Oil and Gas Lease Utilization, Onshore and Offshore

Updated Report to the President

U.S. Department of the Interior
May 2012

INTRODUCTION AND EXECUTIVE SUMMARY

On March 11, 2011, President Obama directed the Department of the Interior (Department) to determine the acreage of public lands that had been leased to oil and gas companies but remain undeveloped, noting that companies should be encouraged to produce energy from leases that they are holding. The Report reached several important conclusions: First, the Department has offered substantial acreage for leasing and resource development, but much of this acreage has not been leased by industry. Second, tens of millions of acres that are currently under lease remain idle. Because these areas are not undergoing exploration, development, or production, taxpayers are not getting the full advantage of America's resource potential.

Soon after the release of the Report, the President released a *Blueprint for a Secure Energy Future,* a comprehensive energy strategy to secure America's energy future by producing more conventional energy at home while working to reduce our dependence on oil by leveraging cleaner, alternative fuels and greater efficiency. Included in the *Blueprint* were a number of steps to encourage safe and responsible domestic energy production both onshore and offshore – including steps to encourage diligent development.

This Report updates the Department's 2011 Report, outlines some of the policies that are being implemented, consistent with last year's findings and the *Blueprint*, and describes some of the geographic areas that best reflect the promise of this Nation's onshore and offshore energy resources.

For both onshore and offshore, the report describes:

Leasing Trends and Unused Acreage

In 2011 alone, the Department offered about 21 million offshore acres for oil and gas development. And, we are continuing to offer substantial acreage where the oil is. Next month, on June 20, 2012, the Department will offer more than 38 million acres as part of a lease sale in the Central Gulf of Mexico, an area estimated to hold close to 31 billion barrels of oil and 134 trillion cubic feet of natural gas that are currently undiscovered and technically recoverable – and home to some of the most promising deepwater prospects. Onshore, the Department offered 1.2 million onshore acres for lease during fiscal year 2011, as well as an additional 3 million acres in the first quarter of FY 2012 alone.

- Offshore, Gulf of Mexico lease sales typically offer virtually all unleased available acreage.
- Onshore, industry expresses interest in leasing lands. Thus, industry plays a large role in driving the amount of parcels/acres being offered and leased.

There are approximately 26 million leased acres offshore and over 20 million leased acres onshore that are currently idle – that is, not undergoing exploration, development, or production.

Offshore: As of May 2012, nearly 72 percent of the area on the Outer Continental Shelf (OCS) that companies have leased for oil and gas development – totaling 26 million acres – are not producing or not subject to pending or approved exploration or development plans.

In the Gulf of Mexico, which holds the largest volume of undiscovered technically recoverable resource (UTRR) on the OCS, 32 million acres are under lease. However, only approximately 10 million acres have approved exploration or development plans, and only 6.4 million of these acres are in production. Leased areas in the Gulf of Mexico – that are not producing or not subject to pending or approved exploration and development plans – are estimated to contain 17.9 billion barrels of UTRR oil and 49.7 trillion cubic feet of UTRR natural gas.

Onshore: As of December 31, 2011, approximately 56 percent of total acres of public land under lease in the Lower 48 States – totaling approximately 20.7 million acres - are not undergoing either production nor exploration activities.

As of September 30, 2011, there are over 7,000 approved permits to drill on public and Indian lands that have not yet been acted on by companies.

Roughly 76 percent of the onshore acres offered for sale between October 1, 2010, and September 30, 2011, were bid on and sold for oil and gas activities.

Policy actions to-date

The Department is committed to providing companies with incentives for rapid development of oil and gas production from existing and future leases. For offshore, reforms since 2009 have included establishment of escalating rentals, restructured initial lease terms in certain water depths, and higher minimum bids for lease sales, all to encourage diligent development and fair return to taxpayers. Onshore, reforms have focused on new leasing policies that establish a more orderly, open, and environmentally sound process for efficient development of oil and gas resources on public lands. The Department also is developing an Advanced Notice of Proposed Rulemaking (ANPR) seeking input on potential incentives to encourage timely development of unused onshore leases.

Moving forward – spotlight on key prospects

This Report also describes some of the most promising areas for development, both onshore and offshore. Because of the significant resource potential that these areas demonstrate, they are central to the focus of DOI and its bureaus as we advance our efforts to pursue safe and responsible exploration and development both offshore and onshore.

This report was prepared by the Department's Office of Policy Analysis; data sets used in the report were compiled by the United States Geological Survey (USGS), Bureau of Land Management (BLM), and Bureau of Ocean Energy Management (BOEM).

OFFSHORE OIL AND GAS LEASES

Background

The BOEM manages energy and mineral resources on the Nation's OCS to help meet the energy demands and other needs of the Nation while balancing development with the protection of the human, marine, and coastal environments.

For the purposes of this report, the areas of the OCS leased for offshore oil and gas development can be broadly categorized as:

- Total acres under lease;
- "Active leases," or leased areas that are subject to exploration, development, or production; and
- "Inactive leases" or leased areas that are not producing nor currently covered by an approved exploration or development plan. These areas may be subject to certain activities such as geophysical and geotechnical analysis, including seismic and other types of surveys.

The regulatory process governing offshore oil and gas exploration and development can be briefly summarized as follows:

- Leasing: The Secretary of the Interior (Secretary) must prepare a Five-Year OCS Oil and Gas Leasing Program consisting of a schedule of oil and gas lease sales indicating the size, timing, and location of proposed leasing activity the Secretary determines will best meet national energy needs. Preparing a Five-Year program involves extensive public comment and requires the Secretary to balance many factors including the potential for the discovery of oil and natural gas, the potential for environmental damage, and the potential for adverse effects on the coastal zone. An area must be included in the Five-Year program in order to be offered for leasing. There is an additional public process for each lease sale to determine whether to hold the lease sale or modify the sale area, and what terms and conditions to apply to leases. The BOEM is currently finalizing the OCS Oil and Gas Leasing Program for 2012-2017, described in more detail below. The Department released the Proposed Five-Year Program in November 2011.

- Exploration: Exploration activities include geophysical exploration and exploratory drilling. Prior to conducting any exploratory drilling activity on a lease, an Exploration Plan (EP) must be submitted to BOEM for approval. The EP describes exploration activities planned by the operator for a specific lease(s), the timing of these activities, information concerning drilling rigs, the location of each well, and other relevant information.

- Development: Before an operator can begin development or production activities, a Development and Production Plan (DPP), or a Development Operations Coordination Document (DOCD) must be submitted for approval to BOEM.[1] The plan describes a schedule of development activities, platforms, or other facilities including environmental monitoring features and other relevant information. As with EPs, BOEM can require modification of a plan.

  The BOEM is committed to conducting efficient and thorough reviews of these plans, and to ensuring that the process is rigorous, efficient, and transparent. BOEM works collaboratively with industry throughout the review of plans, with the goals of ensuring that operators comply with BOEM's heightened operational and environmental standards and that the review process is efficient. The BOEM currently conducts a full, site-specific environmental assessment on all deepwater exploration and development plans. The Bureau of Safety and Environmental Enforcement (BSEE) reviews and approved APD's that leads to production.

Leasing Trends and Unused Acreage

The Administration is committed to making the offshore areas with the most substantial resources available to companies, and to incentivizing diligent development of leases. The *Deepwater Horizon* blowout and oil spill made clear the tremendous human and environmental costs that can come from deepwater oil and gas drilling when proper safeguards are not followed. In light of lessons learned, BSEE has taken significant actions to reform and strengthen our offshore drilling safety regime to increase safety and preparedness. Consistent with heightened standards, offshore oil and gas exploration and development is moving forward, and industry is making significant investments in the Gulf of Mexico and elsewhere.

On December 14, 2011, BOEM held Western Gulf of Mexico Lease Sale 218, the first sale since *Deepwater Horizon,* which attracted over 240 bids on 191 tracts, with nearly $338 million in total high bonus bids -- about $100 million more than the average for Western Gulf sales over the previous decade. The Administration has announced that BOEM will hold Consolidated Central Gulf of Mexico Lease Sale 216/222 on June 20, 2012. Sale 216/222 will make available all unleased, eligible areas in the Central Gulf of Mexico, a planning area that BOEM estimates contains close to 31 billion barrels of oil and 134 trillion cubic feet of natural gas that are currently undiscovered and technically recoverable. The Central Gulf alone is estimated to hold about a third of the undiscovered resources of the OCS.

Sale 216/222 is the last remaining sale scheduled in the 2007 – 2012 OCS Oil and Natural Gas Leasing Program. As the President discussed in his State of the Union, the Department is finalizing the next Five-Year Program for 2012-2017, which, as proposed, would make more than 75 percent of estimated undiscovered technically recoverable oil

[1] Leases in the Central and Western Gulf of Mexico Planning Areas require a "Development Operations Coordination Document (DOCD)."

and gas resources on the OCS available for development. The Proposed Outer Continental Shelf Oil and Gas Leasing Program for 2012-2017 schedules 12 potential lease sales in the Gulf of Mexico, as well as three potential sales in Alaska's Cook Inlet, Chukchi Sea, and Beaufort Sea.

Although BOEM continues to make significant new resources available, our analysis shows that significant existing, leased resources remain unexplored and undeveloped.

Overall, as of May 2012, nearly 72 percent (totaling 25.7 million acres) of acres on the Outer Continental Shelf that companies have leased for oil and gas development are not producing or not subject to pending or approved exploration and development plans. This compares to over 72 percent as of March 1, 2011.

In all Federal areas of the Gulf of Mexico, approximately 69 percent of acreage that is currently under lease is not producing or subject to pending or approved exploration or development plans. In the Gulf of Mexico, which holds the largest volume of undiscovered technically recoverable resource (UTRR) on the OCS, approximately 31.9 million acres are under lease. However, only approximately, 9.8 million acres have approved exploration or development plans, and 6.4 million of the 9.8 million acres are in production. Leased areas in the Gulf of Mexico that are not producing or not subject to pending or approved exploration and development plans are estimated to contain 17.9 billion barrels of UTRR oil and 49.7 trillion cubic feet of UTRR natural gas *(see Table 2).*

In addition, offshore permitting is nearly back to pre-*Deepwater Horizon* levels, while at the same time, we have instituted the largest offshore drilling reforms in U.S. history to make sure that development happens safely and responsibly. For example, 67 drilling permits for wells for new deepwater wells (more than 500 feet deep) in the 12 months ending April 19, 2012 – just three fewer than in the same period (from April 2009-2010) before the *Deepwater Horizon* explosion. Overall, since these new standards were put into place, the Administration has approved over 600 permits for activities at hundreds of wells in the Gulf of Mexico alone.

In the Central and Western Gulf of Mexico, approximately 53 million acres were offered for lease in 2009, of which 2.7 million acres were bid on and sold. In the Central Gulf, approximately 37 million acres were offered in 2010, of which 2.4 million acres were bid on and sold; in the 2011 Western Gulf lease sale, over 21 million acres were offered, with over a million acres sold *(see Table 3).*

Table 1. U.S. Offshore Lease Activity (As of May 2012)

Region	Total Leased Acres	Inactive Lease Acres	Active Lease Acres
Gulf of Mexico	31,864,710 [5,902 leases]	22,033,940 [3,918 leases]	9,830,770[3] [1,984 leases]
Pacific[1]	241,023 [49 leases]	23,354 [6 leases]	217,669 [43 leases]
Alaska[2]	3,723,465 [670 leases]	3,650,974 [656 leases]	72,491 [14 leases]
Total Offshore	35,829,198 [6,621 leases]	25,708,268 [4,580 leases]	10,120,930 [2,041 leases]

[1] No lease sales have been held in the Pacific region since 1984.
[2] Approximately three-quarters of leased Alaska acreage is subject to litigation (challenging 2008 Chukchi Sea Lease Sale 193).
[3] The BOEM held the Western Gulf of Mexico Oil and Gas Lease Sale 218 on December 14, 2011, and subsequently completed its required evaluation. The BOEM awarded 181 leases on tracts covering 1,036,205 acres to the successful high bidders who participated in the sale. These leases were awarded in 2012; thus, there has not yet been sufficient time for those leases to enter into the "active lease" category—as defined in this report.

Table 2. U.S. Offshore Active Leases (As of May 2012)

Region	Total Active Acres	Acres with Approved Development Plans	Acres with Approved Exploration Plans	Producing Acres[3]
Gulf of Mexico	9,830,770 [1,984 leases]	7,479,805 [1,563 leases]	2,350,965 [421 leases]	6,409,169
Pacific[1]	217,669 [43 leases]	217,669 [43 leases]	0	217,669
Alaska[2]	72,491 [14 leases]	21,254 [5 leases]	51,237 [9 leases]	10,414
Total	10,120,930 [2,041 leases]	7,718,728 [1,611 leases]	2,402,202 [430 leases]	6,637,252

[1] No lease sales have been held in the Pacific region since 1984.
[2] Approximately three-quarters of leased Alaska acreage is subject to litigation (challenging 2008 Chukchi Sea Lease Sale 193).
[3] Producing acreage is a subset of the acreage subject to approved development plans/DOCDs.

Table 3. Gulf of Mexico Acreage Offered and Leased

	2009		2010		2011	
Region	Acres Offered	Acres Leased	Acres Offered	Acres Leased	Acres Offered	Acres Leased
Central Gulf	34,594,940	1,784,242	36,957,957	2,369,101	0	0
Western Gulf	18,393,357	884,167	0	0	21,010,305	1,036,205[2]
Total Gulf[1]	52,988,297	2,668,409	36,957,957	2,369,101	21,010,305	1,036,205

[1] Gulf of Mexico lease sales typically offer virtually all unleased available acreage. With the exception of a small number of leases in special circumstances (e.g., within the boundaries of the Flower Garden Banks National Marine Sanctuary), every unleased acre gets reoffered every year. This includes leases which return to the Federal inventory due to: expiration of the lease term; relinquishment; end of production; and acres that were not leased in a previous sale.
[2] All leases of Sale 218 became effective in 2012.

Policy Actions to-date: Encouraging Diligent Development

Consistent with the Administration's *Blueprint for a Secure Energy Future*, BOEM has implemented administrative reforms to ensure fair return to taxpayers and encourage diligent development. These measures include:

- **Increasing rental rates to encourage faster exploration and development of leases:** In the Gulf of Mexico, during the initial term of a lease and before the commencement of royalty-bearing production, the lessee pays annual rentals which either step-up by almost half after year 5 – for leases in water 400 meters or deeper – or escalate each year after year 5 – for leases in less than 400 meters of water. The primary use of step-up and escalating rentals is to encourage faster exploration and development of leases, or earlier relinquishment when exploration is unlikely to be undertaken by the current lessee. Rental payments also serve to discourage lessees from purchasing marginally valued tracts, and provide an incentive for the lessee to drill the lease or to relinquish it, thereby giving other market participants an opportunity to acquire these blocks. In March 2009, in addition to implementing escalating rental rates, BOEM raised the base rental rates for years 1-5 *(see Appendix 1).*

- **Tiered durational terms to incentivize prompt exploration and development:** Gulf of Mexico leases in certain water depths (400-1600 meters) are now structured to provide for relatively short initial periods, but followed by an additional period under the same lease if the operator drills a well during the initial period. The initial periods are graduated by water depth to account for technical differences in operating at various water depths *(see Appendix 1).* In addition, the Bureau of Safety and Environmental Enforcement (BSEE) recently informed lessees of a decision from the Department's Office of Hearings and Appeals that reaffirms the requirement that lessees demonstrate a commitment to produce oil or gas in order to be eligible for lease expiration suspensions.

- **Increased minimum bid:** In 2011, BOEM increased the minimum bid for tracts in at least 400 meters of water in the Gulf of Mexico to $100 per acre, up from $37.50, to ensure that taxpayers receive fair market value for offshore resources and to provide leaseholders with additional impetus to invest in leases that they are more likely to develop. Analysis of the last 15 years of lease sales in the Gulf of Mexico showed that deepwater leases that received high bids of less than $100 per acre, adjusted for energy prices at time of each sale, experienced virtually no exploration and development drilling.

Strong industry response to Western Gulf of Mexico Lease Sale 218, held in December 2011, suggests that these incentives encouraged significant, targeted investment in areas most likely to lead to production. The sale attracted over 240 bids on 191 tracts, with nearly $338 million in total high bonus bids – about $100 million more than the average for Western Gulf sales over the previous decade.

In addition to the incentives described above, the Department is working to reduce barriers to development elsewhere in the Gulf of Mexico. On February 20, 2012, the Departments of the Interior and State joined officials from the Government of Mexico to sign an agreement on the exploration and development of transboundary oil and natural gas reservoirs along the United States–Mexico maritime boundary in the Gulf of Mexico.

This Agreement, when implemented, will make an additional 1.5 million acres of the U.S. Outer Continental Shelf will be made more accessible for exploration and production activities.

Finally, it should be noted that the Department has been moving forward with the processing of plans to explore leases in the Beaufort and Chukchi Seas in Alaska. Pursuant to an Executive Order that the President issued in July 2011, an Interagency Working Group on Coordination of Domestic Energy Development and Permitting in Alaska has been set up. This working group has been coordinating Federal agency reviews of industry requests to engage in exploratory drilling activity in the Arctic. The result has been, for the first time in history, a government-wide approach to ensuring that safety and environmental issues are being addressed in both a comprehensive and timely fashion.

OFFSHORE SPOTLIGHT: CENTRAL GULF OF MEXICO

The Gulf of Mexico has the largest untapped resource potential in the United States' Outer Continental Shelf (OCS)and currently supplies over a quarter of the Nation's domestic oil production. Within the Gulf of Mexico, the Central Gulf has by far the greatest potential, particularly in the deepwater areas, where there are already several world class producing basins and a number of significant new discoveries have been made.

According to BOEM's *Assessment of Undiscovered Technically Recoverable Oil and Gas Resources of the Nation's Outer Continental Shelf*, issued in 2011, it is estimated that the Gulf of Mexico holds about 55 percent of the potential resources located on the OCS, in barrels of oil equivalent. The Central Gulf alone is estimated to have over 30 billion barrels of oil and 133.9 trillion cubic feet of natural gas yet to be discovered, nearly double the resource potential of any other OCS planning area *(see Figure 5).*

High resolution, depth migrated 3-D seismic data are revealing new realms for exploration, including untapped subsalt plays as found in the Lower Tertiary trend, also called the Wilcox play, which has emerged as one of the world's leading exploration plays due to significant, recent discoveries with a high concentration in the Central Gulf.

Figure 6 illustrates the geographic distribution of 15 Lower Tertiary discoveries, including the 3 announced discoveries found in 2009 and 12 significant discoveries that have taken place in BOEM-designated fields. The map also shows the approximate spatial extent of this trend, which may cover over 30,000 square miles (77,700 km2) at an average depth of 27,500 ft. (8,382 m) subsea.

New and rapidly advancing drilling technology and techniques, including innovations in directional drilling, make it possible to explore new frontiers by enabling drilling crews to reach around salt structures to access new reservoirs.

The Administration's comprehensive energy strategy reflects the importance of encouraging exploration and development in the Central Gulf of Mexico. As the President noted, BOEM will hold the consolidated Central Gulf of Mexico Lease Sale 216/222 in New Orleans on June 20, 2012, offering all available unleased acreage. The Proposed OCS Oil and Gas Leasing Program for 2012-2017 schedules 12 lease sales in the Gulf of Mexico, including annual, area-wide lease sales in the Central Gulf and Western Gulf. The Proposed Program schedules the majority of sales in these areas, where resources are best known and where the infrastructure that exists in the Gulf to support the offshore oil and gas industry, including infrastructure to bring resources to market and respond to emergencies, is the most mature and well developed in the country.

ONSHORE OIL AND GAS LEASES

Background

The BLM is the leasing agent for all energy minerals on approximately 700 million acres of Federal lands, and supervises operational activities on leases on Indian lands held in trust by the United States.[2] The lands that are leased by BLM for oil and gas development can be broadly categorized as:

- *Active leases*: Areas with ongoing exploration or production activities. Exploration activities include exploratory and geophysical exploration.
- *Inactive leases*: Areas with no ongoing exploration or production activities.

The regulatory process for onshore oil and gas exploration and development includes:

- Leasing: Unlike the offshore process, BLM accepts "expressions of interest" from industry for lands to be placed on future oil and gas lease sales. "Expression of interest" areas are then evaluated by BLM to determine their leasing eligibility and conditions. Lease sales are then held that allow potential developers to bid on areas they are interested in for exploration and development.

- Exploration and Development: Operators are required to submit an "Application for Permit to Drill" (APD) that includes details such as the well plat, drilling plan, evidence of bond coverage, and operator certification. The APD must also include a Surface Use Plan of Operations. The Surface Use Plan of Operations must describe the proposed project in a narrative, as well as on maps and diagrams.

[2] Onshore Oil and Gas Order Number 1 – commonly known as "Onshore Order #1" – contains the requirements necessary for the approval of all proposed oil and gas exploratory, development, or service wells on all Federal and Indian onshore oil and gas leases. BLM activities with regard to Indian lands do not include issuance of leases and determining their length, rental or royalty, or approval of suspensions or units. These functions are undertaken by the Bureau of Indian Affairs.

Leasing Trends and Unused Acreage

As of March 31, 2012, approximately 56 percent (20.8 million acres) of total onshore acres under lease on public lands in the Lower 48 States were conducting neither production nor exploration activities[3] *(see Table 4).*

- This represents a slight change from the 2011 Report to the President, when approximately 57percent of total onshore acres under lease on public lands in the Lower 48 States were conducting neither production nor exploration activities.

Since the mid-1990s, about 30 percent of leased acres have been in producing status *(see Figure 2).*

Roughly 76 percent of the onshore acres offered for sale between October 1, 2010, and September 30, 2011, were bid on and sold for oil and gas activities *(see*

Table 5).

- This compares to 23 percent that were bid on and sold between October 1, 2009, and September 30, 2010.
- Acreage not sold during a lease sale remains available "over-the-counter" for up to two years.

In calendar year 2011, BLM held 32 lease sales covering 4.4 million acres, including three of the top five largest sales in the agency's history (in Montana, Utah and Wyoming).

- This compares to calendar year 2010 when the BLM held 29 oil and gas lease sales covering 3.2 million acres.
- The BLM expects to hold 30 more lease sales in calendar year 2012.

The number of APDs awaiting approval has been reduced by 24 percent over the last three years, from 5,638 pending approval at the end of FY 2008 to 4,309 pending approval at the end of FY 2011. *(see Figure 1 and Table 6).*

- The BLM approved 4,725 APDs during FY 2011, and expects to process 5,500 APDs in FY 2012, and another 5,500 in FY 2013.

Over the last year, the number of "approved-but-not-drilled" APDs (on Federal and Native American lands) remained approximately 7,000.

[3] Onshore leases vary widely in terms of the number of acres per lease, in contrast to offshore leases which have more uniform size.

Table 4. Onshore Oil and Gas Lease Activity - Lower 48 States (As of March 31, 2012)

Lease Category	Acres Under Lease	Percent of Total Acres	Number of Leases	Percent of Total Leases
Production & Exploration	16,280,081	44	27,307	55
Not in Production or Exploration	20,761,372	56	21,906	45
Total	37,041,453	100	49,213	100

Source: BLM LR2000 data; BLM AFMSS data.

Note: These data are subject to State verification and may differ from those shown in the BLM's Public Land Statistics publication. Further, due to an artifact of an ongoing data-system migration, the figures likely understate the number of leases with approved geophysical exploration permits; the BLM is conducting additional review, and anticipates that the figures may be revised in a future publication.

Table 5. Onshore Oil and Gas Lease Sales – Fiscal Year Statistics

	Acres Offered	Acres Sold	Percent Acres Sold	Parcels Offered	Parcels Sold	Percent Parcels Sold
FY 2009	3,803,635	1,819,234	48	3,127	1,874	60
FY 2010	3,239,086	739,954	23	1,636	1,003	61
FY 2011[1]	1,158,808	880,895	76	1,440	1,253	87

[1] In the first quarter of FY2012 the Department has already offered an additional 3 million onshore acres in the National Petroleum Reserve – Alaska.

Table 6. Onshore Drilling Permits (FY 2001-FY 2011)

Fiscal Year	APDs Received	APDs Processed	APDs Pending at End of Year
2001	4,819	4,266	5,638
2002	4,585	5,830	4,393
2003	5,063	5,143	4,313
2004	6,979	7,351	3,941
2005	8,351	7,736	4,556
2006	10,492	8,854	6,194
2007	8,370	8,964	5,600
2008	7,884	7,846	5,638
2009	5,257	5,306	5,589
2010	4,251	5,237	4,603
2011	4,278	5,200	4,309

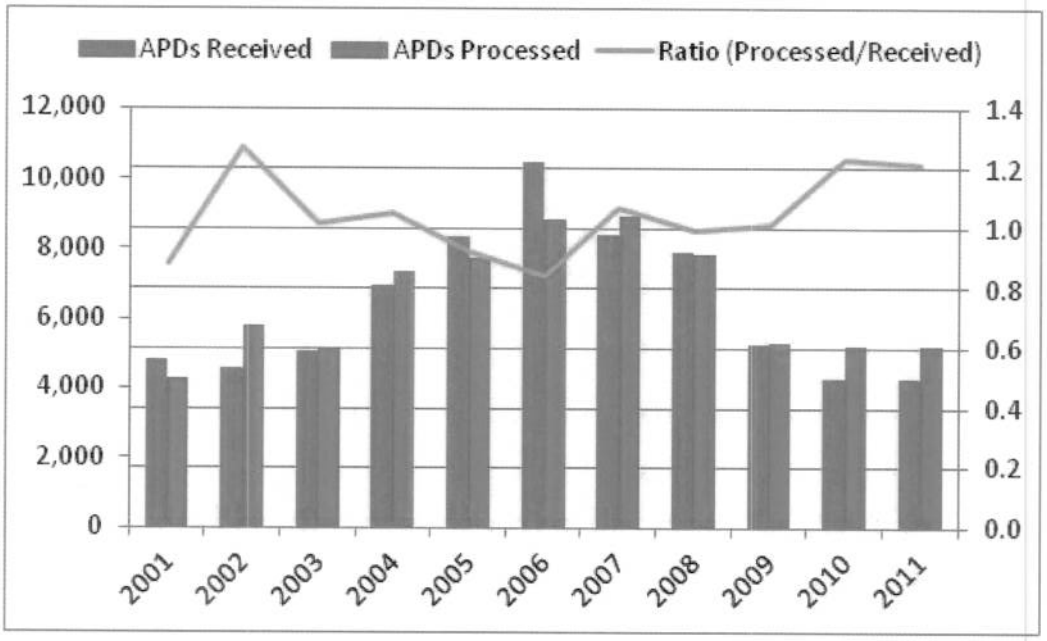

Figure 1. Onshore APDs Received and Processed (FY 2001-FY 2011)
Note: Given potential backlogs, the number of APDs processed might exceed the number of APDs received for any given year.

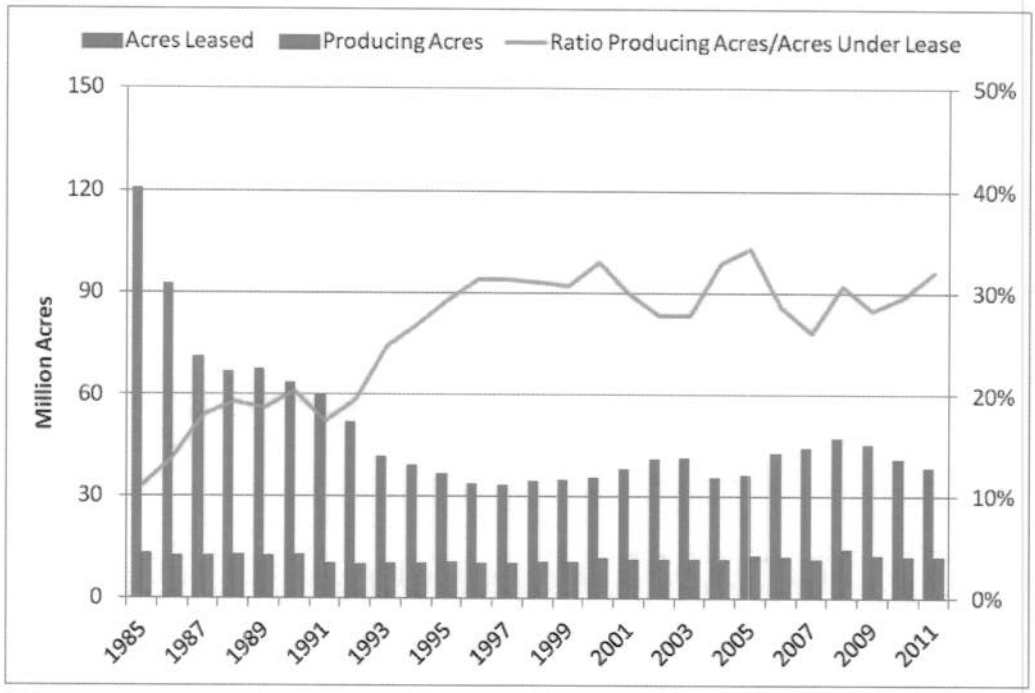

Figure 2. Onshore Producing Acres as a Percentage of Leased Acres, FY 2001 – FY 2011

Policy Actions to-date: Focusing on an open and efficient process

The BLM is implementing oil and gas leasing reforms to ensure that oil and gas lease sales will offer parcels in appropriate locations and avoid the contention and litigation that have characterized many development proposals over the past several years. The BLM staff now work with local communities and address conflicts prior to lease sales, so that leasing activities—and the jobs that they generate—can move forward without being held up by protests or litigation. Master Leasing Plans are also being implemented to incorporate environmental concerns and help guide industry to lower-conflict areas for development.

Efforts to better plan for our lease sales are producing successful results. In 2009, nearly 48 percent of all new proposed oil and gas parcels were being protested. That figure declined to 41 percent during 2010. Since the implementation of leasing reforms in early 2011, the number has declined further to 36 percent for fiscal year 2011. These BLM leasing reforms are providing more opportunity to move forward with appropriate oil and gas production activities on public lands while ensuring the protection of important natural resources. Further, BLM has addressed protests prior to lease sales at a higher rate providing potential bidders with a more secure, predictable pathway to development.

The Department also is developing an Advanced Notice of Proposed Rulemaking (ANPR) seeking input on potential incentives to encourage timely development of unused onshore leases. The ANPR will present potential royalty rate options and solicit comments regarding those options. One of the options in the ANPR will concern the

extent to which incentives could be used to encourage production earlier in the life of the lease. A future rulemaking would apply to new onshore leases only.

ONSHORE SPOTLIGHT: BAKKEN SHALE OIL

The BLM Montana/Dakotas State Office manages nearly 2 million subsurface acres of mineral estate in North Dakota, where the Bakken play is currently experiencing a significant boom in oil production, making North Dakota the Nation's 4th largest oil producing State. The Bakken play in North Dakota and Montana is projected by industry experts to last through the next four decades and could surpass both Alaska and California in oil production within the next ten years.

Although the majority of the Bakken play is under private lands, BLM serves as the leasing authority for all Federal fluid minerals in the Bakken play, stipulating all leases with appropriate measures to maintain environmental quality and human safety. The BLM holds quarterly competitive lease sales, returning half of the revenue to the State. In July 2011, BLM held the second highest-grossing lease sale for Federal minerals, which brought a total of $66 million in revenue. The January 2012 lease sale brought nearly $36 million.

The BLM is the lead agency for permitting, inspection and enforcement activities for Federal and tribal mineral resources in the Bakken. Using BLM technical, geologic, and engineering expertise, along with input from the surface managers (BLM, USFS, BIA, Tribes), BLM is responsible for analyzing and responding to all Federal and Indian drilling applications. Drilling applications increased 500 percent over the past five years; half of this increase has occurred on Indian minerals. Since 2007, applications to drill on the Ft. Berthold Reservation have increased from 0 to 175. More than $3 million in drilling permit fees were collected in FY 2011.

Along with BLM's drilling oversight and surface protection requirements, BLM provides inspection and enforcement for production accountability. These workloads have increased 450 percent in the past five years, with some of these wells producing up to 1000 barrels of oil per day. Federal royalties in North Dakota totaled over $318 million in FY 2011. Indian wells generated $180 million revenues in FY 2011. Since 2007, on Fort Berthold alone, revenues have gone from less than $1 million to $134 million per year.

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APPENDIX 2: Maps

Appendix 1

BOEM – Development Incentives Included in the March 2010 Central Gulf of Mexico Lease Sale

Lease terms

The initial period of the lease is the principal diligence tool for OCS leases. A lease expires at the end of the initial period unless it is producing, or approved drilling operations are being conducted or a suspension of production or operations has been approved by BSEE.

In March 2010, Secretary Salazar shortened the initial period for future leases in certain water depths to the length shown in Table 8. Leases in 400 to 1,600 meters of water can obtain a three-year extension if the operator has spudded a well and submitted the information for BOEM District Manager confirmation.[4] The BOEM lease analysis indicated that, for leases in 800 to 1,600 meters of water, a seven-year lease term would be sufficient for an operator to evaluate seismic data and to commence drilling.

Table 8. Offshore Lease Terms

Water Depth (in meters)	Primary Lease Term	Extensions for Wells Spudded
< 400	5 years	3 years*
400 to < 800	5 years	3 years
800 to < 1600	7 years	3 years
1600+	10 years	n/a

* In less than 400 meters of water, a qualifying well must target hydrocarbons below 25,000 feet Total Vertical Depth Subsea.

Rental Rates

Rental rates are per-acre payments for leases that are paid annually until the start of royalty-bearing production. Prior to March 2009, BOEM's standard rental rates were $6.25 per acre in water less than 200 meters deep, and $9.50 per acre in water depths of 200 meters or more with escalation after year 5 for leases in water less than 400 meters in depth. In March 2009, Secretary Salazar increased the base rental rates for new leases

[4] Leases in less than 400 meters of water can qualify for a 3-year extension for wells targeting hydrocarbons below 25,000 feet Total Vertical Depth Subsea.

offered in Gulf of Mexico lease sales, and established step-up rentals on leases in water depths of 400 meters or more as an incentive for early exploration. These new rental rates are shown in Table 9, below.

Table 9. Off and Onshore Lease Rental Rates (per acre or fraction of an acre)

	Year 1 through Year 5	Year 6	Year 7	Year 8 and Onward
Onshore	$1.50	$2	$2	$2
Offshore (by water depth)				
< 200 m	$7	$14	$21	$28
200 m to < 400 m	$11	$22	$33	$44
400+ m	$11	$16	$16	$16

Appendix 2: Maps

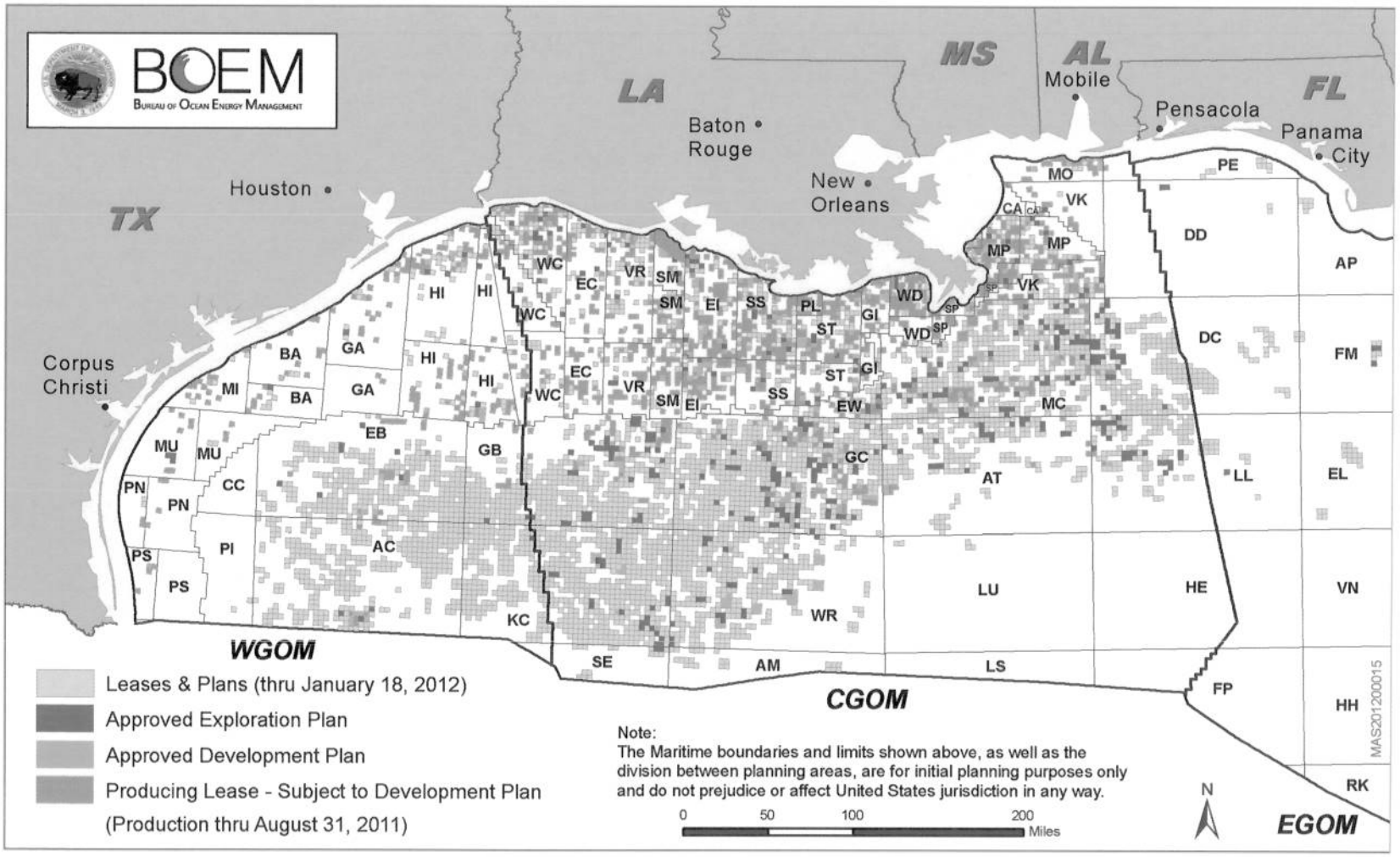

Figure 3. Gulf of Mexico OCS Leases (as of January 2012)

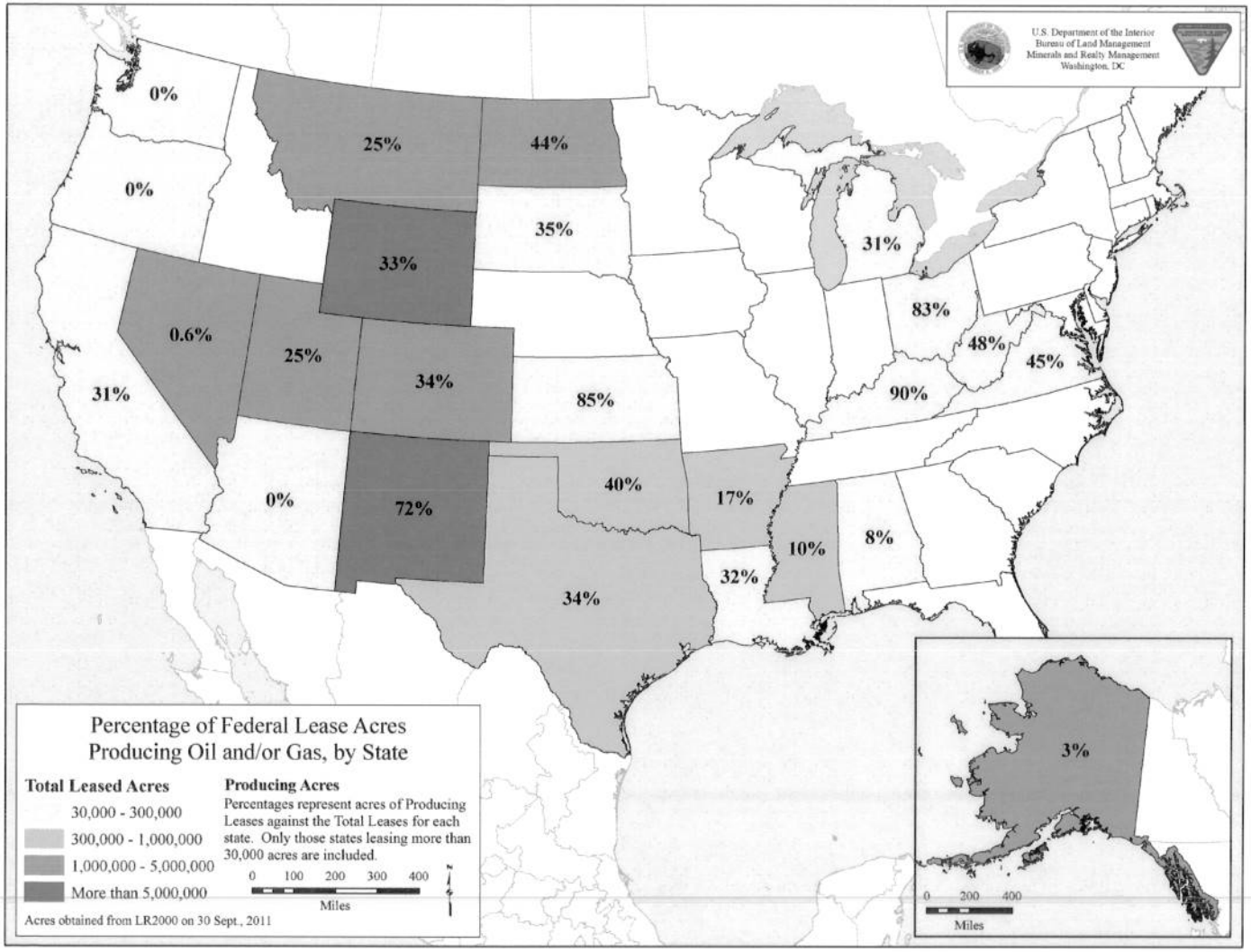

Figure 4. Percentage of Federally-Leased Acres Producing Oil and/or Gas, by State (FY 2011)

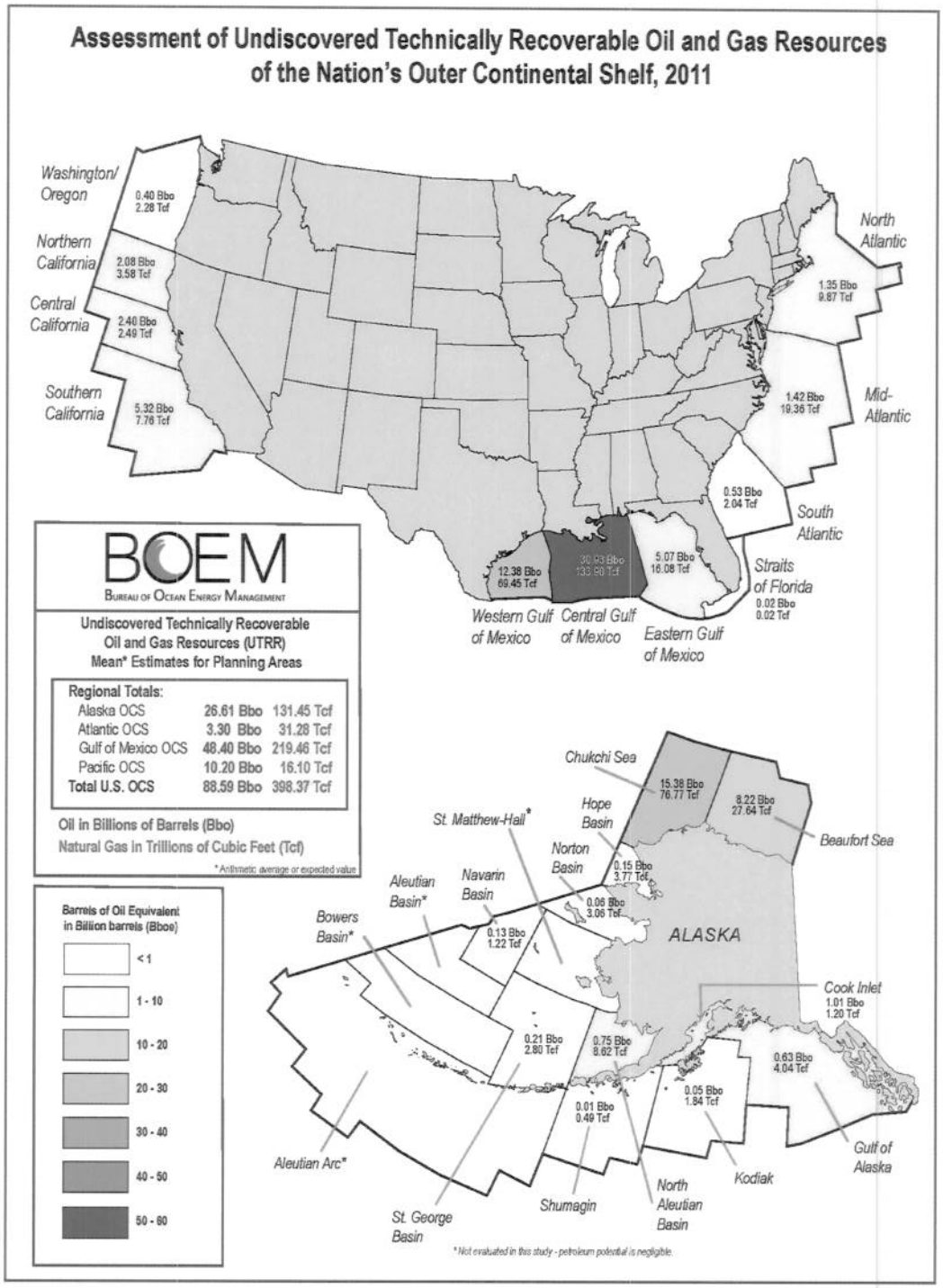

Figure 5. Estimated Undiscovered Technically Recoverable Oil and Gas Resources

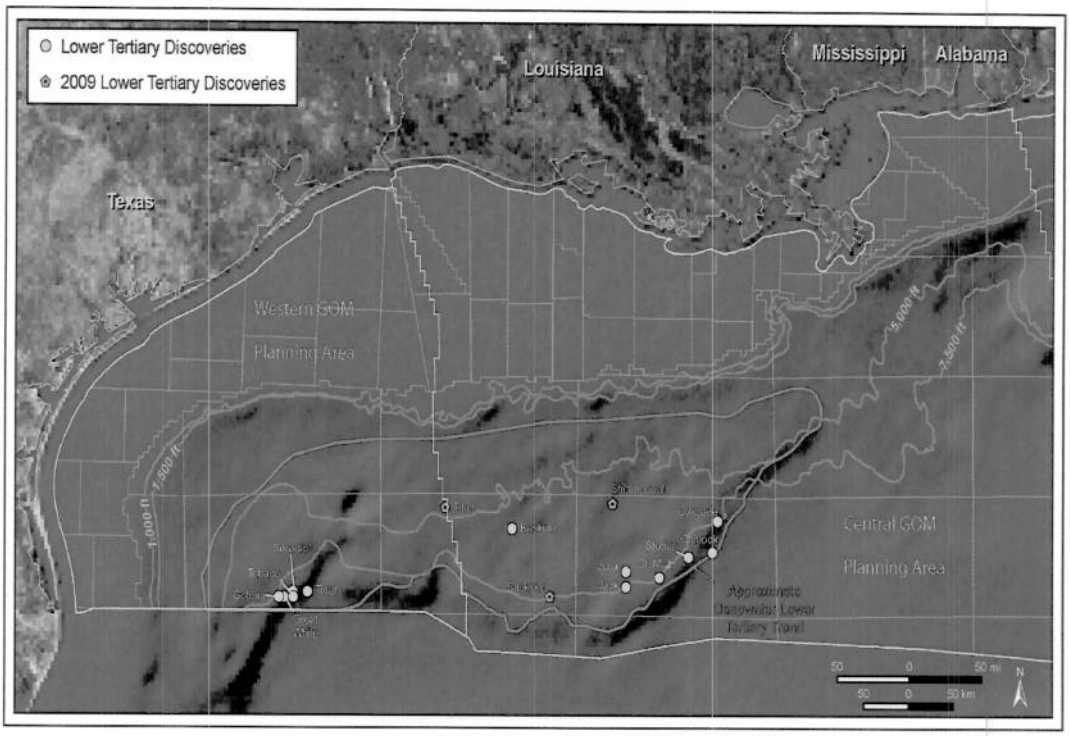

Figure 6. Lower Tertiary Discoveries
Wells in this trend have targeted reservoir rocks of Paleocene to Eocene age and have confirmed the presence of a regionally continuous Lower Tertiary sediment system. The southern part of the Lower Tertiary Trend (in the Keathley Canyon and Walker Ridge areas) is complicated by a salt-canopy system that overlies much of the targeted sediments. Salt canopy thicknesses can vary from 5,000 to 20,000 ft. (1,524 to 6,096 m) in the area, and with water depths ranging from 4,000 to 10,000 ft. (1,219 to 3,048 m), the drill targets can be very deep—25,000 to 35,000 ft. (7,620 to 10,668 m).