Opening Statement of Mark C. Christie
Commissioner
Federal Energy Regulatory Commission (FERC)
House Committee on Energy and Commerce
Subcommittee on Energy, Climate and Grid Security
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Chairman Duncan, Ranking Member Pallone, Members of the Subcommittee.

Thank you for the privilege to appear before you with my colleagues from FERC.

The United States is heading for what I would characterize as potentially catastrophic consequences in terms of the reliability of our electric power system. I am not trying to be melodramatic in using a term such as "catastrophic," but because I think anyone would regard an increasing threat of system-wide, extensive power outages as potentially catastrophic. Loss of electrical power during extreme cold or heat can literally cause loss of life, as was demonstrated by the tragic consequences during Winter Storm Uri in Texas in 2021. There are also severe economic consequences from widespread outages of electrical power.

In summary, the core threat is this: Dispatchable generating resources, even with many years of useful life remaining, are retiring far too quickly and in quantities that threaten our ability to keep the lights on. The problem generally is not the *addition* of intermittent resources such as wind and solar, but the far too rapid *subtraction* of dispatchable resources, especially coal and gas.

To cite just one example: Earlier this year, Manu Asthana, the CEO of the PJM regional transmission organization – the largest RTO in the country in terms of consumers served – said that PJM faced the likelihood of losing 40 gigawatts of generation capacity by 2030 through early retirements of generating units. 90% of this retiring capacity is *dispatchable* generation, primarily coal and gas. Meanwhile PJM faces load growth of an additional 13 gigawatts by 2030. The PJM interconnection queue, however, largely consists of *intermittent* generation,

primarily wind and solar.1

In terms of capacity value – which is the amount of power that can be supplied to the grid when needed – one nameplate megawatt of wind or solar is simply not equal to one nameplate megawatt of gas, coal or nuclear. So even if every unit waiting in the PJM interconnection queue was interconnected, that would not solve the reliability problem caused by too-rapid loss of dispatchable generation. The numbers just do not balance. The PJM CEO warned that PJM needed to slow the pace of generator retirements or face reliability problems.²

The same problem of cascading retirements of dispatchable resources is also present in other RTOs. MISO, which serves the Midwest and parts of the Southeast, has also been warning regularly about this coming reliability threat. The New York ISO (NYISO) just last week issued a similar warning.

The nation's designated reliability experts at the North American Electric Reliability Corporation (NERC) have warned about this threat repeatedly.³

So the warnings are there and there is no excuse to ignore them.

What are the chief reasons? I will focus on two.

First, market design in the RTO markets. These markets – which are not really markets at all but administrative constructs with some market characteristics – were designed almost a quarter century ago for a different era with far different challenges than we face today. This is especially true of the capacity markets used in PJM, the other eastern RTOs, and MISO.

Second, with regard to natural gas generation, the need for which has been growing rapidly as a dispatchable power resource, the national campaign of legal warfare being conducted against every single natural gas pipeline or related facility has prevented the construction of vitally needed natural gas transportation infrastructure.

Natural gas-powered generators need a steady and dependable supply of natural gas to

generate and deliver power to the grid, and that takes the necessary pipeline infrastructure, but the construction of this infrastructure has been all-too-often blocked through legal warfare conducted in all agencies and in all courts.

Since FERC regulates the RTO power markets and has reliability duties under the Federal Power Act, as well as the duty under the Natural Gas Act to permit needed natural gas infrastructure, I believe it is my duty as a member of FERC to call attention to the serious threat to reliability that is looming on the horizon.

Thank you, Mr. Chairman and members of the Subcommittee. I am happy to answer your questions.

¹ Energy Transition in PJM: Resource Retirements, Replacements and Risks, Feb. 24, 2023. energy-transition-in-pjm-resource-retirements-replacements-and-risks.ashx

² "PJM Chief: Retirements Need to Slow Down," Rich Heidorn Jr., *RTO Insider*, Mar. 27, 2023. PJM Chief: Retirements Need to Slow down | RTO Insider

³ See, e.g., "Vast Swath of US at Risk of Summer Blackouts, Regulator Warns," By Naureen Malik and David R Baker, *Bloomberg*, May 18, 2022. ("The pace of our grid transformation is out of sync" with the physical realities of the existing power network, [NERC representative] Moura said.)