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## DEFENSE POLICY NEWSLETTER

October 3, 2019 | Lewis-Burke Associates LLC

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## ON THE FRONT LINES

### Army Futures Command Identifies Long-Term Research Gaps

In its first year, the Army Futures Command (AFC) headquartered in Austin, TX, honed its focus on reorganizing its research and acquisition enterprise -- including the Science and Technology (S&T) portfolio -- to address the Army's six modernization priority areas through eight Cross-Functional Teams (CFTs). Now that the new Command has reached full operational capability, senior technical leaders from across the Service are looking at how to approach anticipated needs beyond those near-term modernization plans.

Army senior technical leaders met last month to assess options for influencing AFC's mid-to far-term research and development efforts. AFC has asked the Army senior technical leaders to advise on the necessary research investments for critical areas currently not

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and Intelligence; Future Vertical Lift; Assured Positioning, Navigation and Timing; and Synthetic Training Environment.

For the initial meeting, six new focus areas were discussed: Hypersonics, Directed Energy, Quantum Communication, Cyber, Synthetic Biology, and Augmented Reality/Virtual Reality (AR/VR). For each topic, the senior leaders reviewed and discussed the following questions:

1. *What transformational capabilities are possible?*
2. *Which problems/challenges must be overcome?*
3. *Where should the Army watch, shape, follow, or lead for investing resources?*

For some of those topic areas, AFC may seek proposals from leading universities to create a “hub” to lead Army extramural efforts, similar to the [Army AI Task Force](#) established at Carnegie Mellon University and the Army’s [hypersonics test facility](#) at Texas A&M. While discussions of these new topics are ongoing, senior scientists have indicated the Army should lead basic research investments in quantum, AR/VR, artificial intelligence (AI)-infused cybersecurity, and engineering biology. For applied research, the scientists believe the Army should invest in AR/VR and synthetic biology while collaborating with other services and agencies on research in quantum, cyber, and hypersonics.

In hypersonics, the Army is tracking several fundamental technical areas to enable vehicle flight. However, they noted the lack of necessary test facilities and the risk of depending on the other Services for development and maturation activities. Initial thoughts on directed energy weapons R&D are that the technology is mature and not necessarily in the S&T domain, but models are needed to support acquisition programs. Some specific interests of note included:

- **Cybersecurity priorities:** Cyber-Physical Systems (CPS) and Low Size, Weight, and Power (SWaP) Internet of Things (IoT).
- **AR/VR:** Basic research investments in Bio Synthetic AR and applied research investments in AR-Enabled Weapons and Platforms; Human/Machine Data Fusion for Teams and Mission Command “Every Soldier as a Sensor;” and AR for Medicine.
- **Engineering biology:** Fund basic research in small molecule synthesis and sensing (testing in military environments) and applied research in hierarchical materials, critical material synthesis, forward basing (infrastructure), sensing testing in military environments, and trauma care. The Army will follow and leverage efforts at other government agencies for engineering microbiome; small molecular synthesis (scale-up); manufacturing; vaccines (NIH); energy harvesting; food safety; and water purification.

Lewis-Burke anticipates continued discussions around these topics with some being included in the President’s fiscal year (FY) 2021 budget request for the Army due in February 2020.

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appropriators included a programmatic increase in their FY 2020 Defense appropriations bill last month to add the “Catalyst” program to the Army’s basic research account. As previously reported by Lewis-Burke, the Catalyst program seeks to directly integrate input from the warfighter in Army-funded R&D efforts. The program would embed soldiers at 18 universities to help craft research questions and proposals that produce applied research proposals better aligned with Army interests. The long-term goal is to develop extended networks beyond those 18 universities.

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## VIEW FROM THE HILL

### **President Trump Signs Continuing Resolution to Keep Government Open; Senate Appropriations Committee Paves Way for FY 2020 Defense Appropriations**

President Donald Trump signed a Continuing Resolution (CR) on September 27 that will fund all federal agencies at fiscal year (FY) 2019 funding levels through November 21. While a government shutdown is likely to be averted in the short-term, there is no clear path to resolving key issues needed to pass final appropriations bills, including partisan fights over funding levels for government agencies, immigration and abortion policies, and funding for the construction of a wall at the Southern border. Even if the House and Senate Appropriations Committees makes progress toward agreeing on agency funding allocations, Congress may still need to pass additional CRs past November 21, and a full year CR for all or most federal agencies is still a possibility.

In the meantime, the Senate Appropriations Committee has continued to advance its FY 2020 funding bills. The Committee approved its defense appropriations bill on September 12 by a 16-15 party line vote, revealing the potential for strategic increases for several basic research accounts across the Department of Defense (DOD). The partisan divide over the bill stems from disagreements over the DOD’s efforts to redirect \$3.6 billion of previously appropriated military construction funding to construct a wall on the southern border, a priority for President Trump. If the bill passes the Republican-led Senate in its current form, the dispute over DOD’s role in border wall construction will be the biggest obstacle to negotiations and passage of the defense spending bill with the Democrat-led House. Lewis-Burke’s full analysis of the Senate Appropriations Committee’s FY 2020 defense bill can be found [here](#).

*Sources and Additional information:*

- The Senate Appropriations Committee’s press release can be found [here](#).
- The press release from the minority is available [here](#).

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## NATIONAL SECURITY NEWS

### **DOD Offices Launch New Artificial Intelligence Initiatives**

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efficiency, intends to add two new National Mission Initiatives (NMIs) to its portfolio in fiscal year (FY) 2020. National Mission Initiatives are large-scale efforts to employ artificial intelligence to meet multi-Service challenges and missions. Two new NMIs will focus on “Maneuver and Fires” warfighting missions to create all-domain AI-enabled mission command under contested conditions, and “Predictive Health,” initially focused on suicide risk mitigation and executed in partnership with the Defense Innovation Unit (DIU) organization. Existing NMIs are Project Maven, which utilizes AI algorithms to analyze massive amounts of full-motion video from drones; Predictive Maintenance, which is focused on engine health monitoring for the H-60 helicopter; Humanitarian Assistance/Disaster Relief, which is focused on AI for wildfire perimeter detection and flood assessment and damage assessment; and Cyber NMI, which leverages AI for sensemaking, event detection, and network mapping. The JAIC also recently launched a new website, <https://www.ai.mil/>. Additionally, the Navy is developing an AI Framework that will link AI directly to its mission areas and is working with the Office of Naval Research and the Defense Advanced Research Projects Agency to develop the AI workforce through academic partnerships. Lewis-Burke will continue to monitor forthcoming opportunities in AI research and workforce development throughout the DOD.

### **National Academies Host Report Launch for Decadal Survey on Social and Behavioral Sciences for the Intelligence Community**

The National Academies of Sciences, Engineering, and Medicine hosted a report launch and discussion September 30 on the “[Decadal Survey of the Social and Behavioral Sciences: A Research Agenda for Advancing Intelligence Analysis](#),” bringing together officials from the Department of Defense (DOD) and the Intelligence Community (IC), as well as stakeholders in the academic and research communities. The consensus study report, originally [released](#) in March 2019, recommends areas where social and behavioral sciences (SBS) can significantly advance the IC’s mission in the next ten years. It also identifies opportunities to bridge the gaps between the IC and academia. The report, sponsored by the Office of the Director of National Intelligence (ODNI), signals a recognition by the IC of the importance of SBS research and may inform the IC’s research priorities in the future.

### **Navy Establishes Tech Bridges to Boost Agility, Collaboration**

As the Navy continues to pursue technological innovation, James “Hondo” Geurts, Assistant Secretary of the Navy for Research, Development, and Acquisition, announced a plan to expand collaboration with academia and industry by setting up five regional offices, or “Tech Bridges,” around the country near several of the Navy’s warfare centers. The Tech Bridges have the objective to “connect, reinforce and sustain acceleration ecosystems in off-base locations across the department” which will enable greater collaboration with non-traditional partners.

The emphasis of the Tech Bridges is on fostering innovative processes and promoting information sharing within Naval research thrusts. As described by Assistant Secretary



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the definition of “non-traditional partners” for the Tech Bridges will be start-ups, academia, corporations, small businesses, non-profits, and private capital. As a pilot for the 401 Tech Bridge in Rhode Island, the Office of Naval Research and the Naval Undersea Warfare Center Newport hosted and funded the “[Full Ocean Depth Challenge](#)” on Challenge.gov, with two more prize challenges planned in the near future on materials and protective coatings. More information about each of the Navy Tech Bridges is [here](#).

### **AFRL Aerospace Systems Directorate Welcomes New Director**

Dr. Michael Gregg became the new Director of the Air Force Research Laboratory (AFRL) Aerospace Systems Directorate on September 3. Gregg spent many years supporting Air Force programs, initially as a scientist at what is now Rome Research Site in New York, home of AFRL’s Information Directorate and in the Directed Energy Directorate at Kirtland AFB, NM. Gregg also served in leadership roles at the Missile Defense Agency, C-17 System Program Office, Space and Missile Systems Center, and the C-5 and C-17 sustainment community. Gregg’s goals include promoting collaboration among the AFRL technical directorates and focusing on facility and technology initiatives to position the directorate for long-term success. Additional information about Gregg’s appointment can be found [here](#).

### **Minerva Research Initiative Annual Review Highlights *National Defense Strategy* Connections**

The DOD Basic Research Office hosted its annual [Minerva Research Initiative](#) meeting and review September 18 and 19, convening DOD officials, funded investigators, and members of the research community to discuss the impact of DOD’s investment in social sciences research on national security and defense policy. Researchers were encouraged to offer recommendations on how to improve integration of social science findings to aid the implementation of the *National Defense Strategy*. Keynote speaker Dr. Daniel Green, Deputy Assistant Secretary of Defense for Strategy and Force Development in the Office of the Undersecretary of Defense for Policy, emphasized the value of his political science training when deployed to Iraq and Afghanistan to underscore the Department’s continuing need for the Minerva program and social science investment.

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## **FUNDING AND ENGAGEMENT OPPORTUNITIES**

### **AFRL Releases Explore Opportunity Call for Transformational S&T Capability Ideas**

The Air Force Research Laboratory (AFRL) [released](#) a new opportunity call for “capability ideas that advance the transformational component of the [AF Science and Technology \(S&T\) 2030 strategy](#).” Disruptive ideas should aim to advance at least one of the five strategic capabilities: 1) Global persistent awareness 2) Resilient information sharing 3) Rapid, effective decision-making 4) Complexity, unpredictability, and mass and 5) Speed and reach of disruption and lethality. Ideas should also address one of these functional

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**2019 at 11:59PM PST** and funding invitations are expected by March 2020. More information on the opportunity call can be found [here](#).

### **DEPSCoR White Papers Due on October 25**

White papers are due this month for the DOD Basic Research Office's fiscal year (FY) 2019 Defense Experimental Program to Stimulate Competitive Research (DEPSCoR) broad agency announcement (BAA). As previously reported by Lewis-Burke, DEPSCoR is intended to expand research opportunities in states that traditionally receive the least federal funding for university research. White papers are required and due on **October 25, 2019 by 11:59 PM EST**. Applicants will be notified if their white paper is selected by December 16, 2019, and proposals will be due on February 14, 2020 by 11:59PM EST if invited. More information, including a map of DEPSCoR-eligible states and due dates for research programs, can be found [here](#).

### **DOD Announces RFI for Synthetic Biology Manufacturing Institute**

The Department of Defense (DOD) [announced](#) on September 30 a request for information (RFI) seeking feedback for a new Manufacturing Innovation Institute (MII) for synthetic biology (SynBio) focused on non-biomedical applications. The institute will scale up critical bio-manufacturing processes and related biotechnologies in partnership with industry and academia. The goal of the RFI is to understand how the institute can best utilize the public-private partnership model and understand the technology scope for both defense and commercial products. There will be two stakeholder workshops on October 23, 2019 in Boston, MA and October 25, 2019 in San Jose, CA. Industry and academia are invited to provide perspectives and comments at these events. Registration for the events can be found at <https://synbio.anser.org/>. RFI responses are due **Nov. 8, 2019 at 3:00PM local time**. The full RFI is available [www.fbo.gov](http://www.fbo.gov) under pre-solicitation "FA8650-19-S-5028." Lewis-Burke's full analysis of the RFI can be found [here](#).

### **DOD Releases Naval Engineering Education Consortium BAA**

The Department of Defense (DOD) recently released a broad agency announcement (BAA) for the Naval Engineering Education Consortium (NEEC). The NEEC program, directed by the Naval Sea Systems Command (NAVSEA) Warfare Center, encourages student participation in the naval engineering workforce through project-based research in naval technology. Some of the BAA topics of interest include data science, machine learning and artificial intelligence, and unmanned underwater vehicles. A list of all the topics at each Warfare Center can be found in the full BAA.

DOD estimates awarding approximately \$150,000 per individual award, though the number and size of awards will vary amongst the research areas and depend on the quality of proposals submitted. The closing date for this BAA is **November 1, 2019 at 11:59 PM ET**. The full BAA is available at [www.grants.gov](http://www.grants.gov) under solicitation number "N00174-19-0001."

*Sources and Additional Information:*

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### **ONR Releases Long Range BAA for Navy and Marine Corps S&T**

The Office of Naval Research (ONR) released its fiscal year (FY) 2020 long range broad agency announcement (BAA) for Navy and Marine Corps Science & Technology (S&T) research projects. Projects should aim to improve and advance Navy and Marine Corps operations and involve basic research, applied research, advanced technology development, and in some cases advanced component development and prototypes in science and engineering. Specific technology areas of interest to ONR can be found [here](#). Applications are due by **September 30, 2020**. The full BAA can be found on [www.grants.gov](http://www.grants.gov) under solicitation number "N00014-20-S-B001."

### **Naval Research Laboratory Releases BAA for Science and Technology Research**

The [Naval Research Laboratory](#) (NRL), the Navy's corporate laboratory for scientific and technical research, recently released a broad agency announcement (BAA) for basic and applied scientific research. This BAA is specifically seeking long-range science and technology (S&T) proposals to help advance Navy and Marine Corps operations in science and engineering. Proposals should enable the Navy to "keep pace with rapidly developing technologies," and research may range from basic research to development and prototypes. Specific research areas can be found in the full BAA and are organized within NRL's three research directorates – Systems, Materials Science and Component Technology, Ocean Atmospheric S&T-- and the Naval Center for Space Technology.

This BAA provides researchers with the opportunity to submit white paper proposals to NRL based on the topic areas listed. NRL will only follow-up with those proposals determined to advance and improve Navy and Marine Corps operations. White papers are required and will be accepted on a rolling basis for the next year. Full proposals are by invitation only. More information can be found at [www.grants.gov](http://www.grants.gov) under solicitation number "N00173-19-S-BA01."

### **Naval Applications of Machine Learning Workshop in February 2020**

The fourth annual workshop on Naval Applications of Machine Learning (NAML) will be held February 24-27, 2020 in San Diego, CA. The NAML workshop presents an "opportunity for researchers from Navy research and development centers and our partner organizations to exchange technical ideas and to come together as a team." There is also an opportunity to present at the workshop, and the call for abstracts to present is expected to be released soon. More information on the NAML workshop can be found [here](#).

### **Chemical and Biological Defense S&T Conference Agenda Announced**

The [agenda](#) is now available for the 2019 Chemical and Biological Defense Science & Technology (CBD S&T) Conference on November 18-21, 2019 in Cincinnati, Ohio. As previously reported by Lewis-Burke, the CBD S&T Conference is an opportunity to engage with DTRA's Chemical and Biological Technologies program managers, as well as collaborate and connect with other researchers, scientists, and industry representatives. Through the conference, DTRA seeks to review and identify cutting-edge basic and



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### **CDMRP Combat Readiness--Medical Research Program Solicits Rapid Development and Translational Research**

The new Combat Readiness--Medical Research Program (CRRP), within the Congressionally Directed Medical Research Program (CDMRP), released a solicitation for its Rapid Development and Translational Research Award. Through this mechanism, CRRP seeks to fund research “to improve readiness for delivering frontline care in combat situations and for delivering medical damage control capability, assets, and lifesaving interventions during prolonged and en route care in austere and combat environments.” The focus areas for this solicitation seek integrative, high-impact, and scalable solutions for preventing and managing infection, hemorrhage, neurological injury, pain, and other areas of concern. Areas of interest also include wearable sensors to manage and monitor injuries and exposures, as well as decision-support systems (such as AI, deep learning, and telemedicine) to manage severely injured warfighters.

The pre-application (Letter of Intent) submission deadline is **5:00 p.m. Eastern time (ET), October 23, 2019**. Full proposals are due **November 13, 2019, at 11:59 PM ET**. The anticipated direct costs budgeted for the entire period of performance will not exceed \$1,500,000. The full funding opportunity can be found [here](#).

### **Combat Casualty Care Research Program and NHLBI Release Joint Funding Opportunity Announcement**

The National Heart, Lung, and Blood Institute (NHLBI) and Department of Defense (DOD) Combat Casualty Care Research Program (CCCRP)/Joint Program Committee-6 (JPC-6) released a joint funding opportunity announcement (FOA) to “support high risk/high reward research on the blood/vascular component and regulation of the neurovascular blood unit (aka. Blood-Brain Barrier; BBB) in normal and pathological states to stimulate the development of a new field of science and re-define the neurovascular unit to also include the blood/vascular component to identify targets for diagnostics and regulation of the Blood-Brain Interface.” This initiative will bring together experts in hematology, vasculature, circadian rhythms, and tissue chip development to create enhanced and modified platforms that more closely model the human BBB for assessments and other purposes.

NHLBI and DOD anticipate making five awards in fiscal year (FY) 2020 and up to five new awards in FY 2021. Application budgets are limited to \$425,000 direct costs per year. The application due date(s) are **December 2, 2019** and **October 19, 2020 at 5:00 PM**. Letters of intent are required and must be submitted 30 days prior to the application due date. More information can be found [here](#).

### **IARPA Releases RFI for Biometric Recognition and Identification at Altitude and Range (BRIAR)**

The Intelligence Advanced Research Projects Activity (IARPA) recently released a request for information (RFI) on advancing biometric recognition and identification at altitude and

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anthropomorphic classification. Responses should address specific questions listed in the RFI and are due by **October 21, 2019 at 12:00PM ET**. The full RFI can be found on [www.fbo.gov](http://www.fbo.gov) under solicitation number "IARPA-RFI-19-10."

### **DARPA BTO Releases BAA for Complex Neuropsychiatric Conditions**

The Defense Advanced Research Projects Agency (DARPA) Biological Technologies Office (BTO) released a broad agency announcement (BAA) for its Focused Pharma [program](#). The Focused Pharma program seeks to develop novel drugs that can quickly treat a variety of neuropsychiatric conditions that affect veterans and service members, including post-traumatic stress, depression, anxiety, and substance abuse. DARPA anticipates making multiple awards but does not specify the amount of funding for each award. Abstracts, while not mandatory, are highly encouraged and should be submitted no later than **October 15, 2019 at 4:00 PM ET**. Full proposals are due by **November 19, 2019 at 4:00 PM ET**. The full BAA is available at [www.grants.gov](http://www.grants.gov) under solicitation number "HR001119S0092."

### **DARPA I2O Releases BAA for Assured Micropatching**

Defense Advanced Research Projects Agency (DARPA) Information Innovation Office (I2O) recently announced a broad agency announcement (BAA) for its Assured Micropatching (AMP) program. The goal of AMP is to "create the capability for rapid patching of legacy binaries in mission-critical systems" through innovative research proposals. Proposals should enable game-changing advances in science, devices, or systems to produce assured targeted micropatches for known security flaws. AMP is a two-year program divided into three Technical Areas (TAs). DARPA anticipates making multiple awards in TA1 (Goal-driven decompilation) and TA2 (Assured recompilation) and one award in TA3 (Evaluation), amounting to a cumulative total of \$50 million and organized into three phases. Abstracts are due on **October 8, 2019 at 12:00PM ET** and proposals are due on **November 20, 2019 at 12:00PM ET**. More information can be found on [www.grants.gov](http://www.grants.gov) under solicitation number "HR001119S0089."

### **DARPA OFFensive Swarm Enabled Tactics (OFFSET) Program Seeks Proposals for Fifth "Sprint"**

The Defense Advanced Research Projects Agency (DARPA) Tactical Technology Office (TTO) released a presolicitation notice September 26 for a fifth "swarm sprint" under its OFFensive Swarm-Enabled Tactics (OFFSET) program. The goal of the OFFSET program is to seek innovative proposals in novel research that expand the operational effectiveness of combat forces utilizing unmanned swarm systems. The specific topics of interest for Sprint 5 are (1) the prototyping and integration of innovative component technologies into physical swarm testbeds to create new swarm-focused capabilities and (2) the innovation and integration of novel swarm tactics relevant to OFFSET Vignette 3.

In Vignette 3, a heterogeneous swarm of 250 agents is employed to seize key urban terrain within an area of eight square city blocks over a mission duration of 4-6 hours.

Calls for Swarm Sprinter proposals are issued about every six months as amendments to the OFFSET broad agency announcement (BAA). Proposals for Sprint 5 are due on

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[www.grants.gov](http://www.grants.gov) under solicitation number “HR001117S0011-06.”

### **SPIE Releases Call for Abstracts for AI/ML for Multi-Domain Operations Conference in April 2020**

The [International Society for Optics and Photonics](#) (SPIE) is hosting a conference on April 26-30, 2020 in Anaheim, CA to showcase leading efforts in Artificial Intelligence and Machine Learning (AI/ML) for Multi-Domain Operations (MDO). The conference aims to “promote understanding of near-term and far-term implications of AI/ML for MDO” and increase “awareness of R&D activities in AI/ML that are applicable to MDO.” SPIE is also seeking conference abstracts for AI/ML for Multi-Domain Operations that are due on **October 16, 2019**. More information on the conference and call for abstracts can be found [here](#).

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## **WHAT WE'RE READING**

### **Air Force Officials: Keep Space Research, Acquisition In House**

*Air Force Magazine* reports that Air Force officials are rejecting the idea that a new “Space Force” should duplicate certain pieces of the air Service, such as the Air Force Research Laboratory (AFRL), for its own research and acquisition purposes. The article suggests the Air Force should keep space initiatives within its own research laboratory rather than looking to create a separate organization for the Space Force. Under the Administration’s plans, the Space Development Agency established within the Under Secretary of Defense for Research and Engineering (USD R&E), would move under the Space Force when it is created. AFRL’s Commander said the lab, as a broad-based technology research and development organization, would better support the Space Force through research efforts that could be applied to multiple military mission sets, including space. Lawmakers have also recommended that the Air Force should get a separate acquisition executive for space, a move that Will Roper, the Service’s Assistant Secretary for Acquisition, Technology and Logistics, recently suggested would be inefficient. Read more [here](#).

### **Air Force Strategy Provides Pathway for AI Rollout**

The Air Force published an artificial intelligence (AI) strategy September 12 detailing the steps the military Service must take to fully realize the benefits of data-crunching algorithms and modernize the technology airmen use to do their jobs every day. The strategy, an annex of the Defense Department’s broad AI plan, lays out five focus areas to help the Air Force move through a process that will lead it to daily operational use of self-learning software. “Everyone is responsible to purposefully consider and attempt to include AI in everything we do,” the strategy states. “Exploration, prototyping, and collaboration are not only encouraged, but critical to our future.” Read the Air Force AI Strategy [here](#).

### **AFRL Examines Top Tech Picks**

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initiatives that will lead the development of the Air Force's transformational strategic capabilities for the future, *Breaking Defense* reports. The term "Vanguard" refers to the lead element in a military formation, according to AFRL Commander Maj. Gen. William Cooley. Given that definition, the Vanguard programs that the Air Force selects will have the potential to "fundamentally change" how the Air Force approaches warfighting and concepts of operation, he said. The selected technologies must have an ability to cross the so-called "valley of death" between the lab and the battlefield, which is currently an obstacle for both commercial and military research. AFRL has set aside 20 percent of its annual budget to fund the selected Vanguard programs, and \$165.6 billion has been requested by the Air Force for the lab in FY 2020. Vanguard programs are part of a new strategy rolled out by former Air Force Secretary Heather Wilson focused on developing strategic capabilities, improving research advocacy in the service, and expanding partnerships. Read more [here](#).

### **DOD Report Assesses Role of Interdisciplinary Research in the Future of Social Science**

The Department of Defense released the final report of its "Future Directions in Social Science" workshop series, identifying opportunities for, and challenges to, conducting interdisciplinary research in the social sciences. The workshop series, sponsored by the Basic Research Office in the Office of the Under Secretary of Defense for Research and Engineering (USD R&E), sought to "examine emerging research areas that – in the natural and formal sciences – are most likely to transform future technology capabilities and – in the social sciences – innovatively inform about how the social world works." The report is the product of a workshop held on April 11-12, 2019 in Arlington, VA, on the future of problem-based interdisciplinary social science research. It is intended to be a resource to the S&T community, including the broader federal funding community, federal laboratories, domestic industrial base, and academia. The report proposes solutions for advancing the field of interdisciplinary social science research in parallel with traditional research disciplines, including establishing explicitly interdisciplinary journals and funding opportunities, intellectual spaces for scholars from different disciplines to initiate targeted research collaborations, and new models for structuring social science research funding that are more conducive to interdisciplinary research, such as support for lab-based research inquiry. To read the full report on the Minerva Research Initiative website, click [here](#).

### **Intelligence Community Director Outlines Top Three Priorities**

Army Lt. Gen. Robert P. Ashley Jr., Director of the Defense Intelligence Agency, laid out a three-pronged focus to improve intelligence gathering during a talk at the 2019 Department of Defense Intelligence Information System Worldwide Conference in Tampa, FL on August 19. The three focuses of his plan include: maintain the Joint Worldwide Intelligence Communications System (JWICS), operationalize the new Machine-Assisted Analytic Rapid-Repository System (using cloud computing, AI and machine learning), and use more Open-Source Intelligence. Lt. Gen. Ashley also highlighted the importance of DIA's personnel to its operations. Accordingly, DIA has gathered multi-disciplinary teams

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### NSA's New Cybersecurity Directorate Aims to Create Unified Culture

The National Security Agency's (NSA) new cybersecurity directorate officially launched October 1, and its Director Anne Neuberger's first task is to create "one community, one culture internally" from several thousand personnel including threat intelligence professionals, emerging technologies experts, and nuclear command and control staff, *Fifth Domain* reports. The directorate hopes to leverage this expertise to operationalize intelligence to defend against threats. Neuberger also hopes to establish a pilot program on "foundational technology" to bring together several new groups to jointly work on a problem in an unclassified space. The full story can be found [here](#).

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