

Testimony Of The Independent Petroleum Association of America And The National Stripper Well Association Before The Environmental Protection Agency Regarding Underground Injection Control (UIC)

Program: Proposed Coal Bed Methane (CBM) Study Design

August 25, 2000

## STATEMENT FOR THE INDEPENDENT PETROLEUM ASSOCIATION OF AMERICA AND THE NATIONAL STRIPPER WELL ASSOCIATION AND:

California Independent Petroleum Association

Colorado Oil & Gas Association

East Texas Producers & Royalty Owners Association National Association of Royalty Owners

Eastern Kansas Oil & Gas Association

Florida Independent Petroleum Association

Illinois Oil & Gas Association

Independent Oil & Gas Association of New York

Independent Oil & Gas Association of Pennsylvania

Independent Oil & Gas Association of West Virginia

Independent Oil Producers Association Tri-State

Independent Petroleum Association of Mountain StatesPennsylvania Oil & Gas Association Independent Petroleum Association of New Mexico

Indiana Oil & Gas Association

Kansas Independent Oil & Gas Association

Kentucky Oil & Gas Association

Louisiana Independent Oil & Gas Association

Michigan Oil & Gas Association

Mississippi Independent Producers & Royalty Association

Montana Oil & Gas Association

Nebraska Independent Oil & Gas Association

New Mexico Oil & Gas Association New York State Oil Producers Association

North Texas Oil & Gas Association

Ohio Oil & Gas Association

Oklahoma Independent Petroleum Association

Panhandle Producers & Royalty Owners Association

Permian Basin Petroleum Association Tennessee Oil & Gas Association

Texas Independent Producers and Royalty Owners Association

West Central Texas Oil & Gas Association Wyoming Independent Producers Association

This testimony is submitted on behalf of the Independent Petroleum Association of America (IPAA), the National Stripper Well Association (NSWA), and 33 cooperating state and regional oil and gas associations. These organizations represent independent petroleum and natural gas producers, the segment of the industry that is damaged the most by the cost of regulations – particularly when regulations are unneeded and do not recognize the importance of our own national resources. NSWA represents the small business operators in the petroleum and natural gas industry, producers with "stripper" or marginal wells.

The study that the Environmental Protection Agency (EPA) proposes to undertake is driven by the LEAF v EPA case. In the Federal Register notice regarding this hearing, EPA states:

Prior to 1997, EPA had not considered regulating hydraulic fracturing because the Agency believed that this well production stimulation process did not fall under the UIC program's purview, nor was it under the jurisdiction of the Safe Drinking Water Act (SDWA). In 1994, the Legal Environmental Assistance Foundation (LEAF) challenged that interpretation by petitioning EPA to withdraw Alabama's EPA-approved Section 1425 (SDWA) UIC program because LEAF believed the State should regulate hydraulic fracturing for coal bed methane development as underground injection. EPA rejected LEAF's petition, but LEAF litigated and in 1997, the 11th Circuit Court of Appeals ruled that hydraulic fracturing of coal beds in Alabama

should be regulated under the SDWA as underground injection (*LEAF* v. *EPA*, 118 F. 3d 1467). The State was required to modify its UIC program, and in December 1999, EPA approved this revision. Since the 11th Circuit Court's decision, EPA has received verbal and written reports from several environmental interest groups that practices associated with methane gas production from coal beds has resulted in contamination of their underground drinking water sources.

Because of such reports, and because the frequency of coal bed methane development is rapidly escalating, EPA will conduct a study to evaluate the environmental risks to underground sources of drinking water, potential and actual, associated with hydraulic fracturing. The study will initially evaluate hydraulic fracturing of coal beds, however, EPA will also consider experiences with hydraulic fracturing associated with other types of production. EPA may later study a wider universe of hydraulic fracturing if information collected during this study indicates further investigation is warranted. The current study will estimate contamination incidents associated with hydraulic fracturing through interviews with State and local agencies responsible for drinking water protection, citizens, and industries performing hydraulic fracturing. The study will also include a literature review to provide information on the potential risks posed by hydraulic fracturing of coal beds in areas likely to be developed for methane gas production.

This position is vastly different from EPA Adminstrator Carol Browner's view of the risk posed by hydraulic fracturing in 1995 when she wrote with regard to the LEAF petition:

There is no evidence that the hydraulic fracturing at issue has resulted in any contamination or endangerment of underground sources of drinking water (USDW). Repeated testing, conducted between May 1989 and March of 1993, of the drinking water well which was the subject of this petition failed to show any chemicals that would indicated the presence of fracturing fluids. The well was also sampled for drinking water quality and no constituents exceeding drinking water standards were detected. Moreover, given the horizontal and vertical distance between the drinking water well and the closest methane gas production wells, the possibility of contamination or endangerment of USDWs in the area is extremely remote. Hydraulic fracturing is closely regulated by the Alabama State Oil and Gas Board, which requires that operators obtain authorization prior to all fracturing activities.

We believe this earlier assessment of the environmental risk of hydraulic fracturing is clearly accurate. The Department of Energy recently published its *Environmental Benefits of Advanced Oil and Gas Exploration and Production Technology* assessment. It describes hydraulic fracturing as follows.

First introduced in 1947, hydraulic fracturing quickly became the most commonly used technique to stimulate oil and gas wells, ultimately enabling production of an additional eight billion barrels of North American oil reserves that would otherwise have been unrecovered. By 1988, fracturing had already been applied nearly a million times. Each year, approximately 25,000 gas and oil wells are hydraulically fractured. Fracturing is generally used to regain productivity after the first flow of resources diminishes. It is also applied to initiate the production process in unconventional formations, such as coalbed methane, tight gas sands, and shale deposits.

The sheer magnitude of fracturing jobs is indicative that no environmental problem exists that is not already controlled under existing state programs. In fact, this judgement was clearly verified by a study done by the Ground Water Protection Council at EPA's request. After looking at over 10,000 wells, the Ground Water Protection Council found one where an allegation existed that hydraulic fracturing had caused a problem. This was the Alabama well that Administrator

Browner so clearly refuted in her letter. Even the 11<sup>th</sup> Circuit Court in the *LEAF v EPA* case never concluded that hydraulic fracturing posed an environmental risk.

But now, because "EPA has received verbal and written reports from several environmental interest groups that practices associated with methane gas production from coal beds has resulted in contamination of their underground drinking water sources," EPA is choosing to ignore this ponderous body of evidence to initiate its study. There is no clear justification why "several" reports can trigger a study of the magnitude EPA is proposing. Based on the study design, it will take EPA roughly 18 months to determine whether these "reports" are so compelling that they offset a history of over a million hydraulic fracturing jobs and the Ground Water Protection Council analysis. It suggests that EPA has a different purpose in this effort, one that is inconsistent with the facts at hand, one that could pose a real risk to the development of the nation's natural gas resources that are so essential to meet prospective energy needs.

Specifically, EPA knows that Congress never intended to regulate hydraulic fracturing under the Safe Drinking Water Act. It argued this very point in the initial *LEAF v EPA* case. Despite the 11<sup>th</sup> Circuit Court ruling that the plain language of the statute captured hydraulic fracturing, such an outcome will compel the misdirection of precious capital resources to unneeded regulatory requirements – requirements that will not improve the environment. But rather than resolve this issue, EPA has used the Court decision to generate this overly broad and obtuse study.

For example, EPA states that its study will examine the "environmental risks associated with hydraulic fracturing." But, this study is not designed to deal with risk at all. Instead, it is designed to respond to "reports" and "incidents." The first part of the study involves EPA examining "incidents" but there are no criteria to define how this information will be weighed. Is it simply that EPA will take any allegation at face value? While EPA loosely tosses around the "risk" term, there is no indication in the study design that it will be assessing either the risks or benefits of hydraulic fracturing. Then, after EPA has already received its information on "incidents," it will turn to literature reviews to understand how hydraulic fracturing is done. Doesn't this seem backwards? Shouldn't EPA first learn about the technology it is addressing before hearing allegations that likely have no merit?

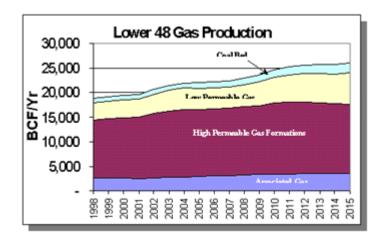
More troubling is EPA's casual indication that it "...may later study a wider universe of hydraulic fracturing if information collected during this study indicates further investigation is warranted." Yet, EPA provides no information regarding what threshold will trigger such an investigation. And, presumably, if that investigation is initiated, it will occur after the Winter of 2002. As characterized in the study design document, this effort could extend over innumerable years with no basis to judge why. Similarly, EPA quickly shifts from issues of ground water contamination to ground water loss as it describes the types of complaints that have arisen in the "reports" it has received alleging that hydraulic fracturing is causing an "incident." While EPA can claim jurisdiction over ground water quality issues under the Safe Drinking Water Act, water quantity issues are not under EPA's scope of responsibilities. Water rights are state matters and not an appropriate element of this study. Moreover, it is a bizarre stretch of interpretation to suggest that hydraulic fracturing results in water quantity loss – more bizarre than the allegation that it affects water quality. The placement of fracturing fluids in formations to open them for petroleum or natural gas or coal bed methane production does not cause water quantity changes.

EPA does not need an 18 month or 2 year or 3 year effort to assess the "reports" of alleged problems associated with hydraulic fracturing. At the August 24 workshop it was evident that there is no broad set of allegations raised in the "reports" to suggest that hydraulic fracturing was causing any environmental damage. Rather, EPA had to admit that it had received something less than a dozen "reports" and several of these were based on EPA initiated phone calls. None of

them provided specific scientific links to hydraulic fracturing. Rather, what came out of the workshop was a clear indication of citizen complaints about the development of coal bed methane in to specific geographical areas – Southwestern Virginia and the San Juan Basin in Colorado. Whether hydraulic fracturing is related to their opposition was not established; the workshop merely provided a conduit of their opposition to allege hydraulic fracturing was at fault. Nevertheless, this question can be readily resolved without the execution of the lengthy study proposed by EPA.

Instead, EPA should simply use the capabilities of a state agency association, building on the Ground Water Protection Council's analysis to examine these "reports" and determine their validity – an approach suggested by the Ground Water Protection Council during the workshop. Such an effort could be completed by the end of 2000 and issue would be resolved.

There are important reasons why this different approach should be undertaken. First, as stated earlier the facts demonstrate that hydraulic fracturing poses no substantial risks to the environment. The issue then is whether there have been some instances where hydraulic fracturing can be identified as an element of a problem. The data to date do not suggest any such likelihood. But, a rapid assessment of the Virginia and Colorado issues would resolve that uncertainty.



Second, this issue needs to be resolved quickly to avoid potential constraints on the development of the nation's energy supplies, particularly natural gas. The National Petroleum Council *Natural Gas* study concludes that natural gas supply must increase more than 30 percent over the next decade to meet future demand. Significantly, gas produced from low permeable formations and coal bed methane are essential components of this future demand. These are formations that depend on hydraulic fracturing to release the resource. In fact, the National Petroleum Council analysis concluded that hydraulic fracturing would be needed in 60 to 80 percent of the natural gas wells that must be completed during the next decade. Clearly, delays in resolving this issue will adversely affect the development of these wells.

Third, it is exactly this outcome that delays in completing any study can produce. EPA's pattern of behavior on the question of regulating hydraulic fracturing has been particularly troubling. After initially recognizing that Congress never intended to regulate hydraulic fracturing under the Safe Drinking Water Act, EPA has subsequently compelled costly regulation in Alabama that requires trucking federally certified drinking water to be used in fracturing jobs. Now, EPA is proposing a study well beyond what is needed to resolve any lingering concerns about the environmental implications of hydraulic fracturing. The future of regulation of hydraulic fracturing will not likely be resolved in any reasonable format without legislative action. Such legislation needs to be enacted as quickly as possible. However, we believe that EPA will use the

existence of this study to delay a resolution of the issue. We believe EPA will argue that it must first complete this study and then initiate a subsequent one. Already, there is a second *LEAF v EPA* case underway in the 11<sup>th</sup> Circuit Court arguing that EPA did not properly compel Alabama to revise its regulations. Delaying action to resolve this issue invites further litigation throughout the country that is primarily intended to restrict the exploration and development of natural gas using the regulation of hydraulic fracturing as a lever.

EPA faces a crossroad. If it believes that the development of clean burning natural gas – which has become the fuel of choice to meet EPA regulations – provides an environmental benefit to the nation, EPA needs to expedite resolution of the issues raised in this study justification. This can be done by redirecting the study design to use state resources to examine the "reports" of alleged problems associated with the development of coal bed methane. However, if EPA wants to pursue the course of delay and misdirection that is set forth in the current study design, it must recognize that the result could well be the creation of costly, unneeded regulations that will not provide environmental benefits but will reduce that nation's capacity to produce it natural gas. The nation confronts an ongoing energy crisis that began when petroleum prices fell to historically low levels in 1998-99 as resource development was dramatically reduced. Natural gas development is responding as fast as possible to meet new demands but far more development is needed. Electricity supply is at precarious levels and future electricity generation capacity is predicated on natural gas. We believe the choice is clear.