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**Interstate Oil and gas Compact Commission
P.O. Box 53127
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For

**Low Impact Natural Gas and Oil (LINGO) Project
“Reducing Onshore Natural Gas and Oil Exploration and Production
Impacts Using a Broad-Based Stakeholder Approach”**

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**Progress Report
Quarterly**

**REPORTING PERIOD
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Executive Summary

Often efforts to reduce impacts resulting from oil and gas exploration and production (E&P) activities do not include input from organizations such as landowners, ranchers, farmers, and other concerned citizens. Lacking this avenue of input can result in practices that ultimately do not achieve the desired result. With that in mind, this research project will strive to gain input from a broad variety of stakeholders including: non-governmental organizations, local governmental bodies (e.g., conservation districts), farmers/ranchers, industry, state and federal agencies, and others. Through the project, the research team will evaluate those practices that are common and key to moving oil and gas development forward and also those that cause the most notable issues relative to delaying or curtailing E&P activities. This will include exploration/exploitation activities from pre-drilling seismic surveys, to development activities, and through to final reclamation. The result of the project will be a handbook summarizing case studies illustrating solutions to those issues that pose the most significant impedances or delays to onshore E&P activities. The handbook will suggest approaches to avoid, minimize, and/or mitigate impacts; practices and variations will be outlined and detailed. Further, the research will provide beneficial analysis of various practices to serve as a starting point for choosing practice options. In addition to its usefulness to regulatory personnel and the regulated E&P community, it is also hoped that the handbook will be of value to non-industry persons wishing to gain an understanding of the advantages and disadvantages of various approaches to environmental mitigation.

The key objectives of LINGO extend beyond simply reducing the impact of E&P activities; this has far reaching benefits to environmental concerns, stakeholder and industry economics, and public perception of the E&P industry that can result in unfavorable political or legal actions. The development of the Adverse Impact Reduction Handbook will address the key objective of this research to overcoming the issues of impedance or delays of E&P activities.

The objective of Phase I is to gather relevant data (Task 1) regarding common practices, mitigation strategies, legislation, guidance and rules pertaining to onshore E&P activities. Additional research will be conducted through field reconnaissance, interviews and case studies (Task 2). The objective for Phase II is impact analysis (Task 3) of current E&P practices and other practices identified from Tasks 1 and 2 that impact efficiency, economics, environmental and other factors. The Phase III objective is to organize the information generated in Phases I and II into an Adverse Impact Reduction Handbook (Task 4) by compiling the findings of the research in a useable format. Phase III will also provide opportunities for technology transfer (Task 5) to regulators, operators and the public through technical presentations and workshops.

Work performed during this reporting period has focused on Phase I activities. This has been achieved through the review of existing publications and information sources and by conducting interviews with interested parties particularly through attendance at select relevant meetings between regulatory officials, industry representatives, and special interest groups.

Approach: As noted in the Executive Summary, the project is divided into three basic phases: Phase I Exploration and Production Practices Research – Data Gathering; Phase II Impact Analysis; Phase III Reporting and Technology Transfer. Work performed during this reporting period has focused on Phase I activities. This has been achieved through the review of existing publications and information sources, by conducting interviews with interested parties, and attending regulatory/industry meetings.

Results and Discussion: Research has been conducted to gather and evaluate data pertinent to common practices and mitigation strategies. A wide range of documents discussing environmental mitigation practices for various aspects of onshore oil and gas development as well as those presenting issues of concern voiced by non-governmental organizations (NGO) have been reviewed. This has allowed identification of many potential environmental issues for further research. Several professional meetings have been attended by project personnel allowing discussions and interviews with numerous representatives of regulatory agencies, the oil and gas exploration and production industry, and interested NGOs. Field visits have also been made to a variety of locations. This has significantly contributed to the identification of issues appropriate for further research. Activities of interest engaged by ALL Consulting staff include:

1. Coal Bed Natural Gas Development Educational Symposium (Citizens for Resource Development and Billings Chamber of Commerce) meeting in Billings, MT – presentations regarding various aspects of coal bed natural gas development in the Powder River Basin of MT and WY; participated by providing an CBNG overview presentation; met with various ranchers and producers in the area.
2. Montana Board of Oil and Gas Conservation – attended hearings on oil and gas development projects.
3. Wyoming Oil and Gas Conservation Commission – attended hearings on oil and gas development projects.
4. Wyoming Dept. of Environmental Quality Environmental Quality Council – attended quarterly meeting.
5. North Dakota Industrial Commission - reviewed hearings on oil and gas development projects.
6. Participation in public hearings for the BLM's Miles City, MT field office supplemental environmental impact statement for the regional RMP.
7. Attended industry meetings sponsored by the Montana Petroleum Association and the Petroleum Association of Wyoming.
8. Field visits to four oil fields in the Bighorn Basin of including one large field (277 active wells) that has been in existence since 1915.
9. Field visits to approximately 45 smaller oil producing fields in the Williston Basin area of Montana and North and South Dakota.

ALL Consulting has also met with and interviewed individual ranchers/landowners and non-governmental organizations to gather their opinions and concerns regarding oil and gas development in the Powder River Basin area.

Conclusions: Information gathered and researched from existing publications, interviews, and meetings during this reporting period will directly contribute towards the development of case examples during the next quarterly period. We plan to attend a BLM Sage Grouse Best Management Practices meeting to be held during April 2007 in Casper, WY. We have also requested to be a participant in a facilitated meeting (summer 2007, WY) between regulators, producers, and non-governmental organizations to discuss and consider the various environmental impact and mitigation issues associated with sage grouse in the western states. We will continue with one-on-one interviews with rancher/landowners to solicit their input on both the recognition of environmental issues and the identification of desirable mitigation strategies from the viewpoint of the surface rights owner. Through this continuation of Phase I research and interviews we will identify case examples of oil and gas exploration and production environmental mitigation activities for further evaluation under Phase II of the project. We anticipate wrapping up Phase I Task 1 in the near future with an interim summary document. Thus far the efforts undertaken for Tasks 1 and 2 have lead ALL Consulting to conclude that the full universe of potential issues and corresponding mitigation strategies exceed the resources available. Therefore, we are contemplating a proposal to produce several focused documents rather than a single, comprehensive Adverse Impact Reduction Handbook. From our findings thus far, we believe the most appropriate focus topics to address are issues surrounding: 1 - wildlife, 2 - air pollution, and 3 - a range of issues related to surface damages, development in urbanized areas, pits, etc.

MILESTONE PLAN/STATUS REPORT

Task/ Subtask No.	Critical Path Project Milestone Description	Project Duration - Start: August 21, 2006 End: August 20, 2008												Planned Start Date	Planned End Date	Actual Start Date	Actual End Date	Comments (notes, explanation of deviation from baseline plan)
		Project Year (PY) 1				PY 2				PY3								
		Q1	Q2	Q3	Q4	Q5	Q6	Q7	Q8	Q9	Q10	Q11	Q12					
Task 1	Compile Information													8/21/06	6/1/07	8/21/06		this task will extend out through most of Task 2 as issues are being identified and revised throughout
Task 2	Field Reconnaissance													10/13/06	9/1/07	10/13/06		interviews effectively began with the PAC meeting at the IOGCC meeting in Austin and have continued with numerous meetings and individual interviews
Task 3	Research & Analyze Data													11/15/06	3/1/08	11/5/06		this task began earlier and will end later as we expect to be able to conduct some of the analysis simultaneously with the field reconnaissance
Task 4a	Draft Handbook Complete													11/15/06	6/1/08	11/15/06		this task began earlier; we expect to be working on report preparation simultaneously with Task 3 analysis
Task 4b	Final Handbook Complete													12/1/07	9/1/08			this task may begin earlier since we have moved the start of Task 4a up to an earlier date
Task 5	Technology Transfer													10/13/06	9/1/08			Tech Transfer takes place during all meetings involving industry and regulatory personnel; therefore, it effectively began with the IOGCC meeting in Austin