CONGRESSWOMAN DONNA F. EDWARDS COMMITTEE ON SCIENCE, SPACE AND TECHNOLOGY Subcommittee on Space and Aeronautics

"National Priorities for Solar and Space Physics Research and Applications

for Space Weather Prediction"

Wednesday, November 28, 2012 10:00 AM to 12:00 PM 2318 Rayburn House Office Building

Mr. Chairman, thank you for holding today's hearing to examine the recommendations for the nation's solar and space physics research program and the benefits of this research for space weather prediction.

A little more than a week ago, the Sun had two solar events—in this case "prominence eruptions"—over a four-hour time span. NASA's Solar Dynamic Observatory (SDO) spacecraft captured the activity, and while the event would not affect Earth, this and other solar events days earlier led to alerts of potential high frequency radio communication blackouts and weak power grid fluctuations.

Because solar events such as these can have marked impacts on ground- and space-based technological systems and services, such as GPS-related services, communications, aviation, the electric power grid, and pipelines--the Nation's basic research programs have a direct bearing on protecting our nation's critical infrastructure.

In August 2012, the National Academies released its decadal survey, "Solar and Space Physics: A Science for a Technological Society".

The recommendations provide independent, external input on the priorities and plans for spaceand ground-based solar and space physics research activities over the next decade, and on the applications of the research to space weather prediction.

So, I'm pleased to hear from our witnesses today on the decadal survey recommendations, the current activities and future plans for the NASA program, and the operational activities related to space weather prediction.

Mr. Chairman, I would be remiss if I did not mention the budgetary challenges for this research, which has such significant implications for our society.

We need to protect these R&D investments. Our assets, our quality of life, and our economic strength as a nation depend on this research.

Thank you and I yield back the balance of my time.