119TH CONGRESS
1ST SESSION

S. RES. _____

Recognizing and celebrating 100 years of quantum mechanics.

IN THE SENATE OF THE UNITED STATES

Mr. DAINES submitted the following resolution; which was referred to the Committee on _____

RESOLUTION

Recognizing and celebrating 100 years of quantum mechanics.

Whereas, in 1925, the foundational principles of quantum mechanics were formulated by pioneering physicists and advanced by scientists in the United States, including Richard Feynman, John Archibald Wheeler, David Bohm, Bryce Dewitt, and Peter Shor, among others, laying the groundwork for a revolutionary understanding of physics that examines the behavior of matter and energy at the atomic and subatomic levels;

Whereas quantum mechanics has led to groundbreaking scientific advancements, enabling the development of modern technologies that improve the daily lives of people, such as semiconductors, lasers, superconductive materials, magnetic resonance imaging, and the global positioning system;

Whereas the study and application of optics, photonics, cryogenics, and condensed matter physics have been instrumental in advancing quantum technologies by leveraging fundamental quantum principles such as superposition, entanglement, and interference;

Whereas ongoing breakthroughs in quantum information science, including in quantum computing, quantum simulation, quantum communication, quantum cryptography, quantum sensing, and materials science, promise to enhance national security, drive economic growth, and advance numerous industries;

Whereas the advancement of quantum technologies creates high-quality jobs and fosters innovation across critical sectors, such as chemistry, biology, healthcare, finance, transportation, telecommunications, and advanced manufacturing;

Whereas the United States has been a global leader in quantum research and innovation, with significant contributions from private industry, national laboratories, universities, and government agencies; and

Whereas 2025 marks the 100th anniversary of quantum mechanics, providing an opportunity to educate the public, inspire the next generation of scientists and engineers, and highlight the strategic importance of quantum science, technology, and education: Now, therefore, be it

Resolved, That the Senate—

(1) recognizes the 100th anniversary of quantum mechanics and its profound impact on science and technology;

(2) celebrates the contributions of scientists, engineers, and innovators in the United States in advancing quantum science;

(3) reaffirms the commitment of the United States to maintaining leadership in quantum research and development; and

(4) supports efforts to raise public awareness of quantum science and its potential to shape the future of computing, security, healthcare, and industry.