



Local Government Coordination and Wyoming's Coalbed Methane Boom: A Case Study in the Powder River Basin

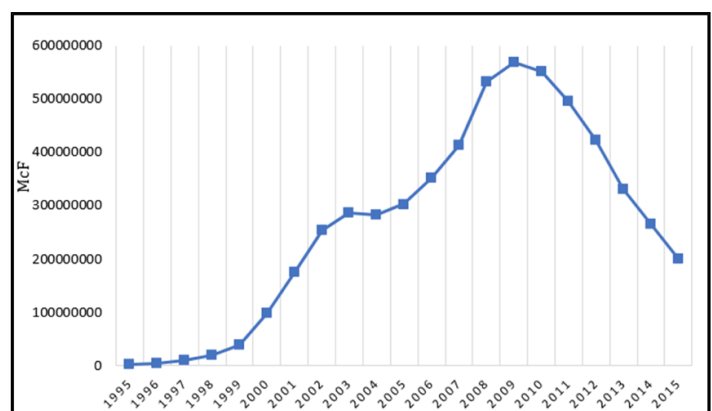
EXECUTIVE SUMMARY

This report is one in a series of case studies documenting innovative approaches to mitigating impacts of oil and gas development in agricultural communities and regions. The goal of the overall research effort and this case study is to document how rural communities have experienced and responded to impacts, both positive and negative, of the recent boom in onshore, unconventional fossil fuel (UFF) development. To read the other case studies, visit www.montana.edu/energycommunities.

Rapid and intensive energy development has widespread implications for host communities and landscapes that demand innovation and creativity around managing local impacts and implementing effective governance. To understand how energy communities meet the challenges and capture the benefits of extraction, a case study was carried out in the Powder River Basin (PRB) of Wyoming, a longstanding resource dependent region in the U.S. West. The PRB of northeastern Wyoming, covering roughly 20,000 square miles of semi-arid grasslands used primarily for livestock production, experienced rapid and intensive coalbed methane (CBM) development from 1998-2008. After the economic downturn and subsequent decline in the natural gas market, some 4,000 abandoned wells remain in Wyoming. During initial CBM development,

a Coalition of county governments, called the Coalbed Methane Coordination Coalition (CBMCC), was established to help PRB counties meet the newly emerging needs of their constituents. This Coalition is a rare model of an innovative, nonpartisan local government strategy that aimed to promote the exchange of information between counties to enable more effective planning and revenue generation. The CBMCC's diverse membership included County Commissioners, conservation district officials, consultants, and industry representatives.

This case study shows how PRB county governments effectively formed the CBMCC to better capture the benefits of CBM development while becoming aware and preparing their communities to meet associated challenges. This research employed a mixed methodology including document and media analysis as well



Wyoming Coalbed Methane Production (Source: WYO GCC)

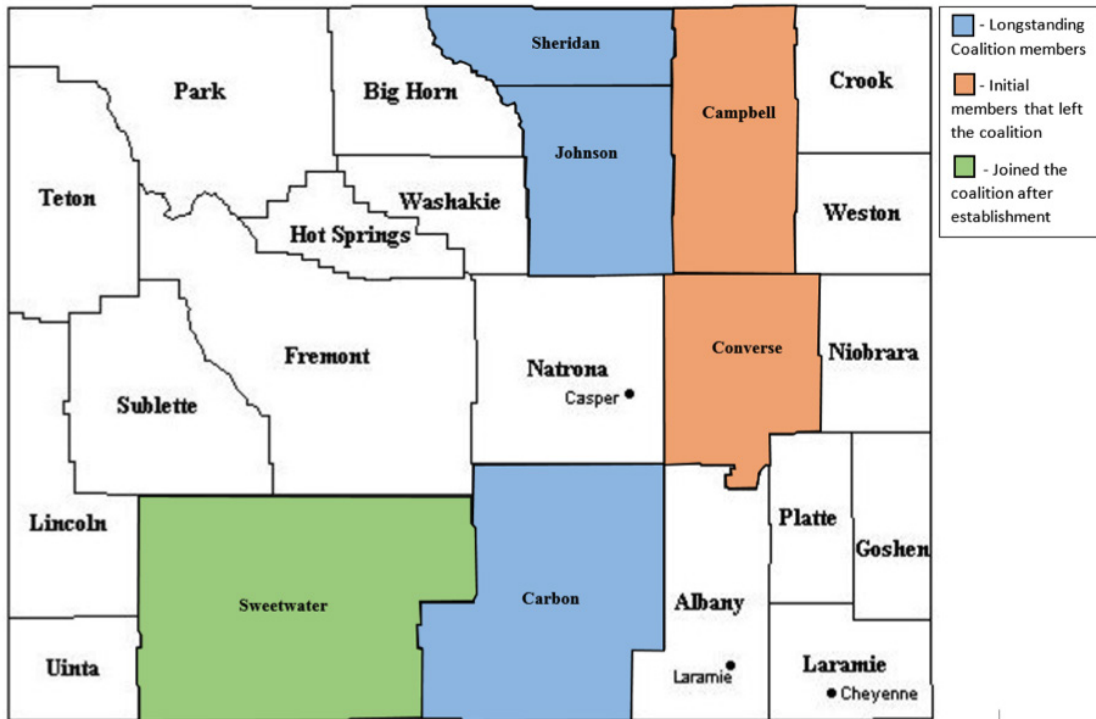


Figure 1. Coalbed Methane Coordination Coalition membership by county.

as twelve semi-structured interviews with a diverse sample of vested stakeholders including County Commissioners (retired and current), agency officials, and industry representatives that were involved and had knowledge of the Coalition.

BACKGROUND

The CBMCC was formed in the year 2000, approximately two years after the CBM boom began. By this time, PRB counties were facing challenges that accompany rigorous energy production including traffic, dust abatement, road degradation, and water storage and quality concerns. The Coalition was established with the formation of a Joint Powers Board (JPB), with the CBMCC being the corresponding Joint Powers Agency. The original members of the Coalition included Sheridan, Campbell, Converse, Johnson and Carbon Counties and the Lake DeSmet and Campbell County Conservation Districts, with support from the State of Wyoming's Governor's Office. One individual from each entity served on the Coalition's Joint Powers Board. A Coordinator

and Assistant Coordinator were hired at the outset to implement the goals of the Coalition. The board met monthly in Johnson County and the Coalition's initial budget was \$165,000, with 50% of the funding allocated by the State's Governor's Office and the remaining funds provided by member counties.

To facilitate communication, in addition to the Coalition members, non-voting members were critical as many were industry representatives. Industry participation promoted open dialogue between operators and policymakers as well as a space for local officials to become better educated about CBM development and associated impacts directly from industry sources. From the outset the Coalition took no specific stance (i.e. environmental advocacy, industry advocacy etc.) on CBM development. Instead they set out to remain impartial.

KEY FINDINGS

The utility of the CBMCC can be evaluated by identification of its most notable achievements. Responses fell into four categories, listed here

in order based on frequency of mention:

1. Education and information exchange
2. Landowner support
3. Local government and industry collaboration
4. Development of materials (i.e. well location maps)

The CBMCC was also able to capture two tangible benefits as a direct result of information sharing: (1) collection of industry money to fund road maintenance; and (2) improved tax revenue generation for host counties. Moreover, landowner support and community engagement were priorities of the CBMCC. This priority was operationalized in two ways: through visits with landowners and by holding public meetings. This deliberate two-prong approach seemed to be effective as, after 10 years of activity, in 2010, the Coalition disbanded as most community members had become well informed regarding CBM and the CBMCC's utility waned.

To assess this Coalition as a model that could potentially be replicated in emerging or existing energy communities, achievements as well as suggestions for improvement are considered. Of the twelve interviewees, seven either offered no suggestions for improvement or could not recall potential improvements due to the time that has passed since the Coalition was active. Interviewee suggestions for improvement can be grouped into five categories:

1. More post-development emphasis
2. More dialogue around sustainability
3. Earlier establishment
4. More industry participation
5. Stronger partnership with the State

CONCLUSION

Undoubtedly, the Coalition is a model of an effective governance strategy that assisted landowners and community members during what was a new and very rapid CBM boom. By facilitating regular communication between county governments, industry, conservation districts and the public, the CBMCC helped

to better equip those in the region to face the challenges brought about by CBM development. The Coalition's achievements, notably their success at information sharing and community outreach, greatly overshadow potential improvements. Advice given by study participants can be distilled into one general suggestion; bring people impacted by development together.

The assembly of diverse stakeholders in a nonpartisan environment enables sharing of resources and contact information, exchange of lessons learned, communication among landowners and between industry operators and local stakeholders. Through these exchanges, misinformation can be avoided and local governments can assist one another and receive assistance (financial and otherwise) from industry. Despite the Coalition's best efforts, the PRB is still facing challenges today, specifically around reclamation. But post-development issues were never the CBMCC's top priority, although, in hindsight, some participants had wished they were. Learning from and analyzing the activities and efforts of the Coalition have helped to illuminate what is truly most useful to local policymakers, agency officials and the public in energy communities – and that simply is the importance of creating a structured space for stakeholders to come together and collectively learn from one another.



Figure 2. The historic Sheridan County Courthouse in Wyoming.

ESCAPING THE RESOURCE CURSE

Leveraging the Benefits of Energy Development for Rural Prosperity

Unconventional oil and gas development is expanding in the United States, transforming rural landscapes at a rapid pace. Our goal is to develop research-informed solutions to maximize socio-economic benefits from oil and gas development to rural communities and agricultural stakeholders. This project is a collaboration between Montana State University, University of Wyoming, Pennsylvania State University, and Cornell University.

The objectives of this research project are (1) to evaluate how rural communities and local stakeholders in agriculture assess the costs and benefits of shale and coalbed natural gas development and (2) to identify the local share of the economic costs and benefits of oil and gas.

To receive **e-newsletter project updates**, email kristin.smith6@msu.montana.edu.

For this case study's full report and to read other case studies, visit www.montana.edu/energycommunities

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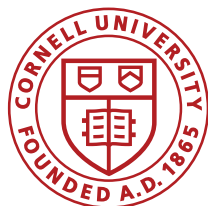
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