

DARPA Overview

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American Psychological Association Webinar

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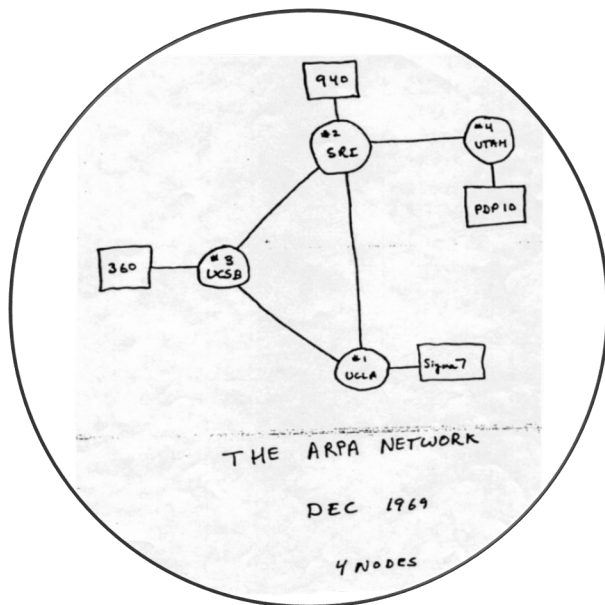


Breakthrough Technologies for National Security

Create breakthrough, paradigm-shifting solutions

Accept and manage significant technology risk

Disrupt or massively accelerate technology roadmaps



The Internet



Foundations of GPS



Advanced Prosthetics



DARPA Technical Offices



Defense Sciences Office

- Novel materials and structures
- Sensing and measurement
- Computation and processing
- Enabling operations
- Collective intelligence
- Global change



Biological Technologies Office

- Threat detection and characterization
- Rapid, scalable protection and countermeasures
- Warfighter overmatch
- Non-traditional platforms and capabilities



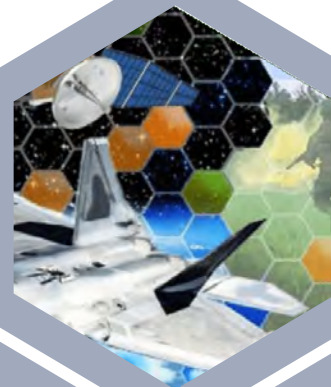
Information Innovation Office

- Proficient AI
- Advantage in cyber operations
- Confidence in the information domain
- Resilient, adaptable, and secure systems



Microsystems Technology Office

- Local processing
- Spectrum dominance
- Microsystems manufacture
- Disruptive microsystems



Strategic Technology Office

- Advanced sensing and effects
- Autonomous system of systems
- Command, control, and communications



Tactical Technology Office

- Tactical systems
- Platforms, systems, and technologies that enable new warfighting constructs
- Reimagination of missions across maritime, ground, air, and space domains



How we think: The Heilmeyer Catechism

1. What are we trying to do?
2. How is it done today and who does it? What are the limitations of the present approaches?
3. What is new about our approach, and why do we think we can be successful at this time?
4. If we succeed, what difference do we think it will make?
5. How long do we think it will take, and what are our mid-term and final exams? How much will it cost?



George Heilmeyer
DARPA Director 1975-1977



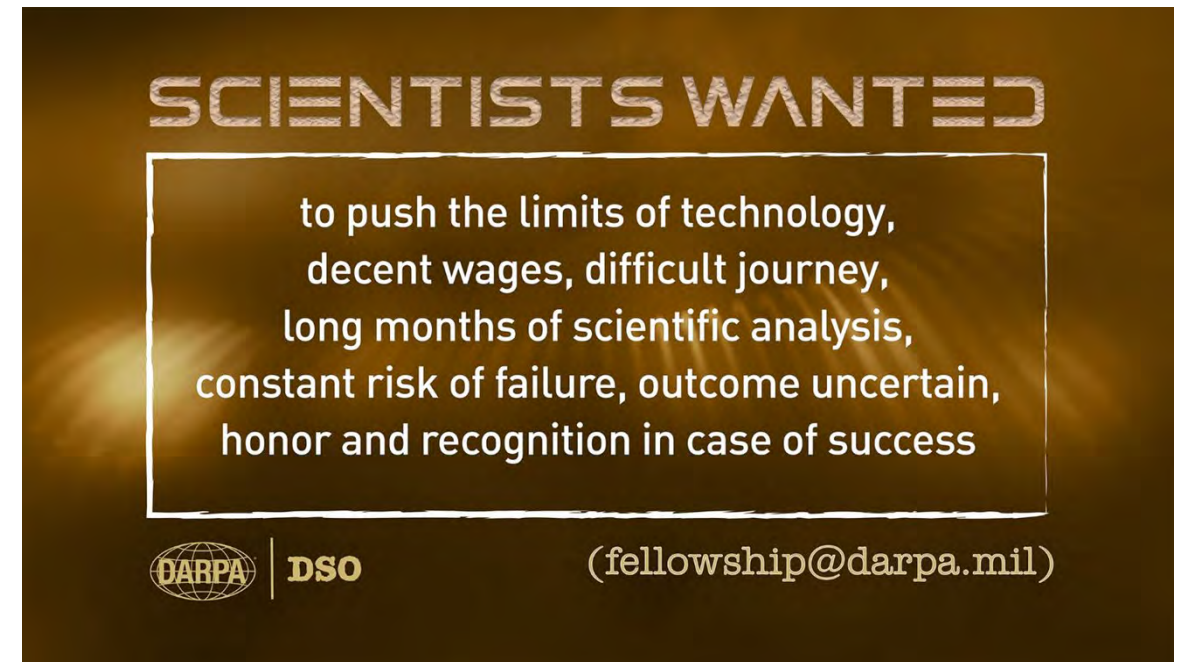
Advanced Research Concepts (ARC)

- New process to quickly capture and rigorously evaluate many ideas
- Focus is on answering high risk/high-reward “what if?” questions



DARPA Innovation Fellowship

- 2-year Fellowship for early career scientists
- Build a long-term pool of diverse talent that can focus on national security





DARPAConnect – Breaking down barriers for nontraditional performers



DARPAConnect is designed to broaden DARPA's reach and stimulate growth and collaboration between DARPA and small businesses and education institutions new to the national security space.

- Focused on breaking down barriers for underrepresented, diverse, and nontraditional performers
- Assist with engagement of a more diverse pool of nontraditional performers
- Resources for disadvantaged performers to assist them in their proposals

For more information or to request assistance please email DARPAConnect@darpa.mil



www.darpa.mil