RESUMPTION IN 1992 OF FEDERAL COAL LEASING IN WYOMING'S POWDER RIVER BASIN

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and
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Abstract. In 1991 Wyoming became the largest coal producing State in the nation with 194 million tons of low-sulfur coal mostly from 17 coal mines in the Powder River Basin. Many of these mines have committed all of their coal reserves to existing customers and need to lease additional federal coal to maintain their operations. Kerr-McGee Coal Corporation and several other companies have been working for several years with the Bureau of Land Management (BLM) to resume coal leasing. The leasing program is well underway, except for a temporary delay due to a protest by several groups opposing coal mining in the Basin. The protest has galvanized support of the Federal, State, County and City governments, several mining companies and a broad cross-section of the public for the resumption in 1992 of federal coal leasing in Wyoming's Powder River Basin.

I. INTRODUCTION

Leasing of federal coal in Wyoming's Powder River Basin has always been a "lightning rod" issue both on a regional and national basis. The controversy is no less today in 1992 than it has been previously. And even after two decades of mining in the Basin with relatively little impact, many of the same issues are still being debated. Since Kerr-McGee has been working closely with the Bureau of Land Management (BLM) for the past five years in efforts to lease additional federal coal, we have been asked to share our experience with you today and provide an update on the current coal leasing status in Wyoming's Powder River Basin.

II. LEASING ISSUES

While environmental issues have always been central to the coal leasing debates, many other public policy issues have been very important, even though they are often unstated. These issues relate to free market competition, government tax and royalty revenues, and employment/economic considerations in different coal-producing regions in the nation. Disagreements also exist about the extent to which coal should even be used to meet the nation's energy needs. The highly political nature of federal coal leasing has often impeded
the logical and orderly leasing of coal. As a result, federal coal leasing has been a process of "fits and starts" with high leasing rates for brief periods interspersed with total moratoriums for long periods.

III. THE POWDER RIVER BASIN

The Powder River Basin coal-producing region lies in northern Wyoming and southern Montana, as shown in Figure 1. The region is characterized by vast coal reserves (over 1 trillion tons) with thick seams (50 to 80 ft. thick) of low sulfur sub-bituminous coal. This coal is overlain by moderate overburden (10 to 200 ft. thick) which is amenable to large-scale surface mining. Most of this coal is owned by the federal government. In fact 60% of the coal west of the Mississippi River is owned by the government with another 20% depending upon government decision for its development.

While these reserves have always been attractive as fuel for elective utility use, the long distances to market and the relatively high moisture and low Btu of the coal have been great impediments to mine development. However, the Clean Air Act of 1970 with its mandate to reduce power plant sulfur emissions for new coal-fired power plants stimulated a boom of development in the basin primarily to meet a boom of demand from the Sunbelt States.

The development incentive lasted until the passage of the 1977 Clean Air Act which mandated scrubbers on new power plants built after that date. This abruptly reduced the prospects for new market demands until the recent 1990 Clean Air Act again created a premium for Powder River Basin low sulfur coal.

At present there are 17 active coal mines in Wyoming's Powder River Basin, including 8 of the largest 10 mines in the nation as shown in Figure 1. In 1991 they produced 194 million tons of coal with annual revenues of about $1.6 billion, making Wyoming the largest coal producing State in the nation.

IV. FEDERAL COAL MANAGEMENT

Over the past century, the federal coal management program has shifted from the sale in fee of coal rights early in the century to a coal leasing program with royalties. Coal leasing began relatively simply with the Minerals Lands Leasing Act of 1920 and has become increasingly more complex and complicated over time.

Early western coal mining was a high-risk business. In undeveloped coal regions, such as the Powder River Basin in the 1960s and 1970s, the quantity and quality of coal were not well defined. Thus, the ability for a company to profitably mine the coal was uncertain. However, the very high capital cost required to develop large surface coal mines was clear. Also clear was the high capital cost to develop the railroad infrastructure necessary to move large volumes of coal to the eastern and southwestern markets. Other major uncertainties related to the lack of community support systems and facilities including access roads, equipment and supply distributors, electric power supply and all of the community needs of the prospective labor force including housing, schools, and hospitals.

Since the government wanted to encourage mining companies to undertake the high risk development of the vast undeveloped coal resources of the Powder River Basin, early leasing was conducted on a simple lease-by-application basis with attractive royalty rates and lease terms. Royalties ranged from 5 to 20 cents per ton and leases were for 20 years with rights for successive renewals. The incentives were designed to encourage companies to accept the large business risks of developing the undeveloped coal
Figure 1
WYOMING
POWDER RIVER BASIN
COAL MINES

Shell Buckskin
Carter Rawhide
Amax Eagle Butte
Gillette

Western Fuels Dry Fork
Fort Union
Kerr-McGee Clovis Point
Wyodak

Carter Caballo
Amax Belle Ayr
Sun Cordero

Arco Coal Creek

Kerr-McGee Jacobs Ranch

Arco
Black Thunder
Shell
North Rochelle
Peabody Rochelle

Nerco
Antelope

Campbell Co
Converse County

R71W R70W
resources. The incentives were designed, in fact, to encourage speculation to some extent. But speculation was limited by the obvious fact that actual development would require very large capital investments.

In the first 45 years of the Mineral Leasing Act of 1920 some 535 coal leases were issued in the west. Almost half of these (230) covering over 60% of the leased acreage were issued in the six-year period from 1965 through 1970. Because less than 25% of these leases were being brought into production by the leaseholders, the Secretary of the Interior became concerned about coal speculation. Thus, he imposed a moratorium in 1971 on the issuance of new federal coal leases. This concern culminated in the passage of the Federal Coal Leasing Amendments Act of 1976 (FCLAA).

While there continues to be some disagreement over whether adverse coal lease speculation was actually occurring, FCLAA imposed a legislative and regulatory correction to the perceived speculation. It imposed a lease give-back requirement for leases not brought into development in 10 years. It also imposed additional sanctions on old non-producing leases to force their development or relinquishment. Under this provision several billion tons of coal reserves were returned to the government by lease relinquishments. FCLAA also mandated competitive lease sales, minimum bonus bids for the lease which exceeded the government's estimate of Fair Market Value, detailed diligent development requirements, and imposed a royalty of 12.5% of the value of the coal. Diligent development requires that 1% of the reserve must be mined in 10 years and then mining must occur at 1% of reserve per year thereafter or advance royalties must be paid on the shortfall. The 12.5% royalty was a hundred-fold increase of royalties of which half are shared by the BLM with the State. The tight diligence requirements were particularly significant considering that the new surface mining permit and federal environmental reviews required before mining could start could take a long time. In addition, market demand conditions in the late 1970s were shifting in a negative direction adding new uncertainties to the ability to sell the coal from a new lease.

FCLAA also established a detailed planning framework for the BLM management of the coal resource as shown in Figure 2. This required the government to develop land use plans, activity plans and Environmental Impact Statements. It also required detailed consultation with the States to conduct regional lease planning and management and provided for increased public participation. It also allowed for the establishment of Regional Coal Teams to coordinate and oversee the further regional leasing in selected western coal producing regions. Notably, the system has many feedback loops which make the system relatively unresponsive to site-specific needs of existing mines. The regional system really is designed for initial startup of a relatively undeveloped region.

In parallel with this increased regulation of leasing, the mining operations were also becoming more regulated relative to environmental protection of land, water and air resources. Thus, potential environmental impacts of mining have continued to be further reduced over time.

The successful operating mines have been able to comply with all of these regulatory requirements. By all accounts, the western mines have done an admirable job, with several of them winning national awards from the Secretary of the Interior for Excellence in Surface Mine Reclamation. However, for the current mines, the shift from the relatively less-regulated leasing program to a highly-regulated and centrally-planned leasing program under FCLAA substantially raised the cost of the
<table>
<thead>
<tr>
<th>Activity Plan</th>
<th>Timeframe</th>
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<tr>
<td>Develop Regional Resource Management Plans</td>
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<tr>
<td>Regional Coal Team Consultation</td>
<td>3 months</td>
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<tr>
<td>Activity Plan/Tract Delineation</td>
<td>24 months</td>
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<td>Regional Environmental Impact Statement</td>
<td>18 months</td>
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<td>Public Hearing/Agency Consultation</td>
<td>3 months</td>
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<tr>
<td>Lease Sale Scheduled</td>
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<tr>
<td>Geologic Report</td>
<td>6 months</td>
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<tr>
<td>Fair Market Value</td>
<td>6 months</td>
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<tr>
<td>Agency Consultations/Public Comments</td>
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<tr>
<td>Lease Sale(s)</td>
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<td>Bid Evaluations</td>
<td>---</td>
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<tr>
<td>Lease Issuance</td>
<td>96 months (8 years)</td>
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</tbody>
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mining and increased the entry cost for potential new mining companies.

This shift of the leasing program also reveals a shift of the government's perception of how business risks will be shared. In the early program the business risks for coal development in an undeveloped virgin area were so high that the government had to provide attractive incentives to encourage speculation and risky development. When initial development was completed and business risks were reduced, the government could remove the incentives, prohibit speculation, and extract a much higher economic rent from the coal resource through an increased royalty share and bonus bid.

The regional leasing system under FCLAA had one big negative aspect—that is, not much coal was leased and brought into development. One regional lease sale for 1.6 billion tons of coal held in 1982 was soundly criticized from all quarters and a special commission, the Linowes Commission, was convened to investigate. This resulted in an unofficial leasing moratorium during which new methods for computing Fair Market Value were developed by BLM to ensure the government obtained the maximum possible revenues and to avoid potential criticism of preferential treatment of companies.

Actually, the lack of significant development of the 1982 leases, which has subsequently occurred, does not indicate that the leases were purchased for speculation. It simply demonstrates that the coal market conditions ultimately control when a coal lease can be developed. The national coal market during the 1980s reflected the slow growth of electric demand with few new power plants and little new demand for coal and relatively low coal prices. These facts discouraged development of new mines.

During the 1980s the existing, established mines continued to express interest to the Regional Coal Team in obtaining new coal leases for maintenance of production and life extension of their mines and/or for increasing the capacity of the mine to gain higher productivity. During this period over four billion tons of coal were nominated by the companies; however, the RCT at each annual meeting determined that no additional "regional" coal leasing was needed. Their stated view was that there was a surplus of coal under lease in the
region and that there were millions of tons of underutilized annual coal mining capacity at the existing mines. In many respects this posed the classic conflict of a regulated, centrally-planned leasing system versus a free market, competitive system. The question was whether the RCT should withhold new leases from large mines, which had been able to sell or commit all of their coal reserves, so that other less-developed mines would have additional business opportunities. Alternatively, did the RCT have an obligation to make more coal available to those mines which had been able to sell out their previous leases?

By the end of the 1980s it became clear that a regional leasing system was no longer needed in the Powder River Basin. There was no widespread demand for new leases for startup of new mines. Instead, a return to the Leasing-by-Application process was needed to allow timely, site-specific leasing where there were real and immediate needs particularly for life extension of existing mines.

Figure 3 shows the components of the LBA program. However, each application must still demonstrate that the lease is generally consistent with the previously developed land use plans for the region. The Regional Coal Team still maintains oversight of the program. This change was made because it was recognized that several of the largest mines would be destined to declining lives and productivities without new coal reserves. This would pose significant economic threats to those mines, as well as to the State and federal governments, because it was not at all clear that business opportunities lost by these big lower-cost mines would be gained by the smaller higher-cost mines which still had substantial unsold coal reserves. Clearly, customers could go elsewhere outside the Powder River Basin to obtain their coal supply if the competing prices were lower.

In December 1988, recognizing the need to change from a regional leasing program back to a site-specific leasing program, the Powder River Basin Regional Coal Team approved a conditional decertification of the region. This action, after approval by the Secretary of the Interior in 1989, allowed companies to once again submit applications for federal coal leases to the Bureau of Land Management.

V. RECENT DEVELOPMENTS

In a relatively short time after RCT decertification several coal companies completed their required coal exploration work on unleased federal coal adjacent to their existing

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**FIGURE 3**

**BUREAU OF LAND MANAGEMENT**

**LEASE BY APPLICATION PROCESS**

- COAL EXPLORATION (BY APPLICANT) 12 MONTHS
- LEASE APPLICATION (BY APPLICANT) ---
- ADMINISTRATIVE REVIEWS 3 MONTHS
- GEOLOGIC REPORT 6 MONTHS
- ENVIRONMENTAL ASSESSMENT 6-12 MONTHS
- FAIR MARKET VALUE 6 MONTHS
- PUBLIC HEARINGS ---
- AGENCY CONSULTATIONS 1 MONTH
- LEASE SALE ---
- BID EVALUATION 3 MONTHS
- LEASE ISSUANCE 43 MONTHS

3.6 YEARS
operations. These companies included Kerr-McGee, ARCO, Peabody (two applications), AMAX, and Northwestern Resources. Subsequently, they submitted six coal lease applications to the BLM in 1989 and 1990 totalling over one billion tons of coal on 8,737 acres. This amount of coal, however, represents only six years of coal production in the Basin and is only about 0.1% of the remaining available coal reserve. The land area is only 0.15% of the land in Campbell and Converse Counties where the mines are located. Basically, these leases are for maintenance and life extension of existing operations. In 1989 as the BLM began to evaluate the lease applications and prepare the necessary environmental assessments, rumors began to surface that the Powder River Basin Resources Council, the Wyoming Outdoor Council, and the Wyoming Chapter of the Sierra Club were planning to mount a challenge to BLM in an attempt to obstruct the planned coal leasing.

Actually, the Kerr-McGee lease application was a little different from the other applications. While most of the applications were submitted under the new Lease-by-Application system after the RCT decertification was final, the Kerr-McGee application was originally submitted to the RCT before its decertification as an Emergency Bypass Lease. This was allowable under the BLM regulations (43 CFR §3425.1-4) because the proposed tract is relatively inaccessible and is not likely to be mined in the foreseeable future, except as an extension of the existing Jacobs Ranch Mine operations. Under these regulations up to 8 years supply at current production rates could be leased or application with a competitive bid meeting Fair Market Value requirements.

Using information on mine costs, coal prices, production levels, etc., BLM estimates the amount a company could pay as a bonus bid after the company has sold the coal and deducted its mining costs (including taxes and royalties) and deducted an amount based upon the national economic indicators for its fair return on investment. BLM also considers comparable sales and any other relevant factors. To prepare its bid the company must make its own estimate and in effect bid against the House for the lease. This procedure insures effective competition on all Lease-by-Application sales, including those for Emergency Bypass. This procedure defines the "value-added" by the lease to the mining company which becomes a floor price for bonus bids when there is no competitor interest.

Kerr-McGee filed its Emergency Bypass Lease application on October 2, 1989 for a tract adjacent and north of its existing Jacobs Ranch Mine. The application was amended twice at BLM's request to reconfigure the tract based upon information in the BLM geologic report. In August 1990, after the RCT decertification, the BLM revised the application status to a Lease-by-Application for a production maintenance tract. While this new status did not impose a limit on the amount of coal reserves, Kerr-McGee did not seek additional coal beyond the 132 million tons in the original application which was 8 years at the mines production rate of 16.5 million tons per year.

The 1,709 acres of land overlying the federal coal along with additional land extending over a mile to the north is owned in fee by Kerr-McGee. Extensive environmental data was collected by Kerr-McGee on the proposed lease area to complement and supplement the ten years of data at the existing mine. This information was used by BLM to develop its Initial draft Environmental Assessment for the proposed lease. BLM coordinated the EA with all appropriate State and
federal agencies and convened six public scoping meetings with the public and interested groups. After revising and expanding the draft EA, a public hearing was held on June 24, 1991. The only environmental issue raised in the hearing concerned potential cumulative impacts of water use at the mines on deep groundwater aquifers in the area. Based upon studies of the Wyoming State Engineer, the USGS, and the BLM/OSM, this was not considered to be a problem. However, an analysis was added to the EA to show that this issue was not a significant problem either for the proposed Kerr-McGee lease or cumulatively in conjunction with other existing mines and proposed leases in the Basin.

The final EA described three alternatives: (1) lease coal by competitive bid to Kerr-McGee for maintenance tract; (2) do not lease the coal; and (3) lease coal to others for a new mine start. None of the alternatives imposed significant environmental impacts. The preferred alternative was to lease to Kerr-McGee to extend the life of the Jacobs Ranch Mine by about 8 years. It was estimated that the expanded mine would contribute $2.53 billion to the region's economy over its 21 year life which was an increase of nearly $1 billion over the No Action Alternative. The No Action Alternative would forgo $8.4 million annual royalties to the government, reduce the mine life and its 365 jobs by some 8 years, and possibly lose forever the value of the coal. Because of the location and limited size of the tract, the prevailing market conditions, and lack of previous interest of other companies, it was expected that there would be no other bids.

The final EA determined that sale of this lease would not result in significant environmental impacts. Qualitatively, this conclusion reflected the experience of a decade of mining with intense environmental monitoring at the existing Jacobs Ranch Mine. The lack of significant impacts at the mine was certified in 1988 by the national award to Jacobs Ranch Mine from the Secretary of the Interior and the Office of Surface Mining for Excellence in Surface Mining and Reclamation. It was concluded that the extension of the mine onto adjacent lands owned by Kerr-McGee, which are substantially similar in all respects to the existing mine, would simply represent an extension of demonstrated insignificant impacts. Thus the BLM made its Finding of No Significant Impact (FONSI) and determined that no Environmental Impact Statement was needed.

Having completed all requirements, the BLM scheduled the lease sale for September 26, 1991. As expected, Kerr-McGee was the sole bidder and was declared to be high bidder with a bid totaling $20,114,930. This bid was $11,770 per acre for the 1,708 acre tract or about $0.15 per ton for some 132 million tons of coal. A deposit of $4,022,986 was made with the bid with the remainder being due over 4 years after award of the lease. The lease will be subject to 12.5% royalties. On January 3, 1992, Kerr-McGee was officially notified that the bid was accepted, but the lease award would be delayed pending resolution of a protest of the resumption of coal leasing in the Powder River Basin.

The protest, filed on September 25, 1991 by three "non-profit groups" seeks to block new coal leasing. They claimed that new Environmental Impact Statements are required specifically to investigate cumulative impacts to deep aquifers from water use at all existing and proposed mines. They claimed that the leasing was not competitive since there was only one bidder. The intent of these groups, widely stated in the press and elsewhere, is to block further leasing in the Powder River Basin. They have indicated they will protest each
planned lease sale starting with Kerr-McGee, which was the first of the series. They also contacted Congressman Rahall of West Virginia, who chairs the House Subcommittee on Mining and Natural Resources, requesting a Government Accounting Office investigation of the leasing process which is now underway. This effort to politicize the leasing process appeared to be an attempt to create a regional conflict between the States of Wyoming and West Virginia, which both produce low sulfur coal. Clearly, such a conflict would only serve the purpose of obstruction of the Wyoming coal leasing and would not help to resolve any of the stated environmental concerns.

This protest and appeal to Congress to obstruct the coal leasing was immediately countered by an angry announcement from the Governor of Wyoming that the State would join BLM and Kerr-McGee to defend the prompt resumption of leasing in the Powder River Basin. Other proponents of the resumption of leasing soon joined the defense including the City of Gillette; Campbell County, Wyoming; ARCO Coal; Peabody Coal; AMAX Coal; and Northwestern Resources. Briefs and counterbriefs have been filed with the Interior Board of Land Appeals. The proponents of leasing have filed motions for Summary Dismissal of the Protest for Lack of Merit, for Dismissal for Lack of Standing, and for Vacating the Stay against issuance of the lease.

The opponents of leasing are playing a high stakes game with only the cost of a 29¢ stamp to file their protest. According to all government and company experts and their legal counsel, there is no merit to any of the claims relative to the environment or to the leasing process. The delay, however, is costly. The State did not receive its $2 million share in 1991 from the lease sale. The State will lose $759,202 in interest if the Kerr-McGee lease award is delayed for one year. Kerr-McGee may lose new sales opportunities expected to result from the Clean Air Act of 1990. Other Wyoming Coal producers with pending applications may also lose sales opportunities if their leases are delayed. If the delay of leasing were to last several years, the companies' interest in the current leases which are needed now will be reduced. In the event the six proposed leases are ultimately not sold, Wyoming will lose $50 to 75 million in bonus bid revenue.

The proponents of leasing have asked the IBLA to expedite their review of this matter. It is hoped that the IBLA will promptly act to dismiss this protest for lack of merit to send a clear signal that groundless protests will not be tolerated. While Kerr-McGee and all of the proponents continue to believe the coal leasing process should remain fully open to public review, it is clear from this example that protests by special interest groups for the simple purpose of obstruction serve no useful public purpose. For public review to remain a meaningful part of the federal leasing program, the public must follow the same high standards of accountability and responsibility that already apply to government and industry.

On a positive note, it seems that this protest will only be a temporary distraction to the process. The protest has, in fact, galvanized support of the Federal, State, County, and City governments, the coal mining companies, and a broad cross-section of the public for resumption in 1992 of federal coal leasing in Wyoming's Powder River Basin. This widespread consensus is based upon the clear demonstration over the last decade that responsible coal mining in Wyoming represents the best of both coal resource conservation and environmental stewardship.