



**HITACHI**

**GE Hitachi Nuclear Energy**

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The Honorable Lamar Smith, Chairman  
House Committee on Science, Space, and Technology  
2321 Rayburn House Office Building  
Washington, D.C. 20515

The Honorable Eddie Bernice Johnson, Ranking Member  
House Committee on Science, Space, and Technology  
2321 Rayburn House Office Building  
Washington, D.C. 20515

Dear Chairman Smith and Ranking Member Johnson:

On behalf of GE Hitachi Nuclear Energy (GEH), an alliance between the General Electric Company (GE) and Hitachi Ltd., nuclear reactor technology vendors with over 100 years of combined experience, I write to express our support for H.R. 4084, the Nuclear Energy Innovation Capabilities Act of 2015 (the Act).

With global power demand expected to grow significantly in the coming decades, the U.S. nuclear industry is ready to deliver the next generation of nuclear reactor that can produce carbon-free power with less waste. Having first-hand experience with different reactor programs within the Atomic Energy Commission and the Department of Energy, GEH knows that smart federal policy is essential to the advancement of needed technological breakthroughs.

GEH is convinced that the Act is an important first step in promoting advanced (non-water cooled) nuclear reactor design research and development, creating a policy framework for advancing the commercial reactors of the future. There is little doubt that the Act would assist U.S. companies in enhancing their technical capabilities. For example, the Act would direct the Department of Energy to build a high energy neutron reactor, which would accelerate development of the type of fuel that could be used in GEH's PRISM advanced reactor. In addition, the Act would create world-leading scientific user facilities accessible by U.S. companies, and this in turn would support commercialization of advanced reactors via public-private partnership both in the U.S. and abroad. Finally, in our view the Act would demonstrate the U.S. commitment to remaining a leader in delivering the safest, most efficient nuclear technologies in the global marketplace.

Please remember that the U.S. nuclear industry historically has led the world in developing new reactor technology, and we believe that it is critical that the U.S. maintain this advantage. GE first investigated nuclear technology for energy production in 1939 after the discovery of "fission" in Europe. Later, in the 1950s, GE was encouraged by the Eisenhower administration's "Atoms for Peace" program to move forward aggressively with the newly demonstrated Boiling Water Reactor (BWR) technology. President Eisenhower was seeking a commercial reactor technology that was not a derivative of a military propulsion system, and this was handily achieved, with GEH's BWR technology forming the bed rock of the U.S. civilian reactor fleet. It should be noted, in this regard, that GE's BWR technology was tested at the kind of U.S. world-leading scientific user facility that the Act now seeks to create for advanced reactors such as GEH's PRISM.

With our PRISM advanced reactor, GEH is once again prepared to leverage past federal investments (including the Experimental Breeder Reactor II and Fast Flux Test Facility programs) into future technological advancements. However, what is still needed is the appropriate federal policy that incentivizes and encourages additional development of these critical technologies. It is our belief that the Act provides that framework. If enacted, the Act would be a positive market signal to the U.S. nuclear industry that the time has come to meaningfully invest in advanced reactor research and development.

Sincerely,



Dr. Jon Ball  
Executive Vice President  
Nuclear Plant Projects