

STATEMENT
Ranking Member Eddie Bernice Johnson (D-TX)

Committee on Science, Space, and Technology
Markup of H.R. 6227, the “Quantum Initiative Act”
June 27, 2018

I want to thank Chairman Smith for introducing HR 6227, the National Quantum Initiative Act, on which I am happy to be a cosponsor. This legislation will establish a national program to accelerate progress in research and technology development related to quantum information science.

Research in this area promises to revolutionize the way we solve problems by leveraging quantum effects such as superposition and entanglement. Many believe quantum computing technology has the potential to accelerate progress on some of our most pressing challenges, including how to address climate change and understand complex diseases like cancer. The race is on to build the world’s first quantum computer capable of solving problems that have long eluded conventional computers. Not unlike the space race of the 1960s, the stakes in today’s quantum race are high. Global leadership in quantum computing brings with it a military and intelligence edge as well as a competitive advantage in what many expect to be a massive industry for decades to come.

The National Quantum Initiative authorized in this bill enables coordinated activities at the Department of Energy, the National Science Foundation, and the National Institute of Standards and Technology, as well as many other important federal agencies that will have a role in developing and benefiting from these technologies.

Along with sustaining support for research in this area in general, DOE and NSF will fund new national centers to bring together preeminent experts in quantum science, hardware and software development, and education. And NIST will lead the way in developing the measurement and standards infrastructure vital to this emerging industry.

By promoting access to the products of these activities across the Federal Government and to academia and the private sector, the National Quantum Initiative ensures that we will maximize the return on that investment.

We must invest more in this research. We need to ensure that we are educating and training the next generation of top quantum scientists and engineers. And we should do more to encourage partnerships between government, academia, and industry.

This good legislation will put us on the right track and I urge my colleagues to join me in supporting its passage.