John Deskins, Ph.D., Director, West Virginia University Bureau of Business & Economic Research

Testimony before the Committee on Energy and Natural Resources,
Field Hearing to examine the economic importance of modern, reliable energy infrastructure to West Virginia and the United States

August 29, 2016

Chairwoman Murkowski, Ranking Member Cantwell, and members of the Committee, I serve as Director of the Bureau of Business & Economic Research at West Virginia University. Thank you for inviting me to appear before you to discuss the importance of a modern, reliable energy infrastructure to the West Virginia and national economies.

By any objective measure West Virginia is an energy state. For example:

- Energy accounts for 17 percent of economic output in the state, making it the state's largest industrial super sector.
- Energy jobs are among the highest paying jobs in the state, often by far.
- Coal is our largest export commodity, and natural gas is poised to become another key export commodity.
- Severance tax revenue from energy is vital to our state and local governments.

The deep decline in coal production in recent years has had a devastating effect on our state's economy. Coal production has dropped to an expected 70 million tons for this year, down 56 percent from its 2008 level. This has led to a loss of 13 thousand coal jobs and a direct loss of $4 billion in economic output. For 2015, West Virginia's total economic output was lower than in 2011.

These losses create a vicious cycle where we see continuing population loss, an aging population, drug abuse, and so on, making it even more challenging to attract new business, thus continuing the cycle.

Some may read the numbers associated with declining coal output and imagine that the losses are spread across the coal-producing regions of our nation. We have seen a national drop in the demand for coal, caused by a perfect storm of three factors. But the effect of this drop in demand has been felt most strongly in the region with the lowest coal mine worker productivity, Central Appalachia, which includes Southern West Virginia. There we have been mining the region's hotter burning and cleaner coal deposits for over a century, such that the coal that remains is generally deeper in the ground, in thinner seams, and more expensive to extract.

In Central Appalachia, coal production has fallen by 51 percent since 2010, compared to a decline of 10 percent for the nation's other coal-producing regions. Coal production in Northern West Virginia, part of the Northern Appalachian coal seams, has been generally stable. Correspondingly, nearly all of the coal job losses that have occurred in West Virginia have come from our state's southern coalfields.

The concentration of these job losses has created a Great Depression in six southern counties – Boone, Clay, Logan, McDowell, Mingo, and Wyoming. Job losses over the past four years range between 25 percent and 33 percent in each of these counties.

Consider Boone County, our state's largest coal-producing county for many years. There coal production and employment stand at around 30 percent of their 2010 levels. Statistics are beginning to show other job losses in the county as less money is flowing to other local businesses – grocery stores, entertainment venues, etc. Losses in coal severance tax revenue have led to severe public school layoffs in the county.

The industrial mix in these counties also lends to the crisis. In Boone County in 2010, coal accounted for 55 percent of all of the jobs in the county, making it difficult, if not impossible, for many laid-off coal miners to find alternate employment locally.

My point is that the heavy concentration of losses in coal output and employment is far worse than would be the case if the losses were widely dispersed. The current situation gives rise to the question of whether these affected communities are sustainable over the long-run.

The natural gas boom that West Virginia has enjoyed has helped. The boom created around 3 thousand high paying jobs between 2010 and 2014. Many of those jobs have been lost since early 2015 due to a slowdown in natural gas drilling, but a return to growth is expected in coming years.

While it is beneficial for our state in many ways, natural gas extraction is very capital intensive, and as such, is unlikely to employ the number of workers needed to ensure broad prosperity. Broad prosperity associated with natural gas will require more downstream activity, creating more value added and more jobs.

Many call for industrial diversification as the solution to West Virginia's economic crisis. I myself make this call routinely in speeches and discussions across the state. It is crucial for West Virginia to cultivate strength in manufacturing, tourism and other industries. However, industrial diversification is a long-term proposition which requires long-term action on the part of businesses, entrepreneurs, government, and community leaders.

A more viable path for West Virginia's economy in the short-term is through strengthening our state's energy sector. As I believe these figures indicate, this is desperately needed. And while many of the factors affecting energy in West Virginia are outside of the reach of policymakers, I

hope that the information provided today can help make for better policy to move West Virginia forward.