



*SPACE BRIEFING*

*June 26, 2007*

## **EARTH OBSERVATION SYSTEMS PLAY VITAL NATIONAL SECURITY ROLES AGAINST THREATS BROUGHT ABOUT BY CLIMATE CHANGE**

**AT ISSUE: Climate change is emerging as a serious threat to our country's economic security, political stability, and to human health and well-being.**

**Climate change is an international issue and a potential national security threat.** Recent testimony to the Senate Committee on Foreign Relations attributed climate change as key factors to both the conflicts in Darfur and in Somalia and credible studies show that both developed as well as developing nations' economies are at risk.

**International migration caused by climate change threatens border stability.** Drought, flooding, and even minor sea rise to low-lying nations or populated river deltas could increase refugee migration over international borders, including those of the United States, as well as result in increased hazards to health.

**Even "normal" natural disasters are overstressing fragile systems and resources.** Hurricane Katrina impacted America's oil production. Drought in the western states and flooding in the central states are wreaking havoc on private homes and businesses. Similar events occurring world-wide can threaten critical resources necessary to the U.S. and world markets.

**REQUESTED: Congress should appropriate sufficient funding to improve the capability of Earth Observation satellites and data management systems to support both research and operations, and to bridge the gap between the two.**

**Our nation should ensure that space-based systems continue to collect critical short and long term climate data.** The National Academy of Sciences has provided, in its "Decadal Survey" of Earth Observation needs, a blueprint of what needs to be done for the space segment of the Integrated Earth Observing System (IEOS).

**Inter-agency and international cooperation must increase in order to leverage all applicable Earth Observation capabilities, with consistent data standards.** The Office of Management and Budget should require federal agencies, federally funded researchers, and contractors to electronically publish all relevant data products in compliance with Federal Geographic Data Committee (FGDC), National Spatial Data Infrastructure (NSDI), Open Geospatial Consortium (OGC), and World Meteorological Organization (WMO) supported standards and procedures. And the US Government should continue to expand international cooperation through the Global Earth Observation System of Systems (GEOSS).