



U.S. Army RDECOM - Atlantic

Basic and Applied Research Collaboration
Overview

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What RDECOM Does















ARMY RESEARCH LABORATORY

- Extramural Basic Research
- Computational Sciences
- **Materials Research**
- Sciences-for-Maneuver
- Information Sciences
- · Sciences for Lethality
- and Protection Human Sciences
- · Assessment & Analysis
- Advanced Computing & **Big Data**
- Agile Manufacturing
- Synthetic Biology

ARMAMENTS

- Munitions Systems & **Technologies**
- Integrated Weapon Systems
- · Energetics, Warheads & Manufacturing
- Guidance, Navigation & Control
- Fuze & Precision
- **Armament Technology**
- Cross Domain Fires

- Visualization
 - Anti-Access/
 - Area Denial
 - Missile Defense

- Airframe Structures
- · Rotors & Rotor Systems
- Sensors and Seekers

AVIATION AND

MISSILE

- · Guidance, Navigation, and Control
- Propulsion
- Counter-UAS

COMMUNICATIONS-**ELECTRONICS**

- Mission Command
- Tactical and **Deployed Power**
- Tactical Cyberspace Operations
- Electronic Warfare
- Intelligence, Surveillance, Reconnaissance and Targeting
- Network Prioritize Position Navigation and Timing (PNT)

EDGEWOOD. CHEMICAL **BIOLOGICAL** CENTER

- · Chemistry and **Biological Sciences**
- **CB Agent Handling** and Surety
- **CBRNE Materiel** Acquisition
- **CBRNE Analysis** and Testing
- **CBRNE Munitions and Field Operations**

NATICK SOLDIER

- Advanced/Multifunctional Materials
- **Biomechanics**
- Cognitive & Behavioral
- **Sciences Food Science**
- Geographic/Precision **Guided Systems**
- Soldier Performance Optimization
- **Biological Technology**
- **Neuro-cognition**

TANK AUTOMOTIVE

- Ground Vehicle Survivability
- Autonomy-Enabled Systems
- Vehicle Electronic
- Architecture
- Ground System Software Ground Vehicle Power
- & Mobility
- Robotics/Autonomous Systems
- Combat Vehicles
- Advanced Protection

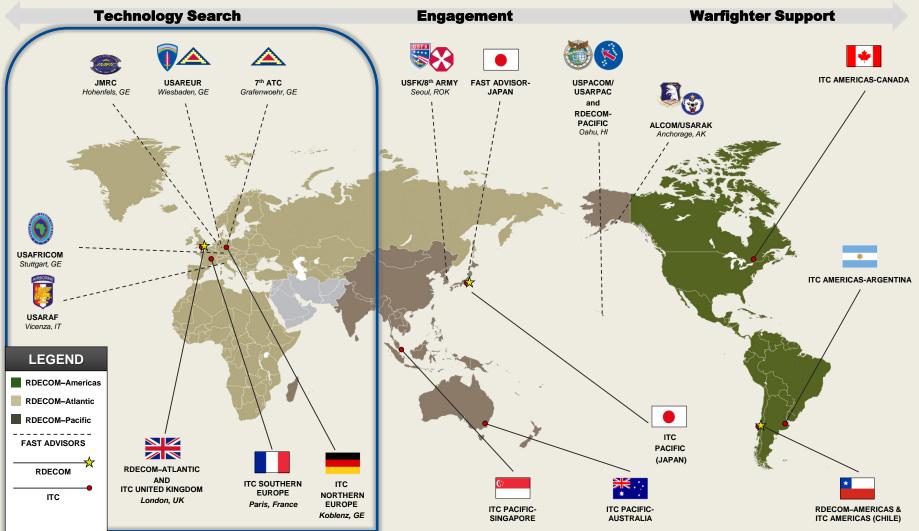
Systems

Delivering capabilities for the Army, joint warfighters, and our Nation





Where RDECOM Is Internationally



Driving innovation around the world with our allies and partners





What RDECOM Atlantic Does

- Conduct outreach on behalf of the Army S&T enterprise
- Identify opportunities of state-ofthe-art and newly emerging S&T across the global spectrum
- Identify priority areas and mechanisms for research exchange and collaboration
- Foster relationships and shape research from a global perspective, avoid technological surprise
- Invest to develop opportunities for cooperation

B&AR

Basic & Applied Research International Engagement & Collaboration

ITC

International Armaments Cooperation & Standardization

FAST

Science & Technology Support for Theater ASCCs

RDECOM-ATL continues to maintain and build relationships with our strongest allied partners.





Basic Research Mission

B&AR

Basic & Applied Research Discovery International Engagement
& Collaboration

- Extramural Basic and Applied Research Overseas
- Research Grants to Academic Institutions
- Grants to support Academic & Scientific Forums
- Grants to fund Foreign expert travel for collaboration with Army Labs & Centers

Goals:

- Innovative Basic Research & Scientific Discovery
- Collaborative Research with world's best scientists
- Build / maintain relationships with the international scientific community

Initiatives:

- Outreach to Academia
 - University Visits
 - Participate in Academic and Scientific Professional Symposia
- Grants to support innovative research, scientific conferences, and collaborative research with US Labs and Research Centers
- Seek US Joint-Service international S&T collaborative engagement opportunities





Technical Areas of Interest

- Chemistry
- Physics
- Life Sciences
- Network Science
- Environmental Sciences
- Human Sciences
- Electronics
- Materials Sciences (structural, electronic, photonic)
- Mechanical Sciences
- Mathematics
- Computing Science

- Energy and Power Technologies
- Aeronautics
- Robotics and Autonomous Systems
- Sensors
- Nanotechnology
- Lasers and Electro-Optics
- Energetic Materials
- Information Technology
- Quantum Sciences
- Synthetic Biology





Broad Agency Announcements

http://www.arl.army.mil/www/default.cfm?page=8

- W911NF-17-S-0002 ARO Broad Agency Announcement (BAA) for Basic and Applied Scientific Research for Fiscal Years 2017 through 2022 http://www.arl.army.mil/www/pages/8/W911NF-17-5-0002.pdf
 - High risk, revolutionary basic research

- W911NF-17-S-0003 ARL Broad Agency Announcement (BAA) for Basic and Applied Scientific Research for Fiscal Years 2017 through 2022 http://www.arl.army.mil/www/pages/8/W911NF-17-S-0003.pdf
 - Basic and Applied Army relevant research





Collaboration Opportunities

Grants

- Seed projects exploring innovative basic research concepts
- Focused research projects addressing specific science and technology challenges
- Collaborative research projects with US Army scientists and engineers

\$25K for 6 months up to \$350K over 3 years





Collaboration Opportunities

Conference/workshop support

- Unique, focused, technical workshops and conferences
- \$3-5K to help support participant travel and conference costs (budget cannot include costs for banquets, refreshments, social functions, entertainment etc)

Visiting Scientist/Subject Matter Expert travel

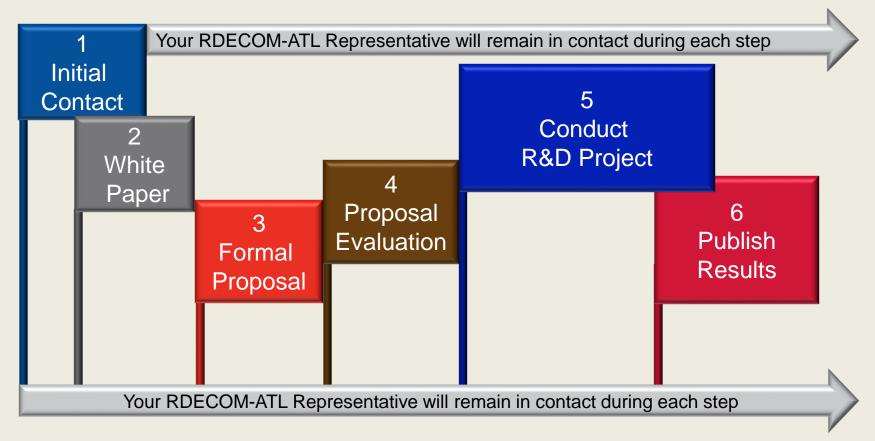
- International SME travel to US Army Labs/Centers
- \$1-3K for travel to US Army Labs/centers for collaborative research discussions and planning





Proposal Process

How to Participate



Timeline depends on multiple factors.

Read more about this process and get examples online at http://www.rdecom.army.mil/rfecatl/





Intellectual Property

Who retains the Intellectual Property rights?

- You, the researcher, and/or University
- The proposal should identify any sensitive or intellectual property restrictions

What does the US Government get from my research?

- Government Purpose Rights (non-exclusive/non-commercial use of the IP)
- International research collaboration
- New relationships with top researchers in key areas to support US Government priorities and strategies

Can the Results be Published?

- It is encouraged to publish your results in an open, peer-reviewed journal, magazine, or other publication
- The US Government can collaborate throughout the research activities to co-author publications with you





Contact Us



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p?id=16662/



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