Remarks by Secretary Perry Accelerating Deployment of Low-Emission Coal Technology World Coal Association National Press Club Washington, D.C. Wednesday, May 16, 2018

Thank you, Glenn (Kellow), for that kind introduction.

It is great to join all of you here at the National Press Club....and I want to thank the World Coal Association for inviting me to speak here this morning about the opportunity that clean coal can provide here in the United States and abroad.

As the Secretary of Energy, it's important that I visit with those representing every fuel sector that powers our economy.

But I'm guessing it's probably been a while since one of my predecessors came to speak with you.

So it's a real honor to be here on behalf of the Trump Administration and to visit with those who lead the world's coal sector.

Coal and its supply-chain have been central to America's success story...and will remain so as we look to the future.

When most people hear the word, "coal," they think about electricity generation alone.

And indeed, there are few things more pivotal than electricity to modern society.

But your product offers much more than just reliable power.

Metallurgical coal helps produce the steel in our infrastructure, in automobiles, and in other products.

Coal is also a feedstock for fertilizers and pharmaceuticals.

Coal byproducts are found in such hi-tech equipment as our airplane parts as well as the water purification devices in our homes.

Those who are in this room know the power of your product...and you should be proud of its positive impact on people's lives.

Coal produces about 40% of the world's electricity supply.

And even with the fuel mix changing, that is still an enormous contribution.

As I said in a speech earlier this year at CERA Week in Houston, coal and other fossil fuels bring unparalleled opportunity to developing nations emerging from the deepest forms of poverty, countries which cannot deploy costlier forms of energy.

I told the audience that this Administration views it as our duty to assist these countries and their people by rejecting the discriminatory political bias against fossil fuels as we share both our vast resources and our technology under President Trump.

As producers and supporters of clean coal, you bore the brunt of that political bias.

You have weathered a tremendous storm...and despite the challenges that remain there is hope on the horizon...

How we respond...and we must respond <u>decisively</u>...will not only affect the national security of the United States, but the energy security of the world.

The stakes in this struggle could not be higher.

Coal, combined with nuclear power, provides over half the electricity in the United States.

Along with nuclear energy, coal remains a 24/7 fuel that is <u>essential</u> to delivering electricity in a reliable way.

Make no mistake:

Coal has been...and will be... an indispensable element of a diverse and reliable mix of fuels.

President Trump...and this Administration...understand that completely.

Rather than penalizing energy sources like fossil fuels and nuclear power, our Administration is supporting the nation's entire menu of energy options – an "all-of-the-above" energy strategy.

The President has signed executive orders to roll back the previous administration's so-called "Clean Power Plan," while supporting clean energy of every kind, including clean coal technologies.

Because of these bold actions, America now stands at the brink of energy independence, but the President would like to go farther.

He would like to share our energy bounty with the world.

We are already exporting natural gas to 27 nations on five continents.

And yes, we are exporting coal.

Last year saw the largest tonnage increase in domestic coal production since 2001, and one big reason was the rise in demand for U.S. coal in Asia and Europe:

Last year, coal exports rose by an estimated 61% over 2016.

Our coal is reaching Brazil, the Netherlands and India.

It is going to Japan, South Korea, and Poland and Ukraine.

And the continent of Africa holds tremendous promise as well.

American coal is helping to bolster the energy security of all these nations and power their economic growth... just as it continues to do in the United States.

Now...that's the good news.

<Pause>

But we face sobering news as well.

Here at home we've challenges that must be addressed.

America's electricity generation portfolio has undergone massive changes impacting the muchneeded baseload generation which coal and nuclear energy provide.

Over the past decade, fuel-secure units have been rapidly going offline and pipeline-dependent and intermittent sources have begun to replace them.

Between 2002 and 2016, 531 coal generation units retired from the U.S. fleet.

And 100 more coal units have announced retirement since then.

Nuclear units are suffering as well. Since 2016, 10 nuclear units (approximately 10% of U.S. nuclear capacity) have announced retirement, and analysts predict premature retirement for up to half of the remaining nuclear fleet.

I'm a big believer in competition...and as the former Governor of Texas I saw its power transform our landscape.

Cheap and abundant natural gas will continue to compete with coal in producing U.S. electricity and that is something we should welcome as a nation.

Competition is good and so is energy diversity.

Having a diverse mix of coal and natural gas, along with nuclear, hydro and other renewables is one of America's strategic strengths.

When I travel to other countries and meet with their representatives, I hear many of them fret about how they will obtain their resources given political constraints on their energy options.

Since our Administration is removing those constraints in our own country and now deploys every form of energy we have, the U.S. is in a remarkably better position.

Our energy security, our economic security, and most importantly, our <u>national security</u>, are much stronger for it.

Here's a little known fact... Over 90% of our domestic defense installations rely on the civilian grid for their electricity.

If the generation capacity supplying those facilities is imperiled, intermittent, or interrupted, our country is put at risk.

Contrary to what you have heard in the Press, this is not about the fate of any one company, nor is it just a regional economic issue.

This Administration views the premature retirement of coal plants and nuclear plants as a *national security* issue.

We have an obligation to maintain our fuel diversity and to take action before it is lost.

This is what drives our determination to preserve baseload electricity.

This is what drives our commitment to clean coal technologies and the next generation of coal plants.

This is what drives our dedication to next-generation nuclear energy, as well as storage that can make renewables more reliable.

This is what it means to <u>truly pursue</u> an "all-of-the-above" energy strategy, instead of just paying lip service to it.

<Pause>

But let me be clear.

I don't believe for a single moment that, as some people claim, this strategic drive will harm our country's environment.

Our progress in this vital area has been...and continues to be...astonishing.

Far from being a mere dream, cleaner coal is a reality.

It was DOE's Clean Coal Technology Program -- created in 1985 as a partnership between government and industry – which helped drive this progress.

It helped bring us state-of-the-art, coal-fired power plants that dramatically reduced air pollutants.

How dramatic was this progress toward cleaner coal?

Between 1970 and 2016, the U.S. coal fleet reduced emissions of nitrogen oxide, sulfur dioxide, and airborne particulates by as much as 93%.

Today, newer technologies can also achieve 90% removal of mercury from coal, to levels that are so low, they are nearly undetectable.

And, to our friends in the media, let me say this.

From 1970 through 2016, while U.S. GDP grew by 253%, and vehicle miles rose by 190%, total air pollution from six common pollutants *fell* by 73%.

And from 2005 to 2017, while the U.S. economy grew, we also <u>led the world</u> in reducing carbon emissions, cutting them by 14 percent over that period of time.

America's carbon emissions progress is one of the most underreported stories of our time.

And no fuel has made greater strides in reducing its emissions than coal.

The lesson here is clear.

We don't have to choose between ensuring our energy security and caring for our environment.

By embracing innovation over regulation, we can do both.

And that is precisely what our Administration is doing.

We have chosen to innovate, not regulate, our way out of the fuel-emissions problem.

Just as horizontal drilling and fracking transformed the future of the natural gas industry, we are pursuing early-stage R & D on innovations to improve efficiencies and reduce emissions from today's coal fleet...

...and to develop technologies for the coal plants of tomorrow.

On May 8, we issued an RFI, a Request for Information, for input on developing small-scale, modular, high-efficiency, low-emission coal plants.

And of course, we remain focused on carbon capture, utilization, and storage, or CCUS, technologies...

...including ways to reuse the captured CO2 for enhanced oil recovery and conversion to valuable byproducts.

And we are sharing our CCUS expertise with other countries.

Last year, I attended the CCUS ministerial meeting in Abu Dhabi and signed an MOU with the UAE on these and other energy technologies.

<Pause>

Now, as I close, let me put forth a challenge to our friends in the coal industry.

If we are to reduce emissions further, make coal cleaner, and ensure it remains an indispensable part of our electricity generation mix...

...we all must do our part.

I ask the coal industry to join with DOE and redouble its efforts to find those game-changing innovations that will ensure coal remains an essential part of our energy future.

The challenges facing coal, and especially clean coal, are undeniably steep.

The need for coal remains...and demands to reduce emissions will only intensify.

This is an issue we have to get right and an opportunity you must seize.

No fuel other than nuclear is as reliable for lighting and powering our growing world.

If we want to keep that power reliable... and share it with societies that have yet to electrify, governments... must regulate less... industry... must innovate more...and together, we must rise up and meet this challenge.

Let us work together to make the next generation of clean coal innovations *a reality*.

Thank you.