

U.S. National Platform for ISDR

U.S National Science & Technology Council
Subcommittee on Disaster Reduction (SDR)

**Presentation at the
North American Workshop on the Mid-Term Review of
the Hyogo Framework for Action**

*3 November 2010
National Science Foundation*

David Applegate/Dennis Wenger



U.S. National Science & Technology Council Subcommittee on Disaster Reduction

- SDR is an element of the President's National Science & Technology Council charged with establishing clear national goals for Federal science and technology investments in disaster reduction.
- Promotes interagency cooperation for natural and technological hazards and disaster planning.
- Facilitates interagency approaches to identification and assessment of risk, and to disaster reduction.
- Advises the Administration about relevant resources and the work of SDR member agencies.
- Serves as the US national platform for UN International Strategy for Disaster Reduction



National Science & Technology Council

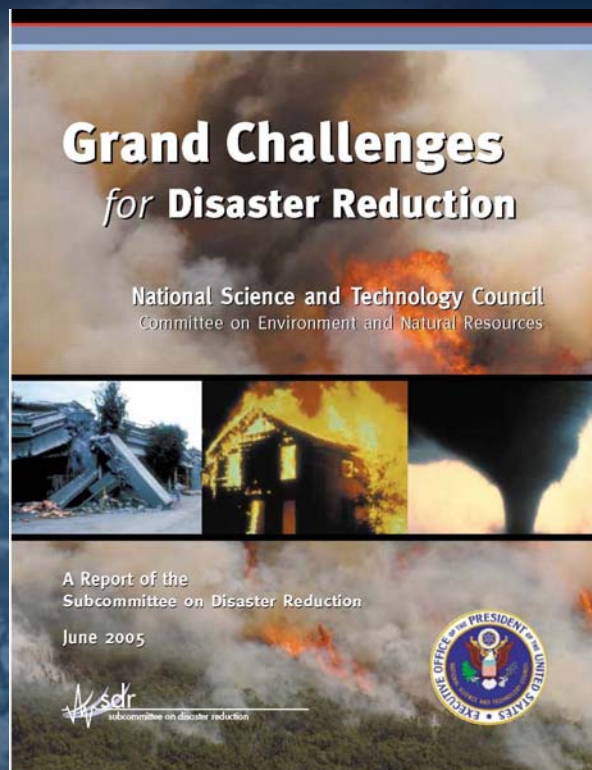
Subcommittee on Disaster Reduction

- Centers for Disease Control and Prevention
- Department of Defense
- Department of Energy
- Department of Homeland Security
- Department of Housing & Urban Development
- Department of the Interior
- Department of State
- Department of Transportation
- Environmental Protection Agency
- FEMA
- NASA
- National Geospatial-Information Agency
- National Guard Bureau
- National Institute of Standards and Technology
- National Oceanic & Atmospheric Administration
- National Science Foundation
- U.S. Agency for International Development
- U.S. Army Corps of Engineers
- U.S. Coast Guard
- U.S. Department of Agriculture
- U.S. Forest Service
- U.S. Geological Survey
- U.S. Public Health Commissioned Corps



U.S. National Platform for ISDR

U.S. strategy for disaster risk reduction parallels the Hyogo Framework

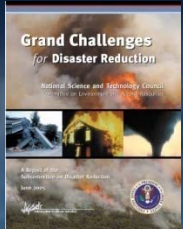


To develop a ten-year strategy for disaster reduction through science and technology, the members of the SDR collaborated with scientists and engineers worldwide to identify a suite of Grand Challenges for disaster reduction. The common goals of the Hyogo Framework and the grand challenges reflect a shared commitment to building more disaster-resilient communities.



U.S. National Platform for ISDR

U.S. strategy for disaster risk reduction parallels the Hyogo Framework



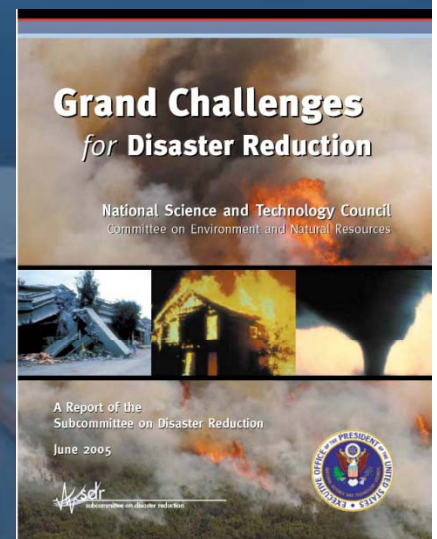
1. Provide hazard and disaster information where and when it is needed.
2. Understand the natural processes that produce hazards.
3. Develop hazard mitigation strategies and technologies.
4. Recognize and reduce vulnerability of interdependent critical infrastructure.
5. Assess disaster resilience using standard methods.
6. Promote risk-wise behavior.



1. Ensure that disaster risk reduction is a national and local priority;
2. Identify, assess and monitor disaster risks and enhance early warning;
3. Use knowledge, innovation and education to build a culture of safety and resilience at all levels;
4. Reduce the underlying risk factors; and
5. Strengthen disaster preparedness for effective response at all levels.

In a more disaster-resilient world...

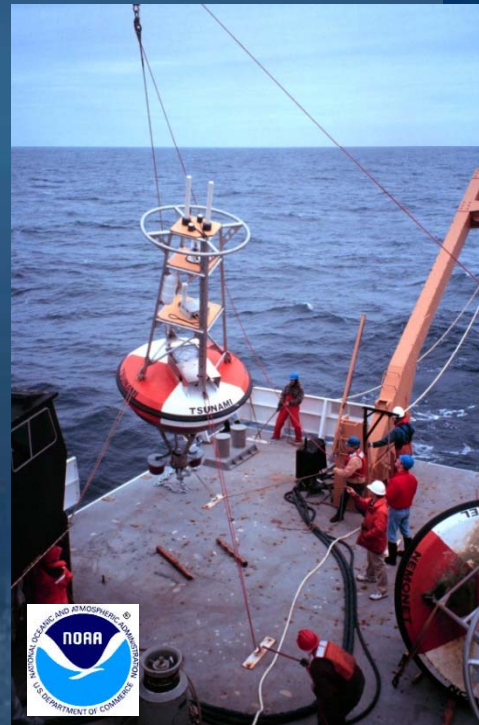
- Relevant hazards are recognized and understood.
- Communities at risk know when a hazard event is imminent.
- Property losses and lives at risk in future natural hazard events are minimized.
- Disaster-resilient communities experience minimum disruption to life and economy after a hazard event has passed.



U.S. National Platform for ISDR

Most significant non-financial barriers and challenges to disaster risk reduction in the U.S.

1. Providing hazard and disaster information where and when it is needed through improved communications to and education for the most vulnerable populations, so they can take actions to protect themselves.



U.S. National Platform for ISDR

2. Understanding the natural processes that produce hazards, including how climate change will affect the hazards (e.g. coastal inundation).



Disaster risk reduction needs to inform climate adaptation strategies



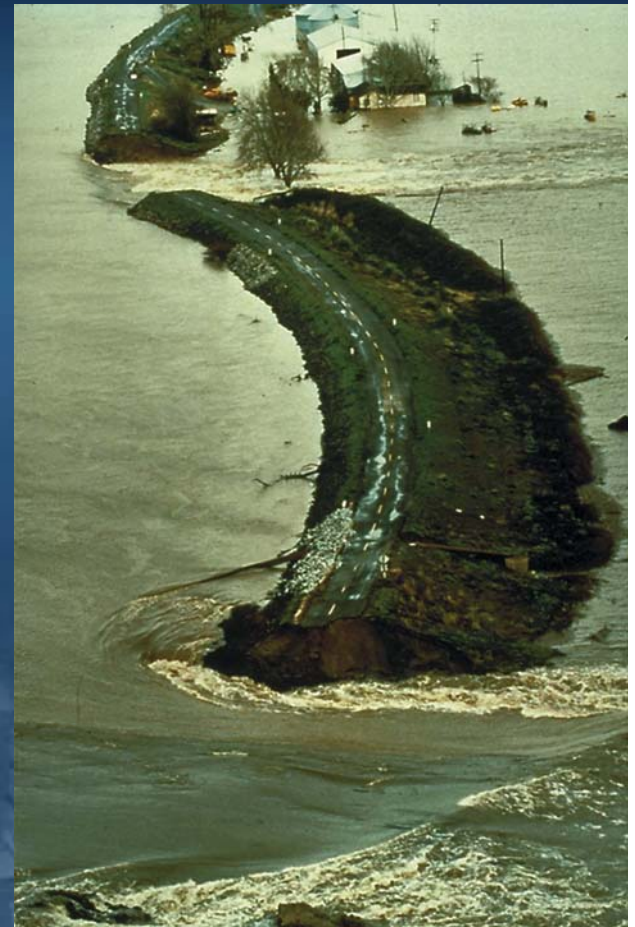
Given the relationships between climate change and extreme events, the community of researchers, engineers and other experts who work on reducing risks from natural and human-caused disasters will have an important role to play in framing climate change adaptation strategies and in providing information to support decision-making during implementation.



-- Presidential science advisor
John Holdren

U.S. National Platform for ISDR

3. Developing hazard mitigation strategies and technologies that can reduce the impact of extreme events on both the built environment and vulnerable ecosystems.
- Affordable and effective hazard mitigation strategies, including land-use planning and zoning laws that recognize the risks of natural hazards.
 - Developing an understanding of the social, cultural, and economic factors that promote or inhibit adoption of promising mitigation technologies.
 - Getting the right incentives in place for mitigation is the key to successful loss reduction.



U.S. National Platform for ISDR

4. Reduce the vulnerability of infrastructure. One of the greatest obstacles to recovery in any disaster is the delayed restoration of critical infrastructure such as transportation, drinking water, electricity, and gas distribution systems. A key implementation step is establishing the technical basis for revised codes and standards for critical infrastructure and essential facilities.



U.S. National Platform for ISDR

5. Developing standardized methods for communities to measure and assess disaster resilience across multiple hazards.
 - A key implementation step is developing and distributing community assessment tools that can be applied to setting priorities in order to maximize resilience.



U.S. National Platform for ISDR

6. Promoting risk-wise behavior.

- The costs of natural disasters are rising as people increasingly move into harm's way in low-lying coastal areas, the wildland-urban interface and geologically active regions.
- In order to achieve 'hazards literacy' and sustained risk reduction, hazards must be real to people.

