Opening Statement

Ranking Member Dan Lipinski (D-IL) Subcommittee on Research and Technology House Committee on Science, Space, and Technology

Subcommittee on Research and Technology: Prizes to Spur Innovation and Technology Breakthroughs

April 9, 2014

Mr. Chairman, thank you for holding this hearing, and thank you to our witnesses for being here this morning.

Prize challenges inspire and help spur technological advancement by tapping into the strength of American ingenuity, and both the public and private sectors are increasingly making use of this tool to accelerate innovation. Recent prize competitions have challenged inventors to build fuel efficient vehicles, develop technology to clean up oil spills, and to create algorithms for faster mobile applications. Prize competitions, including the famous 1927 Orteig Prize that spurred Charles Lindberg to make the first non-stop transatlantic flight, can be credited with producing breakthroughs in aviation, navigation, food preservation and many other advances in the modern world.

For years, I have been a strong supporter of using prizes to incentivize advancement of emerging technologies. In 2007, I introduced the H-Prize Act along with a Republican colleague on this committee and that bill was incorporated into the Energy Independence and Security Act which became law. My bill authorized the Department of Energy to conduct prize challenges for the development of hydrogen as a transportation fuel. In 2010 I put language in the House NSF reauthorization bill giving prize competition authority to that agency and the final version of the COMPETES Reauthorization contained prize authority for all federal agencies. I am glad to know that in fiscal year 2012 seven agencies conducted 27 prize competitions under this authority. I would also add that DOE is taking another look at hydrogen energy, and I am hopeful that this will involve a new prize competition using these authorities to supplement their current work. With today's budget climate the Federal Government has to consider alternative financing tools for R&D funding outside of the established research grant paradigm in order to meet research goals.

One benefit of prize challenges is that the prize is awarded only once a challenge has been met; this allows agencies to incentivize high-risk, high-reward research that generally constitutes only a very small percentage of federally funded research. Prize competitions also attract participants who do not typically seek government grants or contracts.

This brings in a diversity of ideas from people of different disciplines and educational backgrounds and levels. I would be interested in hearing from the witnesses about how their organizations encourage competitors to take advantage of this diversity and to learn from their

peers. Also, I would be interested to hear how the witnesses reach out to students to encourage a culture of science learning through prize competitions.

Fundamentally, the Federal Government supports scientific and technological breakthroughs with sustained investments in basic research. Prize competitions cannot replace our tried and true model for funding R&D, but they can serve as another tool in the toolbox. I am looking forward to hearing from our witnesses what they have learned in designing and participating in competitions, and how the Federal Government might further collaborate with these types of organizations so that we can continue as leaders in innovation.

I want to thank all of the witnesses for being here, and I look forward to their testimony. Thank you Mr. Chairman, I yield back.