/Standard: All pipelines shall be designed, constructed, and operated under an AO approved Quality Assurance/Quality Control plan that is specific to the product transported.

E-5 Required Operating Procedure

Objective: Minimize impacts of the development footprint.
Requirement/Standard: Facilities shall be designed and located to minimize development footprint to the maximum extent practicable considering environmental, economic, and social impacts. **Note:** Where aircraft traffic is an issue, consideration shall be given to balancing gravel pad size and available supply storage capacity with potential reductions in the use of aircraft to support oil and gas operations.

E-6 Required Operating Procedure

Objective: Reduce the potential for ice-jam flooding, erosion, alteration of natural drainage patterns, and restriction of fish passage.
Requirement/Standard: Stream and marsh crossings shall be designed and constructed to ensure free passage of fish, maintain natural drainage, and minimal adverse effects to natural stream flow. **Note:** Bridges, rather than culverts, are the preferred method for crossing rivers. When necessary, culverts can be constructed on smaller streams, if they are large enough to avoid restricting fish passage or adversely affecting natural stream flow.

E-7 Required Operating Procedure

Objective: Minimize disruption of caribou movement and subsistence use.
Requirement/Standard: Pipelines and roads shall be designed to allow the free movement of caribou and the safe, unimpeded passage of the public while participating in traditional subsistence activities. Listed below are the ly accepted design practices:
a) Above ground pipelines shall be elevated a minimum of 7 feet as measured from the ground to the bottom of the pipeline at vertical support members.
b) In areas where facilities or terrain may funnel caribou movement, ramps over pipelines, buried pipelines, or pipelines buried under roads may be required by the AO after consultation with Federal, State, and North Slope Borough regulatory and resource agencies (as appropriate, based on agency legal authority and jurisdictional responsibility).
c) A minimum distance of 500 feet between pipelines and roads should be maintained when feasible. Separating roads from pipelines may not be feasible within narrow land corridors between lakes and where pipelines and roads converge on a drill pad.

E-8 Required Operating Procedure

Objective: Minimize the impact of mineral materials mining activities on air, land, water, fish, and wildlife resources.
Requirement/Standard: Gravel mine site design and reclamation will be in accordance with a plan approved by the AO. The plan shall consider:
a) Locations outside the active flood plain.
b) Design and construction of gravel mine sites within active flood plains to serve as water reservoirs for future use.
c) Potential use of site for enhancing fish and wildlife habitat.

E-9 Required Operating Procedure

Objective: Avoidance of human-caused increases in populations of predators of ground nesting birds.
Requirement/Standard: Lessee shall utilize best available technology to prevent facilities from providing nesting, denning, or shelter sites for ravens, raptors, and foxes. The lessee shall provide the AO with an annual report on the use of oil and gas facilities by ravens, raptors and foxes as nesting, denning, and shelter sites.

E-10 Required Operating Procedure

Objective: Prevention of migrating waterfowl, including species listed under the Endangered Species Act, from striking oil and gas and related facilities during low light conditions.
Requirement/Standard: Except for safety lighting, illumination of higher structures shall be designed to direct artificial exterior lighting inward and downward, rather than upward and outward. All drilling structures, production facilities, and other structures that exceed 20 ft shall be illuminated as outlined above.

E-11 Required Operating Procedure

Objective: Minimize the take of species listed under the Endangered Species Act and minimize the disturbance of other species of interest from direct or indirect interaction with oil and gas facilities.

Requirement/Standard: In accordance with the guidance below, before the approval of facility construction, aerial surveys of breeding pairs of the following species shall be conducted within any area proposed for development.

Spectacled and/or Steller's Eiders: a) Surveys shall be conducted by the lessee for at least three (3) years before authorization of construction, if such construction is within the FWS North Slope Eider survey area (Map 62), and at least one (1) year outside that area. Results of aerial surveys and habitat mapping may require additional ground nest surveys. Spectacled and/or Steller's eider surveys shall be conducted following accepted BLM-protocol during the second week of June.
b) If spectacled and/or Steller's eiders are determined to be present within the proposed development area, the applicant shall consult with the FWS and BLM in the design and placement of roads and facilities in order to minimize impacts to nesting and brood-rearing eiders and their preferred habitats. Such consultation shall address timing restrictions and other temporary mitigating measures, construction of permanent facilities, placement of fill, alteration of eider habitat, aircraft operations, and introduction of high noise levels.
c) To reduce the possibility of spectacled and/or Steller’s eiders from striking above-ground utility lines (power and communication), such lines shall either be buried in access roads, or suspended on vertical support members, to the extend practical. Support wires associated with communication towers, radio antennas, and other similar facilities, shall be clearly marked along their entire length to improve visibility for low flying birds. Such markings shall be jointly developed through consultation with FWS.

Yellow-billed Loon: a) Aerial surveys shall be conducted by the lessee for at least 3 years before authorization of construction of facilities proposed for development that are within 1 mile of a lake 25 acres or larger in size. These surveys along shorelines of large lakes shall be conducted following accepted BLM protocol during nesting in late June and during brood rearing in late August.
b) Should yellow-billed loons be present, the design and location of facilities must be such that disturbance is minimized. Current accepted mitigation is a one-mile buffer around all recorded nest sites and a minimum 500-meter buffer around the remainder of the lake shoreline. Development may be prohibited within buffers or activities curtailed while birds are present.

E-12 Required Operating Procedure

Objective: Use ecological mapping as a tool to assess wildlife habitat before development of permanent facilities, to conserve important habitat types, including wetlands, during development.

Requirement/Standard: An ecological land classification map of the development area shall be developed before approval of facility construction. The map will integrate geomorphology,

surface-form and vegetation at a scale, level of resolution, and level of positional accuracy adequate for detailed analyses of development alternatives. The map shall be prepared in time to plan one season of ground-based wildlife surveys, if deemed necessary by the AO, before approval of exact facility location and facility construction.

E-13 Required Operating Procedure

Objective: Protect cultural and paleontological resources.
Requirement/Standard: Lessees shall conduct a cultural and paleontological resources survey prior to any ground-disturbing activity. Upon finding any potential cultural or paleontological resource, the lessee or their designated representative shall notify the AO and suspend all operations in the immediate area of such discovery until written authorization to proceed is issued by the AO.

F. Use of Aircraft for Permitted Activities

F-1 Required Operating Procedure

Objective: Minimize the effects of low-flying aircraft on wildlife, traditional subsistence activities, and local communities.
Requirement/Standard: The lessee shall ensure that aircraft used for permitted activities maintain altitudes according to the following guidelines:
a) Aircraft shall maintain an altitude of at least 1,500 ft above ground level (AGL) when within ½ mile of cliffs identified as raptor nesting sites from April 15 through August 15 and within ½ mile of known gyrfalcon nest sites from March 15 to August 15, unless doing so would endanger human life or violate safe flying practices. Permittees shall obtain information from BLM necessary to plan flight routes when routes may go near falcon nests.
b) Aircraft shall maintain an altitude of at least 1,000 ft AGL (except for takeoffs and landings) over caribou winter ranges from December 1 through May 1, unless doing so would endanger human life or violate safe flying practices. Caribou wintering areas will be defined annually by the AO.
c) The number of takeoffs and landings to support oil and gas operations with necessary materials and supplies should be limited to the maximum extent possible. During the design of proposed oil and gas facilities, larger landing strips and storage areas should be considered so as to allow larger aircraft to be employed, resulting in a fewer number of flights to the facility.
d) Use of aircraft, especially rotary wing aircraft, near known subsistence camps and cabins or during sensitive subsistence hunting periods (spring goose hunting and fall caribou and moose hunting) should be kept to a minimum.
e) Aircraft used for permitted activities shall maintain an altitude of at least 2,000 ft AGL (except for takeoffs and landings) over the Caribou Study Area (Map 91) from June 15 through July 31, unless doing so would endanger human life or violate safe flying practices.
f) Aircraft shall maintain an altitude of at least 2,000 ft AGL (except for takeoffs and landings) over the Caribou Coastal Insect-Relief Areas (Map 91) from June 15 through July 31, unless doing so would endanger human life or violate safe flying practices.

G. Oil Field Abandonment

G-1 Lease Stipulation

Objective: Ensure the final disposition of the land meets the current and future needs of the public.
Requirement/Standard: Upon abandonment or expiration of the lease, all oil- and gas-related facilities shall be removed and sites rehabilitated to as near the original condition as practicable, subject to the review of the AO. The AO may determine that it is in the best interest of the public to retain some or all facilities.

H. Subsistence Consultation for Permitted Activities

"Consultation" may take place by in-person meetings, teleconference, videoconference, and exchange of written documents, e-mail, or other means appropriate to the circumstances. Consultation does not include public meetings that are primarily for the purpose of information distribution, unless it is explained at the beginning of the meeting that there is an open dialogue, and that comments, concerns, or other information are being actively solicited.

H-1 Required Operating Procedure

Objective: Provide opportunities for participation in planning and decision-making to prevent unreasonable conflicts between subsistence uses and oil and gas and related activities.
Requirement/Standard: Lessee/permittee shall consult directly with affected communities using the following guidelines.
a) Before submitting an application to the BLM, the applicant shall consult with directly affected subsistence communities, the North Slope Borough, and the NPR-A Subsistence Advisory Panel to discuss the siting, timing and methods of proposed operations. Through this consultation, the applicant shall make every reasonable effort, including such mechanisms as conflict avoidance agreements and mitigating measures, to ensure that proposed activities will not result in unreasonable interference with subsistence activities.
b) The applicant shall submit documentation of consultation efforts as part of its operations plan. Applicants should submit the proposed plan of operations to provide an adequate time for review and comment by the NPR-A Subsistence Advisory Panel and to allow time for formal government-to-government consultation with Native Tribal Governments. The applicant shall submit documentation of its consultation efforts and a written plan that shows how its activities, in combination with other activities in the area, will be scheduled and located to prevent unreasonable conflicts with subsistence activities. Operations plans must include a discussion of the potential effects of the proposed operation, and the proposed operation in combination with other existing or reasonably foreseeable operations.
c) A subsistence plan addressing the following items must be submitted.
1. A detailed description of the activity(ies) to take place (including the use of aircraft).
2. A description of how the lessee/permittee will minimize and/or deal with any potential impacts identified by the AO during the consultation process
3. A detailed description of the monitoring effort to take place, including process, procedures, personnel involved and points of contact both at the work site and in the local community.

4. Communication elements to provide information on how the applicant will keep potentially affected individuals and communities up-to-date on the progress of the activities and locations of possible, short-term conflicts (if any) with subsistence activities. Communication methods could include holding community meetings, open house meetings, workshops, newsletters, radio and television announcements, etc.
5. Procedures necessary to facilitate access by subsistence users to conduct their activities.
6. In the event that no agreement is reached between the parties, the AO shall consult with the directly involved parties and determine which activities will occur, including the timeframes.
7. During development, monitoring plans must be established for new permanent facilities, including pipelines, to assess an appropriate range of potential effects on resources and subsistence as determined on a case-by-case basis given the nature and location of the facilities. The scope, intensity, and duration of such plans will be established in consultation with the AO and Subsistence Advisory Panel.

H-2 Required Operating Procedure

Objective: Prevent unreasonable conflicts between subsistence activities and geophysical (seismic) exploration.
Requirement/Standard: In addition to the consultation process described above for permitted activities**,** before applying for permits to conduct geophysical (seismic) exploration, the applicant shall consult with local communities and residents:
a) Because of the large land area covered by typical geophysical operations and the potential to impact a large number of subsistence users during the exploration season, the permittee/operator will notify, in writing, all potentially affected long-term cabin and camp users.
b) The official recognized list of cabin and campsite users is the North Slope Borough's 2001 (or most current) inventory of cabins and campsites.
c) For the purpose of this standard, potentially affected cabins and campsites are defined as any camp or campsite within the boundary of the area subject to proposed geophysical exploration and/or within 1,200 feet of actual or planned travel routes used to supply the seismic operations while it is in operation.
d) A copy of the notification letter and a list of potentially affected users shall also be provided to the office of the appropriate Native Tribal Government.
e) Based on that consultation, the AO may prohibit seismic work up to 1,200 feet of any known, longterm, cabin or campsite. Generally, the AO will allow wintertime seismic work to be conducted within 300 feet of a long-term cabin or campsite that is not in use.

I. Orientation Programs Associated with Permitted Activities

I-1 Required Operating Procedure

Objective: Minimize cultural and resource conflicts.
Requirement/Standard: All personnel involved in oil and gas and related activities shall be provided information concerning applicable stipulations, required operating procedures,

standards, and specific types of environmental, social, traditional, and cultural concerns that relate to the region. The lessee/permittee shall ensure that all personnel involved in permitted activities shall attend an orientation program at least once a year. The proposed orientation program shall be submitted to the AO for review and approval and should:

a) Provide sufficient detail to notify personnel of applicable stipulations and required operating procedures as well as inform individuals working on the project of specific types of environmental, social, traditional and cultural concerns that relate to the region.

b) Address the importance of not disturbing archaeological and biological resources and habitats, including endangered species, fisheries, bird colonies, and marine mammals, and provide guidance on how to avoid disturbance.

c) Include guidance on the preparation, production, and distribution of information cards on endangered and/or threatened species.

d) Be designed to increase sensitivity and understanding of personnel to community values, customs, and lifestyles in areas in which personnel will be operating.

e) Include information concerning avoidance of conflicts with subsistence, commercial fishing activities, and pertinent mitigation.

f) Include information for aircraft personnel concerning subsistence activities and areas/seasons that are particularly sensitive to disturbance by low flying aircraft. Of special concern is aircraft use near traditional subsistence cabins and campsites, flights during spring goose hunting and fall caribou and moose hunting seasons, and flights near North Slope communities.

g) Provide that individual training is transferable from one facility to another, except for elements of the training specific to a particular site.

h) Include on-site records of all personnel who attend the program for so long as the site is active, though not to exceed the 5 most recent years of operations. This record shall include the name and dates(s) of attendance of each attendee.

i) Include a module discussing bear interaction plans to minimize conflicts between bears and humans.

J. Endangered Species Act Section 7 Consultation Stipulation

J-1 Lease Stipulation

The lease area may now or hereafter contain plants, animals, or their habitats determined to be threatened, endangered, or other special status species. BLM may recommend modifications to exploration and development proposals to further its conservation and management objective to avoid BLM-approved activity that will contribute to a need to list such a species or their habitat. BLM may require modifications to or disapprove proposed activity that is likely to result in jeopardy to the continued existence of a proposed or listed threatened or endangered species or result in the destruction or adverse modification of a designated or proposed critical habitat. BLM will not approve any ground-disturbing activity that may affect any such species or critical habitat until it completes its obligations under applicable requirements of the Endangered Species Act as amended, 16 U.S.C. § 1531 et seq., including completion of any required procedure for conference or consultation.

K. Area-Specific Lease Stipulations and Required Operating Procedures

K-1 Lease Stipulation–Rivers

Objective: Minimize the disruption of natural flow patterns and changes to water quality; the disruption of natural functions resulting from the loss or change to vegetative and physical characteristics of floodplain and riparian areas; the loss of spawning, rearing or over-wintering habitat for fish; the loss of cultural and paleontological resources; the loss of raptor habitat; impacts to subsistence cabin-and-camp-sites; the disruption of subsistence activities; and impacts to scenic and other resource values. (See ROP D-1 for restrictions on exploration activities.)

Requirement/ Standard: Permanent oil and gas facilities, including gravel pads, roads, airstrips, and pipelines, are prohibited in the stream bed and adjacent to the rivers listed below at the distances identified. These setbacks are measured from the centerline of the river as determined by the current hydrology at the time of application. The standard setbacks is ½ mile and increased to ¾ mile where subsistence cabins and campsites are numerous. Along the Colville River and a portion of the Ikpikpuk a 1-mile setback is required to protect important raptor habitat. (For locations along rivers where setback distances change, see Map 20 in the Final Northwest National Petroleum Reserve-Alaska Integrated Activity Plan/Environmental Impact Statement). On a case-by case basis, and in consultation with Federal, State, and North Slope Borough regulatory and resource agencies (as appropriate, based on agency legal authority and jurisdictional responsibility), essential pipeline and road crossings perpendicular to the main channel will be permitted (unless noted otherwise) through setback areas. The above setbacks may not be practical within river deltas. In these situations, permanent facilities shall be designed to withstand a 200-year flood event.

a) Colville River: a 1-mile setback from the northern bluff (or bank if there is no bluff) of the Colville River extending the length of that portion of the river within the Planning Area. Road crossings intended to solely support oil and gas activities are prohibited. Note: This provision does not apply to intercommunity or other permanent roads constructed with public funds for general transportation purposes. This preserves the opportunity to plan, design, and construct public transportation systems to meet the economic, transportation, and public health and safety needs of the State of Alaska and/or communities within NPR-A.

b) Ikpikpuk River: a ¾-mile setback from the centerline of the Ikpikpuk River extending from the mouth south to Sec. 19, T7N, R11W, UM. From Sec. 19, T7N, R11W, UM to Sec. 4 T3N, R12W, UM, a 1-mile setback is required. Beginning at Sec. 4 T3N, R12W, UM, a ½-mile setback will be required to the confluence of the Kigalik River and Maybe Creek.

c) Alaktak River: a ¾-mile setback from the centerline of the Alaktak River extending from the mouth to the Ikpikpuk River.

d) Chipp River: a ¾-mile setback from the centerline of the Chipp River extending from the mouth to the Ikpikpuk River.

e) Oumalik River: a ¾-mile setback from the centerline of the Oumalik River from the mouth upstream to Sec. 5, T8N, R14W, UM, and a ½-mile setback from Sec. 5, T8N, R14W, UM, upstream to Sec. 2, T5N, R15W, UM.

f) Titaluk River: a ½-mile setback from the centerline of the Titaluk River from the confluence with the Ikpikpuk River upstream to Sec. 1, T2N, R22W, UM.
g) Kigalik River: a ½-mile setback from the centerline of the Kigalik River from the confluence with the Ikpikpuk River upstream to the Planning area boundary.
h) Maybe Creek: a ½-mile setback from the centerline of the Maybe Creek from the confluence with the Ikpikpuk River upstream to Sec. 8, T2S R6W, UM.
i) Topagoruk River: a ¾-mile setback from the centerline of the Topagoruk River from the mouth upstream to the confluence with Ishuktak Creek. A ½-mile setback from each bank upstream from the confluence with the Ishuktak to Sec. 3, T7N, R17W, UM.
j) Ishuktak Creek: a ½-mile setback from the centerline of Ishuktak Creek from the confluence with the Topagoruk River to Sec. 24, T8N, R16W, UM.
k) Meade River: a ¾-mile setback from the centerline of the Meade River upstream to Sec. 6, T6N, R21W, UM. A ½-mile setback from each bank upstream from Sec. 6, T6N, R21W, UM to the Planning area boundary.
l) Usuktuk River: a ¾-mile setback from the centerline of the Usuktuk River upstream from the confluence with the Meade River to Sec. 36, T10N, R19W, UM.
m) Pikroka Creek a ¾-mile setback from the centerline of the Pikroka Creek upstream from the confluence with the Meade River to Sec. 11, T8N, R23W, UM.
n) Nigisakturik River: a ¾-mile setback from the centerline of the Nigisakturik River upstream from the confluence with the Meade River to Sec. 1, T11N, R25W, UM.
o) Inaru River: a ¾-mile setback from the centerline of the Inaru River from the mouth upstream to Sec. 17, T15N, R25W, UM.
p) Kucheak Creek: a ¾-mile setback from the centerline of Kucheak Creek from the confluence with the Inaru River upstream to Sec. 20, T13N, R24W, UM.
q) Avalik River: a ½-mile setback from the centerline of the Avalik River along that portion of the river within the Planning area.
r) Niklavik Creek: a ½-mile setback from the centerline of the Niklavik Creek from the confluence with the Inaru River upstream to Sec. 5, T17N, R21W, UM.

K-2 Lease Stipulation–Deep Water Lakes

Objective: Minimize the disruption of natural flow patterns and changes to water quality; the disruption of natural functions resulting from the loss or change to vegetative and physical characteristics of deep water lakes; the loss of spawning, rearing or over wintering habitat for fish; the loss of cultural and paleontological resources; impacts to subsistence cabin- and camp-sites; and the disruption of subsistence activities.
Requirement/ Standard: Permanent oil and gas facilities, including gravel pads, roads, airstrips, and pipelines, are prohibited on the lake or lakebed and within ¼ mile of the ordinary high water mark of any deep lake as determined to be in lake zone III, i.e., depth > 4 meters (Mellor, 1985). On a case-by case basis, and in consultation with Federal, State and North Slope Borough regulatory and resource agencies (as appropriate based on agency legal authority and jurisdictional responsibility), essential pipeline, road crossings and other permanent facilities may be permitted through or in these areas where the lessee can demonstrate on a site-specific basis that impacts would be minimal or it is determined that there is no feasible or prudent alternative.

K-3 Lease Stipulation–Dease Inlet, Admiralty Bay, Elson Lagoon, and Associated Barrier Islands

Lease stipulations for Dease Inlet, Admiralty Bay, Elson Lagoon, and the Barrier Islands, contain specific criteria that have been incorporated into stipulation language. Because of sensitive biological resources and/or subsistence concerns of Dease Inlet, Admiralty Bay, Elson Lagoon, and inland of the Barrier Islands, the standard(s) for exploration and development activities are set high with the burden of proof resting with the lessee to demonstrate to the AO that granting an approval is warranted.

Objective: Protect fish and wildlife habitat, preserve air and water quality, and minimize impacts to traditional subsistence activities and historic travel routes on Dease Inlet, Admiralty Bay, and Elson Lagoon.

Requirement/Standard (Exploration): Oil and gas exploration operations (e.g., drilling, seismic exploration, and testing) are not allowed on Dease Inlet, Admiralty Bay, and Elson Lagoon (including natural and barrier islands), between May 15 and October 15 of each season. Requests for approval of any activities must be submitted in advance and must be accompanied by evidence and documentation that demonstrates to the satisfaction of the Authorized Office that the actions or activities meet all of the following criteria:

a) Exploration activities will not unreasonably conflict with traditional subsistence uses or significantly impact seasonally concentrated fish and wildlife resources.

b) There is adequate spill response capability to effectively respond during periods of broken ice and/or open water, or the availability of alternative methods to prevent well blowouts during periods when adequate response capability cannot be demonstrated. Such alternative methods may include improvements in blowout prevention technology, equipment and/or changes in operational procedures and "top-setting" of hydrocarbon-bearing zones.

c) Reasonable efforts will be made to avoid or minimize impacts related to oil spill response activities, including vessel, aircraft, and pedestrian traffic will be conducted to minimize additional impacts or further compounding of "direct spill" related impacts on area resources and subsistence uses.

d) The location of exploration and related activities shall be sited so as to not pose a hazard to navigation by the public using high-use traditional subsistence-related travel routes into and through Dease Inlet, Admiralty Bay and Elson Lagoon, as identified by the North Slope Borough, recognizing that marine and nearshore travel routes change over time, subject to shifting environmental conditions.

e) Before conducting open water activities, the lessee shall consult with the Alaska Eskimo Whaling Commission and the North Slope Borough to minimize impacts to the fall and spring subsistence whaling activities of the communities of the North Slope.

Requirement/Standard (Development): With the exception of linear features such as pipelines, no permanent oil and gas facilities are permitted on or under the water within ¾ mile seaward of the shoreline (as measured from mean high tide) of Dease Inlet, Admiralty Bay, and Elson Lagoon or the natural islands (excluding Barrier Islands). Elsewhere, permanent facilities within Dease Inlet, Admiralty Bay, and Elson Lagoon will only be permitted on or under the water if they can meet all the following criteria:

f) Design and construction of facilities shall minimize impacts to traditional subsistence uses, travel corridors, seasonally concentrated fish and wildlife resources.
g) Daily operational activities, including use of support vehicles, watercraft, and aircraft traffic, alone or in combination with other past, present, and reasonably foreseeable activities, shall be conducted to minimize impacts to traditional subsistence uses, travel corridors, and seasonally concentrated fish and wildlife resources.
h) The location of oil and gas facilities, including artificial islands, platforms, associated pipelines, ice or other roads, bridges or causeways, shall be sited and constructed so as to not pose a hazard to navigation by the public using traditional high-use subsistence-related travel routes into and through Dease Inlet, Admiralty Bay and Elson Lagoon as identified by the North Slope Borough.
i) Demonstrated year-round oil spill response capability, including the capability of adequate response during periods of broken ice or open water, or the availability of alternative methods to prevent well blowouts during periods when adequate response capability cannot be demonstrated. Such alternative methods may include seasonal drilling restrictions, improvements in blowout prevention technology, equipment and/or changes in operational procedures, and "top-setting" of hydrocarbon-bearing zones.
j) Reasonable efforts will be made to avoid or minimize impacts related to oil spill response activities, including vessel, aircraft, and pedestrian traffic that add to impacts or further compound "direct spill" related impacts on area resources and subsistence uses.
k) Before conducting open water activities, the lessee shall consult with the Alaska Eskimo Whaling Commission and the North Slope Borough to minimize impacts to the fall and spring subsistence whaling activities of the communities of the North Slope

K-4 Required Operating Procedure–Brant Survey Area

Objective: Minimize the loss or alteration of habitat for, or disturbance of, nesting and brood rearing brant in the Brant Survey Area.
Requirement/Standard:
a) Aerial surveys for brant nesting colonies and brood-rearing areas shall be conducted for a minimum of 2 years before authorization of construction of permanent facilities. At a minimum, the survey area shall include the proposed development site(s) (i.e., the footprint) and the surrounding ½-mile area. These surveys shall be conducted following accepted BLM protocol.
b) Development may be prohibited or activities curtailed within ½ mile of all identified brant nesting colonies and brood-rearing areas identified during the 2-year survey.

K-5 Required Operating Procedure–Caribou Study Area

Requirement/Standard: Before authorization of construction of permanent facilities, the lessee shall design and implement a study of caribou movement, especially during the insect season. The study would include a minimum of 3 years of current data on caribou movements. The study

design shall be approved by the AO and should provide information necessary to determine facility (including pipeline) design and location. Lessees may submit individual study proposals or they may combine with other lessees in the area to do a single, joint study for the entire Caribou Study Area. Study data may be gathered concurrently with other activities.

K-6 Lease Stipulation–Coastal Areas

Objective: Minimize hindrance or alteration of caribou movement within caribou coastal insect-relief areas; to prevent contamination of marine waters; loss of important bird habitat; alteration or disturbance of shoreline marshes; and impacts to subsistence resources activities.
Requirement/Standard: In the Coastal Area, permanent oil and gas facilities, including gravel pads, roads, airstrips, and pipelines established to support exploration and development activities shall be located at least ¾ mile inland from the coastline to the extent practicable. Where, as a result of technological limitations, economics, logistics, or other factors, a facility must be located within ¾ mile inland of the coastline, the practicality of locating the facility at previously occupied sites, such as the former Cape Simpson, Peard Bay, or Wainwright DEW-line sites, shall be considered. Use of existing sites within ¾ mile of the coastline shall also be acceptable where it is demonstrated that use of such sites will reduce impacts to shorelines or otherwise be environmentally preferable. All lessees/permittees involved in activities in the immediate area must coordinate use of these new or existing sites with all other prospective users.

K-7 Required Operating Procedure–Colville River Special Area

Objective: Prevent or minimize loss of raptor foraging habitat.
Requirement/Standard: If necessary to construct permanent facilities within the Colville River Special Area, all reasonable and practicable efforts shall be made to locate permanent facilities as far from raptor nests as feasible. Within 15 mile of raptor nest sites, significant alteration of high quality foraging habitat shall be prohibited unless the lessee can demonstrate on a site-specific basis that impacts would be minimal or it is determined that there is no feasible or prudent alternative. Of particular concern are ponds, lakes, wetlands, and riparian habitats. Note: On a case-by case basis, and in consultation with appropriate Federal and State regulatory and resource agencies, essential pipeline and road crossings will be permitted through these areas where no other options are available.

K-8 Lease Stipulation–Kasegaluk Lagoon Special Area

Objective: Protect the habitat of the fish, waterfowl, and terrestrial and marine wildlife resources of Kasegaluk Lagoon, and protect traditional subsistence uses and public access to and through Kasegaluk Lagoon for current and future generations of North Slope residents.
Requirement/Standard: Within the Kasegaluk Lagoon Special Area, oil and gas leasing is approved subject to the decision to defer the implementation of oil and gas leasing in the "Leasing Deferral Area." When leasing is implemented, no permanent oil and gas facilities are permitted within the boundary of the Special Area. Geophysical (seismic) exploration is authorized subject to the terms and conditions provided in other applicable ROP's. No restrictions are imposed on traditional subsistence activities and access for subsistence purposes
.

EXHIBIT H: SUPPLEMENTAL LEASE TERMS

Future operations in the National Petroleum Reserve - Alaska are likely to include a number of small fields with economic margins too thin to support the capital costs of onsite production facilities. To be commercially viable these small fields will likely need to be developed as satellite fields and use central production facilities located several miles away. The Bureau of Land Management believes full utilization of central production facilities is beneficial to all parties and should be encouraged. Satellite fields can be developed with lower up-front capital costs thereby increasing the likelihood that they will be brought into commercial production. The United States and State of Alaska will receive more revenue through taxes and royalties when new fields are developed. Facility owners will improve their return on invested capital increasing the likelihood the life of established infrastructure will be prolonged. And environmental impacts will be lower because fewer new facilities will be constructed and industrial expansion will be minimized. Therefore the Bureau of Land Management is providing supplemental lease terms as an incentive to meet these objectives.

Supplemental Lease Terms

(1) This lease is subject to Department of the Interior regulations now or hereafter in force governing the establishment of the value of production of gas and oil and other products produced from Federal leases for royalty purposes, including the regulations now or hereafter included in 30 C.F.R. Part 206 or applicable successor regulations, subject to the additional provisions included in this lease.

(2) The following terms apply if this lease is developed and produced as a satellite property and the production from this lease is separated or treated to be put into a marketable condition at a central facility located on a lease, unit or field that is not part of the field or unit that includes or may include this lease.

(i) Subject to the limitation prescribed in this paragraph, the lessee may deduct actual facility fees in calculating the value of production for royalty purposes, in addition to any other allowances that apply under Department of the Interior regulations applicable to Federal leases.

(ii) The facility fee allowance or deduction may not exceed $2.00 per barrel of oil equivalent, or such other amount as the Secretary of the Interior may by rule prescribe. For purposes of this provision, 5.62 thousand cubic feet of gas equals one barrel of oil equivalent.

(iii) Movement of raw production stream to the central facility from a central accumulation point on this lease or the unit of which it is a part will be regarded as transportation within the meaning of applicable transportation allowance regulations, and will not be regarded as gathering.

(iv) The total of all transportation and facility fee allowances for any production month provided under these terms and applicable rules may not exceed 50 percent of the value of the production for royalty purposes during that production month.

BID FORM AND ENVELOPE

Bidders are strongly urged to use the attached formats for the bid form and envelope. A blank bid form is provided which may be copied and filled in.

Additional Information:

1. **Name of bidding entity, official address, Tract Number.**

2. **Use large boldface type-style, such as Times New Roman Bold - 12 pt.**

3. **A statement must be included on the bid form acknowledging that the bidder(s) understand that they are legally required to comply with all applicable regulations.**

4. **Amount Bid must be in whole dollar figure.**

5. **Indicate "Amount of payment submitted with bid" (right column).**

6. **Proportional interest of joint bids must not exceed 5 decimal places; total must always equal 100%. There is no limit to the number of joint bidders that may participate.**

7. **Type Signer's name under signature; each joint bidder must sign.**

EXHIBIT I

BID FORM

NPR-A Oil and Gas Lease Sale 2006

Date of Sale: September 27, 2006

Bid Submitter:

Bureau of Land Management
Alaska State Office
222 W. 7th Avenue, #13
Anchorage, Alaska 99513-7599

NPR-A OIL AND GAS LEASE BID

It is understood that this bid legally binds the bidder(s) to comply with the regulations in Title 43 Code of Federal Regulations Subpart 3132, other applicable regulations, and requirements of the Detailed Statement of Sale.

The following bid is submitted for an oil and gas lease for the tract specified below:

Tract Number	Amount Bid	Amount of Payment Submitted with Bid
_____	_____	$_____

Bidder Name	Percent Interest	Name(s), Address(es), and Signature(s)
_____	_____	By:_____
_____	_____	By:_____
_____	_____	By:_____

TOTAL: 100.00

EXHIBIT I

SAMPLE OF BID FORM

NPR-A Oil and Gas Lease Sale **2006**
Date of Sale: September 27, 2006
Bid Submitter: **Let's Explore**

Bureau of Land Management
Alaska State Office
222 W. 7th Avenue, #13
Anchorage, Alaska 99513-7599

NPR-A OIL AND GAS LEASE BID

It is understood that this bid legally binds the bidder(s) to comply with the regulations in Title 43 Code of Federal Regulations Subpart 3132, other applicable regulations, and requirements of the Detailed Statement of Sale.

The following bid is submitted for an oil and gas lease on the tract specified below:

Tract Number	Amount Bid	Amount of Payment Submitted with Bid
2006-**X-XXX**	$**6,157,623**	$**1,231,524.60**

Bidder Name	Percent Interest	Name(s), Address(es), and Signature(s)
Explorer LTD.	**33.33**	**Explorer LTD** **Box 123456** **Dime Box, Texas 12345** By: (signature) **I. W. In** **Vice President**
Oil Musher's Inc.	**33.33**	**Oil Musher's Inc.** **General Delivery** **Cicely, Alaska 99000** By: (signature) **M. E. Too, II** **Attorney-in-Fact**
Let's Explore	**33.34**	**Let's Explore** **246 Muskeg Lane** **Anchorage, Alaska 99000** By: (signature) **I. Al So** **President**
TOTAL:	100.00	

EXHIBIT I

Sample Bid Envelope

1. Use standard size envelopes not to exceed 4-1/2" x 10-1/2" when submitting bids.

2. Use large boldface type, such as Times New Roman Bold - 12 pt.

Let's Explore

Tract No.

SEALED BID FOR NPR-A OIL AND GAS LEASE SALE 2006
NOT TO BE OPENED UNTIL 9:00 A.M., September 27, 2006

Exhibit J

United States Department of the Interior
Bureau of Land Management
Alaska State Office
222 W. 7th Avenue, #13
Anchorage, AK 99513-7599

Bidder Contact Form
NPR-A Oil and Gas Lease Sale

Bidder Name:_____
(Bidder submitting bids)

Signature:_____

Title_____

Area Code - Phone Number_____

Date_____

I. Payments and Refunds
Indicate below the contact for notification of bid acceptance and payment instructions for the 4/5ths bonus and first year rental amounts (please also indicate an alternate):

_____
(Name) **(Alternate)**

_____
(Company or Bidder)

_____
(Area Code - Phone Number)

_____
(Area Code - Fax Number)

II. Deliver Leases to: (Federal Express requires Street Address and Zip Code)

_____
(Company/Bidder)

_____
(Street)

_____
(City) **(State)** **(Zip)**

_____
(Attention)

_____
(Area Code - Phone Number)

III. Return of Unsuccessful Checks
The bid deposit check or checks for unsuccessful bids will be returned to only one bidder within a bidding combine. Indicate preferred method of delivery:

☐ **Pick-up at Alaska State Office**

_____
(Individual Authorized to Pick up Checks)

_____
(Company/Bidder)

_____
(Area Code - Phone Number)

☐ **Mail to: (Federal Express requires Street Address and Zip Code)**

_____
(Company/Bidder)

_____
(Street)

_____
(City) **(State)** **(Zip)**

_____
(Attention)

_____
(Area Code - Phone Number)

IV. Return of Deposit for Rejected Bids
All refunds for rejected bids will be made to only one bidder within a bidding combine. Indicate in which manner you would like these refunds returned.

☐ **Mail** ☐ **Pick-up at Alaska State Office**

_____
(Name of Authorized Individual)

_____
(Address)

_____
(City) **(State)** **(Zip)**

_____
(Phone Number)

****RETURN AT TIME OF BID SUBMISSION - DO NOT ENCLOSE IN ENVELOPE****

Exhibit K

Form 3000-4
(June 1988)

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

OIL AND GAS OR GEOTHERMAL LEASE BOND

Act of February 25, 1920 (30 U.S.C. 181 et seq.)
Act of August 7, 1947 (30 U.S.C. 351-359)
Department of the Interior Appropriations Act, FY 1981 (42 U.S.C. 6508)
Act of December 24, 1970 (30 U.S.C. 1001-1025)
Other Oil and Gas and Geothermal Leasing Authorities as Applicable

Bond Number

Lease Serial Number (For Individual Bond Only)

CHECK ONE ☐ OIL AND GAS ☐ GEOTHERMAL RESOURCES

CHECK ONE
☐ SURETY BOND

KNOW ALL BY THESE PRESENTS, THAT _____
(name)

of _____
(address)

as principal, and _____
(name)

of _____, as surety,
(address)

are held and firmly bound unto the United States of America in the sum of _____

_____ dollars ($ _____),

lawful money of the United States, which may be increased or decreased by a rider hereto executed in the same manner as this bond.

☐ PERSONAL BOND

KNOW ALL BY THESE PRESENTS, That _____
(name)

of _____, as principal, is held and firmly
(address)

bound unto the United States of America in the sum of _____

_____ dollars ($ _____), lawful money of the United States which sum may be

increased or decreased by a rider hereto executed in the same manner as this bond.

The principal, in order to more fully secure the United States in the payment of the aforesaid sum, hereby pledges as security therefore United States negotiable securities of a par value equal to the amount specified. The principal, pursuant to the authority conferred by Section 1 of the Act of September 13, 1982 (31 U.S.C. 9303), does hereby constitute and appoint the Secretary of the Interior to act as his attorney. The interest accruing on the United States securities deposited, in the absence of any default in the performance of any of the conditions, or stipulations set forth in this bond and the instrument(s) granting rights and interests in Federal lands, must be paid to the principal. The principal hereby for himself/herself, any heirs, executors, administrators, successors, and assigns, joint and severally, ratifies and confirms whatever the Secretary shall do by virtue of these presents.

The principal/surety shall apply this bond or the Secretary shall transfer this deposit as security for the faithful performance of any and all of the conditions and stipulations as set forth in this bond and the instruments granting rights and interests in Federal lands. In the case of any default in the performance of the conditions and stipulations of such undertaking, it is agreed that: (1) for a Surety Bond, the surety/principal shall apply the bond or any portion thereof; (2) for a Personal Bond, the Secretary shall have full power to assign, appropriate, apply or transfer the deposit or any portion thereof, to the satisfaction of any damages, assessments, late payment charges, penalties, or deficiencies arising by reason of such default.

This bond is required for the use and benefit of (1) the United States; (2) the owner of any of the land subject to the coverage of this bond, who has a statutory right to compensation in connection with a reservation of the oil and gas and geothermal deposits to the United States; (3) any lessee, permittee. or contractor, under a lease, permit, or resource sale contract issued, or to be issued, by the United States covering the same land subject to this bond, covering the use of the surface or the prospecting for, or the development of other mineral deposits in any portion of such land, to be paid to the United States. For such payment, well and truly to be made, we bind ourselves and each of our heirs, executors, administrators, successors, and assigns, jointly and severally.

This bond shall cover all surface disturbing activities related to drilling operations on a Federal leasehold(s) in accordance with authorization(s) granted under the Acts cited above for:

CHECK ONE:

☐ NATIONWIDE BOND — Operations conducted by or on behalf of the principal(s) or on the leasehold(s) of the principal(s) in the United States including the National Petroleum Reserve in Alaska (NPR-A) when a rider sufficient to bring the amount in conformance with 43 CFR 3134 is provided, and provided a rider is obtained, also coverage of multiple exploration operations.

☐ STATEWIDE BOND — Operations conducted by or on behalf of the principal(s) or on the leasehold(s) of the principal(s), except the NPR-A, and, provided a rider is obtained, also coverage of multiple exploration operations within the single state of _____ .

☐ INDIVIDUAL BOND — Operations conducted by or on behalf of the principal or on the leasehold of the principal on the single lease identified by the serial number above.

NATIONAL PETROLEUM RESERVE IN ALASKA (NPR-A) BOND — This bond shall cover:

☐ NPR-A LEASE BOND — The terms and conditions of a single lease.

☐ NPR-A WIDE BOND — The terms and conditions of all leases. and provided a rider is obtained, coverage of multiple exploration operations.

(Continued on page 2)

BOND CONDITIONS

The conditions of the foregoing obligations are such that:

1. WHEREAS the principal has an interest in a lease(s) and/or responsibility for operations on a lease(s) issued under the Acts cited in this bond; and

2. WHEREAS the principal and surety agree(s) that with notice to the surety the coverage of this bond, in addition to the present holding(s) of and/or authorization(s) granted to the principal, shall extend to and include:

a. Any lease(s) hereafter issued to or acquired by the obligor/principal, except under individual lease bonds, the coverage is to be confined to the principal's holding(s) and/or authorization(s) granted under the Acts cited in this bond, and to become effective immediately upon such authorization, approval or issuance of a transfer in favor of the principal; and

b. Any transfer(s) of operating rights hereafter entered into or acquired by the principal affecting lease(s); and

c. Any activity subsequent hereto of the principal as operator under a lease(s) issued pursuant to the Acts cited in this bond; and

Provided, That the surety may elect to terminate the additional coverage authorized under this paragraph. Such termination will become effective 30 days after the BLM receives notice of the election to terminate. After the termination becomes effective, the additional interest(s) identified in this paragraph will not be covered by this bond; and

3. WHEREAS the principal and surety agree(s) that with notice to the surety that this bond shall remain in full force and effect notwithstanding: Any assignment(s) of an undivided interest in any part or all of the lands in the lease(s) in which event the assignee(s) shall be considered to be coprincipal(s) on an individual or NPR-A bond as fully and to the same extent as though his/her or their duly, authenticated signatures appeared thereon; and

4. WHEREAS the obligor/surety hereby waives any right to notice of, and agrees that this bond shall remain in full force and effect notwithstanding:

a. Any assignment(s) of 100% of some of the lands described in the lease(s), the bond to remain in full force and effect only as to the lands retained in the lease(s); and

b. Any transfer(s) either in whole or in part, of any or all of the operating rights and further agrees to remain bound under this bond as to the interests in the operating rights retained by the principal; and

c. Any modification of a lease or operating right, or obligation thereunder, whether made or effected by commitment of lease or operating right to unit, cooperative, communitization or storage agreements, or development contracts, suspensions of operations or production, waivers, suspensions or changes in rental, minimum royalty and royalties, compensatory royalty payments, or otherwise; and

d. Any extension of a lease(s) covered by this bond, such coverage to continue without any interruption due to the expiration of the term set forth in the lease(s); and

5. WHEREAS the principal and surety hereby agree(s) that notwithstanding the termination, expiration, cancellation or relinquishment of any lease(s), whether by operation of law or otherwise, the bond shall remain in full force and effect as to the terms and conditions of all remaining leases and obligations covered by the bond; and

6. WHEREAS the principal, as to any lease or part of a lease for land on which he/she is the operator, in consideration of being permitted to furnish this bond in lieu of the lessee(s) or operating rights owner(s), agrees and by these presents does hereby bind himself/herself to fulfill on behalf of each lessee or operating rights owner all obligations of such for the entire leasehold in the same manner and to the same extent as though he/she were lessee or operating rights owner; and

7. WHEREAS the obligor/principal and surety agree(s) that the neglect or forbearance of said lessor in enforcing, as against any responsible party, the payment of rentals or royalties or the performance of any other term or condition of the lease(s) shall not, in any way, release the principal and surety, or either of them from any liability under this bond; and

8. WHEREAS the principal and surety agree(s) that in the event of any default under the lease(s) the lessor may commence and prosecute any claim, suit, or other proceeding against the principal and surety or either of them, without the necessity of joining the lessee(s); and

9. WHEREAS if the principal fails to comply with any provisions of an oil and gas lease, and the noncompliance continues for thirty (30) days after written notice thereof, such lease shall be subject to cancellation and the principal shall also be subject to applicable provisions and penalties of the Federal Oil and Gas Royalty Management Act (30 U.S.C. 1701 et seq.) or the Federal Onshore Oil and Gas Leasing Reform Act. This provision shall not be construed to prevent the exercise by the United States of any other legal and equitable remedy, including waiver of the default.

10. NOW, THEREFORE If said principal, his/her heirs, executors, administrators, successors, or assigns shall in all respects faithfully comply with all of the provisions of the instrument(s) granting rights and interests in Federal lands referred to above, then the obligations are to be void; otherwise to remain in full force and effect.

Signed this _____ day of _____ , 20 _____ , in the presence of:

NAMES AND ADDRESSES OF WITNESSES

_____	_____ (L.S.) (Principal)
_____	_____ (Business Address)
_____	_____ (L.S.) (Surety)
_____	_____ (Business Address)

If this bond is executed by a corporation, it must bear the seal of that corporation.

EXHIBIT L

U.S. DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
ALASKA STATE OFFICE – ANCHORAGE, ALASKA

NATIONAL PETROLEUM RESERVE-ALASKA WIDE
OIL AND GAS LEASE BOND
GEOPHYSICAL EXPLORATION RIDER

Department of the Interior Appropriations Act, Fiscal Year 1981 (P.L. 96-514)
Other Oil and Gas Leasing Authorities as Applicable

==========

Coverage under National Petroleum Reserve-Alaska Oil and Gas Lease Bond, which has been assigned Serial Number _____, or which is being filed concurrently with this rider in the Alaska State Office of the Bureau of Land Management, is hereby extended to include oil and gas exploration operations as prescribed by the regulations at 43 CFR 3152.

Signed this _____day of _____, 20___in the presence of:

NAMES AND ADDRESSES OF WITNESSES:

_____	_____
(Signature of Witness)	**(Signature of Principal)**
_____	_____
_____	_____
(Address)	**(Business Address)**
_____	_____
(Signature of Witness)	**(Signature of Suretyl)**
_____	_____
_____	_____
(Address)	**(Business Address)**

==========

Serial No.

EXHIBIT M

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
ALASKA STATE OFFICE
OFFER TO LEASE AND LEASE FOR OIL AND GAS

The undersigned (reverse) offers to lease all or any of the lands in Item 2 that are available for lease pursuant to the Mineral Leasing Act of 1920, as amended and supplemented (30 U.S.C. 181 et seq.), the Mineral Leasing Act for Acquired Lands of 1947, as amended (30 U.S.C. 351-359), the Attorney General's Opinion of April 2, 1941 (40 Op. Atty. Gen. 41), or the Naval Petroleum Reserve Production Act of 1976 (42 U.S.C. 6501 et seq.), as amended.

READ INSTRUCTIONS BEFORE COMPLETING

1. Name

Street

City, State, Zip Code

2. This application/offer/lease is for Public Domain Lands in the National Petroleum Reserve - Alaska (NPR-A)

Legal description of land requested: *Tract No.: _____ * Sale Date (m/d/y): _____ / _____ / _____

***SEE INSTRUCTIONS BELOW PRIOR TO COMPLETING PARCEL NUMBER AND SALE DATE**

T.	R.	Meridian	State	County

Total acres applied for _____

Amount remitted: Filing fee $_____ Rental fee $_____ Total $_____

DO NOT WRITE BELOW THIS LINE

3. Land included in lease:

T.	R.	Meridian	State	County

Total acres in lease _____

Rental retained $ _____

This lease is issued granting the exclusive right to drill for, mine, extract, remove and dispose of all the oil and gas (except helium) in the lands described in Item 3 together with the right to build and maintain necessary improvements thereupon for the term indicated below, subject to renewal or extension in accordance with the appropriate leasing authority. Rights granted are subject to applicable laws, the terms, conditions, and attached stipulations of this lease, the Secretary of the Interior's regulations and formal orders in effect as of lease issuance, and to regulations and formal orders hereafter promulgated when not inconsistent with lease rights granted or specific provision of this lease.

NOTE: This lease is issued to the high bidder pursuant to his/her duly executed bid or nomination form submitted under 43 CFR Part 3130 and is subject to the provisions of that bid or nomination and those specified on this form.

THE UNITED STATES OF AMERICA

Type and primary term of lease:

[ ] Noncompetitive lease (ten years)

[ ] Competitive lease (ten years)

[X] Other Competitive NPR-A Lease (ten years)

by _____
(Signing Officer)

_____ _____
(Title) (Date)

EFFECTIVE DATE OF LEASE _____

4. (a) Undersigned certifies that (1) offeror is a citizen of the United States; an association of such citizens; a municipality; or a corporation organized under the laws of the United States or of any State or Territory thereof; (2) all parties holding an interest in the offer are in compliance with 43 CFR Part 3132.1 and the leasing authorities; (3) offeror is not considered a minor under the laws of the State in which the lands covered by this offer are located.

(b) Undersigned agrees that signature to this offer constitutes acceptance of this lease, including all terms, conditions, and stipulations of which offeror has been given notice, and any amendment or separate lease that may include any land described in this offer open to leasing at the time this offer was filed but omitted for any reason from this lease. The offeror further agrees that this offer cannot be withdrawn, either in whole or in part.

This offer will be rejected and will afford offeror no priority if it is not properly completed and executed in accordance with the regulations, or if it is not accompanied by the required payments. 18 U.S.C. Sec. 1001 makes it a crime for any person knowingly and willfully to make to any Department or agency of the United States any false, fictitious or fraudulent statements or representations as to any matter within its jurisdiction.

NOTICE

The Privacy Act of 1974 and the regulations at 43 CFR 2.48(d) provide that you be furnished with the following information:

AUTHORITY: 50 Stat. 900; 25 U.S.C. 500

PRINCIPAL PURPOSE: The primary uses of the records are (1) to determine your qualification to receive an oil and gas lease; and (2) to provide information concerning oil and gas leases for administrative and public use.

ROUTINE USES: BLM and the Department of the Interior (DOI) may disclose your information on this form: (1) to members of the public who have a need for the information that is maintained by BLM for public record; (2) to the U.S. Department of Justice, court, or other adjudicative body when DOI determines the information is necessary and relevant to litigation; (3) to appropriate Federal, State, local or foreign agencies responsible for investigating, prosecuting violations, enforcing or implementing this statute, regulation, or lease; and (4) to a congressional office when you request the assistance of the Member of Congress in writing.

EFFECT OF NOT PROVIDING THIS INFORMATION: If you do not furnish all the information required by this form, your application may be rejected.

Duly executed this _____ day of _____ , 20 _____ . _____

(Signature of Lessee or Attorney-in-fact)

LEASE TERMS

Sec. 1. Rentals - Rentals must be paid to the proper office of lessor in advance of each lease year. Annual rental rates per acre or fraction thereof are:

(a) Noncompetitive lease, $1.50 for the first 5 years; thereafter $2.00
(b) Competitive lease, $1.50, for the first 5 year; thereafter $2.00
(c) Other, see attachment; or for NPR-A: $5.00 for Area A; $3.00 for Area B; or as specified in the detailed statement of sale

If this lease or a portion thereof is committed to an approved cooperative or unit plan which includes a well capable of producing leased resources, and the plan contains a provision for allocation of production, royalties shall be paid on the production allocated to this lease. However, annual rentals shall continue to be due at the rate specified in (a), (b), or (c) for those lands not within a participating area.

Failure to pay annual rent, within 30 days after receipt of a Notice of Delinquency shall cause this lease to terminate. Rentals may be waived, reduced, or suspended by the Secretary upon a sufficient showing by lessee.

Sec. 2. Royalties – Royalties shall be paid to the proper office of lessor. Royalties shall be computed in accordance with regulations on production removed or sold. Royalty rates are:

(a) Noncompetitive lease, 12 ½%;
(b) Competitive lease, 12 ½%;
(c) Other, see attachment, or for NPR-A: 16 2/3% for Area A; 12 ½% for Area B; or as specified in the detailed statement of sale.

Lessor reserves the right to specify whether royalty is to be paid in value or in kind, and the right to establish reasonable minimum values on products after giving lessee notice and an opportunity to be heard. When paid in value, royalties shall be due and payable on the last day of the month following the month in which production occurred. When paid in kind, production shall be delivered, unless otherwise agreed to by lessor, in merchantable condition on the premises where produced without cost to lessor. Lessee shall not be required to hold such production in storage beyond the last day of the month following the month in which production occurred, nor shall lessee be held liable for loss or destruction of royalty oil or other products in storage from causes beyond the reasonable control of the lessee.

Minimum royalty in lieu of rental of not less than the rental which otherwise would be required for that lease year shall be payable at the end of each lease year beginning on or after a discovery in paying quantities. This minimum royalty may be waived, suspended, or reduced and the above royalty rates may be reduced, for all or portions of the lease if the Secretary determines that such action is necessary to encourage the greatest ultimate recovery of the leased resources, or is otherwise justified.

An interest charge shall be assessed on the late royalty payments or underpayments in accordance with the Federal Oil and Gas Royalty Management Act of 1982 (FOGRMA) (30 U.S.C. 1701). Lessee shall be liable for royalty payments on oil and gas loss or wasted from a lease site when such loss or waste is due to negligence on the part of the operator, or due to the failure to comply with any rules, regulations, orders, or citations issued under FOGRMA or the leasing authority.

Sec. 3. Bonds – A bond shall be filed and maintained for lease operations as required under regulations.

Sec. 4. Diligence, rate of development, unitization, and drainage – Lessee must exercise reasonable diligence in developing and producing, and must prevent unnecessary damage to, loss of, or waste of leased resources. Lessor reserves the right to specify rates of development and production in the public interest and to require lessee to subscribe to a cooperative or unit plan, within 30 days of notice, if deemed necessary for proper development and operation of area, field, or pool embracing these leased lands. Lessee shall drill and produce wells necessary to protect leased lands from drainage or pay compensatory royalty for drainage in amount determined by lessor.

Sec. 5. Documents, evidence, and inspection – Lessee shall file with the proper office of lessor, not later than 30 days after effective date thereof, any contract or evidence of other arrangement for sale or disposal of production. At such times and in such form as lessor may prescribe, lessee shall furnish detailed statements showing amounts and quality of all products removed and sold, proceeds therefrom, and amount used for production purposes or unavoidably lost. Lessee may be required to provide plats and schematic diagrams showing development work and improvements, and reports with respect to parties in interest, expenditures, and depreciation costs. In the form prescribed by lessor, lessee shall keep a daily drilling record, a log, information on well surveys and tests, and a record of subsurface investigations and furnish copies to lessor when required. Lessee shall keep open at all reasonable times for inspection by any authorized officer of lessor, the leased premises and all wells, improvements, machinery, and fixtures thereon, and all books, accounts, maps, and records relative to operations, surveys, or investigations on or in the leased lands. Lessee shall maintain copies of all contracts, sales agreements, accounting records, and documentation such as billings, invoices, or similar documentation that support costs claimed as manufacturing, preparation, and/or transportation costs. All such records shall be maintained in lessee's accounting office for future audit by lessor. Lessee shall maintain required records for 6 years after they are generated or, if an audit or investigation is underway, until released of the obligation to maintain such records by lessor.

During existence of this lease, information obtained under this section shall be closed to inspection by the public in accordance with the Freedom of Information Act (5 U.S.C. 552)

Sec. 6. Conduct of operations – Lessee shall conduct operations in a manner that minimizes adverse impacts to the land, air, and water, to cultural, biological, visual, and other resources, and to other land uses or users. Lessee shall take reasonable measures deemed necessary by lessor to accomplish the intent of this section. To the extent consistent with lease rights granted, such measures may include, but are not limited to, modification to siting or design of facilities, timing of operations, and specification of interim and final reclamation measures. Lessor reserves the right to continue existing uses and to authorize future uses upon or in the leased lands, including the approval of easements or rights-of-way. Such uses shall be conditioned so as to prevent unnecessary or unreasonable interference with the rights of lessee.

Prior to disturbing the surface of the leased lands, lessee shall contact lessor to be apprised of procedures to be followed and modifications or reclamation measures that may be necessary. Areas to be disturbed may require inventories or special studies to determine the extent of impacts to other resources. Lessee may be required to complete minor inventories or short term special studies under guidelines provided by lessor. If, in the conduct of operations, threatened or endangered species, objects of historic or scientific interest, or substantial unanticipated environmental effects are observed, lessee shall immediately contact lessor. Lessee shall cease any operations that would result in the destruction of such species or objects.

Sec. 7. Mining operations – To the extent that impacts from mining operations would be substantially different or greater than those associated with normal drilling operations, lessor reserves the right to deny approval of such operations.

Sec. 8. Extraction of helium – Lessor reserves the option of extracting or having extracted helium from gas production in a manner specified and by means provided by lessor at no expense or loss to lessee or owner of the gas. Lessee shall include in any contract of sale of gas the provision of this section.

Sec. 9. Damages to property – Lessee shall pay lessor for damage to lessor's improvements, and shall save and hold lessor harmless from all claims for damage or harm to persons or property as a result of lease operations.

Sec. 10. Protection of diverse interests and equal opportunity – Lessee shall pay when due, all taxes legally assessed and levied under laws of the State or the United States; accord all employees complete freedom of purchase; pay all wages at least twice each month in lawful money of the United States, maintain a safe working environment in accordance with standard industry practices; and take measures necessary to protect the health and safety of the public.

Lessor reserves the right to ensure that production is sold at reasonable prices and to prevent monopoly. If lessee operates a pipeline, or owns controlling interest in a pipeline or a company operating a pipeline, which may be operated accessible to oil derived from these leased lands, lessee shall comply with section 28 of the Mineral Leasing Act of 1920.

Lessee shall comply with Executive Order No. 11246 of September 24, 1965, as amended, and regulations and relevant orders of the Secretary of Labor issued pursuant thereto. Neither lessee nor lessee's subcontractors shall maintain segregated facilities. During the performance of this lease, the lessee must comply fully with paragraphs (1) through (7) of 41 CFR 60-1.4(a) with respect to employment discrimination on the basis of race, color, religion, sex, or national origin, and must incorporate the requirements set forth in those paragraphs in every subcontract or purchase order, as provided by that regulation.

Sec. 11. Transfer of lease interests and relinquishment of lease – As required by regulations, lessee shall file with lessor any assignment or other transfer of an interest in this lease. Lessee may relinquish this lease or any legal subdivision by filing in the proper office, a written relinquishment, which shall be effective as of the date of filing, subject to the continued obligation of the lessee and surety to pay all accrued rentals and royalties.

Sec. 12. Delivery of premises – At such time as all or portions of this lease are returned to lessor, lessee shall place affected wells in condition for suspension or abandonment, reclaim the land as specified by lessor, and within a reasonable period of time, remove equipment and improvements not deemed necessary by lessor for preservation of producible wells.

Sec. 13. Proceedings in case of default – If lessee fails to comply with any provisions of this lease, and the noncompliance continues for 30 days after written notice thereof, this lease shall be subject to cancellation unless or until the leasehold contains a well capable of production of oil and gas in paying quantities or the lease is committed to an approved cooperative or unit plan or communitization agreement which contains a well capable of production of unitized substances in paying quantities. This provision shall not be construed to prevent the exercise by lessor of any other legal and equitable remedy, including waiver of the default. As such, remedy or waiver shall prevent later cancellation of the same default occurring at any other time. Lessee shall be subject to applicable provisions and penalties of FOGRMA (30 U.S.C. 1701).

Sec. 14. Heirs and successors-in-interest – Each obligation of this lease shall extend to and be binding upon and every benefit hereof shall inure to: the heirs, executors, administrators, successors, beneficiaries, or assignees of the respective parties hereto.

INSTRUCTIONS

A. General

1. The front of this form is to be completed only by parties filing for a noncompetitive lease. The BLM will complete front of the form for all other types of leases.
2. Entries must be typed or printed plainly in ink. Offeror must sign Item 4 in ink.
3. An original and two copies of this offer must be prepared and filed in the proper BLM State Office. See regulations at 43 CFR 1821.2-1 for office locations.
4. If more space is needed, additional sheets must be attached to each copy of the form submitted.

B. Special:

Item 1 - Enter offeror's name and billing address.

Item 2 - A single tract number and Sale Date shall be the only acceptable description.

Item 3 - This space will be completed by the United States.

PAPERWORK REDUCTION ACT STATEMENT

The Paperwork Reduction Act of 1990 (44 U.S.C. 3501 et seq.) requires us to inform you that:

1. This information is being collected pursuant to the law.
2. This information will be used to create and maintain a record of oil and gas lease activity.
3. Response to this request is required to obtain a benefit.

EFFECT OF NOT PROVIDING INFORMATION - If you do not provide all the information, the offer may be rejected. See regulations at 43 CFR Part 3130.