

MEMORANDUM OF UNDERSTANDING
BETWEEN THE
DEFENSE ADVANCED RESEARCH PROJECTS AGENCY
AND THE
UNITED STATES DEPARTMENT OF AGRICULTURE
TO
COORDINATE AND COLLABORATE ON AGRICULTURAL INITIATIVES

MOU NUMBER: MOU-DARPA-BTO-26-01

This memorandum of understanding (MOU) between the Defense Advanced Research Projects Agency (DARPA) and the United States Department of Agriculture (USDA) establishes responsibilities and objectives for collaboration to advance agriculture-related research and development initiatives (hereinafter, “collaborative initiatives” or “initiatives”) to safeguard and defend America’s food system. Collectively, DARPA and USDA are referred to as the “Parties.” This is a new MOU.

1. PURPOSE

This MOU establishes a collaborative framework and objectives to advance technological innovation applicable to safeguarding and defending America’s food system from deliberate attack, naturally occurring threats, national emergencies, and natural disasters. This MOU is intended to enhance agricultural security and defense by accelerating adoption and integration of novel technologies from either or both parties.

2. BACKGROUND

DARPA’s mission is to create and prevent technological surprise for U.S. national security. USDA supports extramural and intramural research to advance agricultural innovation and supports discoveries by its educational and extension programs.

The Parties are entering into this MOU to fulfill the action directed by *Key Activity 6: Safeguard Plant and Animal Health* as stated in the *National Farm Security Action Plan* (the Plan), dated July 8, 2025, which states the following:

Action: USDA will partner with the Defense Advanced Research Projects Agency (DARPA) and other Federal research agencies to ensure agricultural projects they fund promote military readiness, protect U.S. plants and animals, and enhance agricultural security.

The Plan elevates the protection of United States agriculture into America's national security framework to ensure defense of America's food and agricultural systems against terror attacks, major disasters, and other emergencies.

In response to terrorist and foreign state nefarious activities toward U.S. agricultural interests and supply chains, the Plan articulates a multi-pronged approach necessary to protect the broad agricultural threat surface against foreign adversaries including improving food production capacity, safeguarding against plant and animal diseases and invasive species, reducing foreign dependence, achieving transformative technological advances in agricultural research to foster American dominance in food and agriculture innovation, protecting research security so that foreign adversaries do not use our Nation's own ingenuity against American citizens, and protecting cybersecurity in the agriculture sector and supply chain.

3. PROPOSED EFFORT / OBJECTIVES

It is hereby agreed that the Parties will leverage their legal authorities, assets, and capabilities, in accordance with law, to advance technological innovation applicable to safeguarding and defending America's food system from deliberate attack, naturally occurring threats, national emergencies, and natural disasters. The objective of the collaboration between the Parties is to help usher in a new golden age of American agriculture that eschews foreign dependence, safeguards food security, rewards farmers and producers, and protects national security.

Areas for collaboration may be identified during an effort sponsored by DARPA's Biological Technologies Office (BTO) called "Ag x BTO" (hereinafter, "Ag x BTO effort" or "effort"). The Ag x BTO effort, which will award up to \$1M to multiple research teams for seedlings lasting up to nine months, is intended to spark innovation in defense of America's food supply with particular interest in advancing early warning systems and countermeasures against chemical and biological threats, developing an integrated and comprehensive threat prediction and modeling capability for agricultural systems, and developing novel methods to assess the occurrence of human intervention and attribute provenance. USDA collaboration could accelerate Ag x BTO technology validation, maturation and adoption.

4. UNDERSTANDING OF THE PARTIES

To the fullest extent permitted by law, the Parties agree to joint areas of cooperation which may include:

4.1. Exchanging information regarding security vulnerabilities in agriculture and threats to America's food system, analysis of developments in the agriculture sector including technological requirements and economic trends, ideas to foster public and private sector adoption of novel innovations applicable to agriculture, and other matters to strengthen the Nation's defenses of critical agriculture and increase American independence over our food and nutrition needs.

4.2. Partnering to develop novel technological solutions to the most pressing national security challenges to United States agriculture and assure American dominance to lead agricultural technology innovation.

4.3. Combining expertise to conduct joint research initiatives, foster the possible exchange of personnel between the Parties (through specific agreements outside the scope of this MOU), and develop greater cross-pollination between DARPA and USDA ecosystems, including partnering with research institutions to fuse DARPA's technological and contracting capacity with USDA's domain expertise and credibility with agriculture producers and states.

4.4. Possible leveraging of USDA testbeds and the respective authorities of each of the Parties to accelerate scientific discoveries, development, commercialization, and adoption of novel technologies, which may include development of an expedited but bounded pathway to rapidly test, validate, and deploy agricultural biosecurity and other technologies to counter emergent threats without sacrificing safety, oversight, or trust.

4.5. Collaborating to safeguard technology and research security so that American ingenuity is not compromised by theft of intellectual property, know-how, and technology transfers or maliciously used against our nation by foreign adversaries.

4.6. Fostering dialogue and formal exchanges between the Parties to meet shared mission priorities.

4.7. Coordinating initiatives amongst the Parties' small business programs to leverage the strength of small businesses through alignment of programs and research.

5. PERSONNEL

Each Party is responsible for its personnel costs, including pay and benefits, support, and travel. Each Party is responsible for the supervision and management of its personnel.

6. GENERAL PROVISIONS

6.1. Points of Contact (POCs): The following POCs will be used by the Parties to communicate matters concerning this MOU. Each Party may change its POC upon reasonable written notice to the other Party.

6.1.1. DARPA POCs:

- Michael Koeris, [REDACTED]
- Robert Saperstein, [REDACTED]

6.1.2. USDA POC(s)

- Scott Hutchins, [REDACTED]
- Katherine Sixt, [REDACTED]

6.2. Correspondence: All correspondence to be sent and notices to be given pursuant to this MOU will be addressed, if to DARPA, to:

- Dr. Michael Koeris
675 North Randolph Street
Arlington, VA 22203
[REDACTED]
- and, if to USDA, to:
- Dr. Scott H. Hutchins
Jamie L. Whitten Building, Room 216W
1400 Independence Avenue, SW
Washington, D.C. 20250-0110
[REDACTED]

6.3. Funds and Manpower: This MOU neither documents nor provides for the exchange of funds or manpower between the Parties, nor does it make any commitment of funds or resources. No provision in this MOU will be interpreted to require obligation or payment of funds.

6.4. Modification of the MOU: This MOU may be modified only by the written agreement of the Parties, duly signed by their authorized representatives. This MOU will be reviewed no less often than at the mid-point of its term and around the anniversary of its effective date in its entirety. Each Party shall review the MOU independently. Coordination between Parties is not required unless a change is needed. The signatories to this agreement, or their successors, will approve all changes to or the termination of this agreement. Changes are effective only after both signatories, or their successors, agree to the changes in writing.

6.5. Disputes: Any disputes relating to this MOU will, subject to any applicable law, executive order, directive, or issuances from either Party's department, be resolved by consultation between the Parties.

6.6. Termination of the Understanding: This MOU may be terminated in writing at will by either Party. Subject to a reasonable determination that any collaborative initiatives will not produce beneficial results commensurate with the expenditure of resources, the Parties

may terminate this agreement through written notification, provided such written notification is preceded by consultation between the MOU signatories. In the event of early termination, the Parties will negotiate the disposition of tangible assets and liabilities.

6.7. Transferability: This MOU is not transferable except with the written consent of the Parties.

6.8. Entire Understanding: It is expressly understood and agreed that this MOU embodies the entire agreement between the Parties regarding the MOU's subject matter, thereby superseding all prior understandings of the Parties with respect to such subject matter.

6.9. Effective Date: This MOU takes effect the day after the last Party signs.

6.10. Expiration Date: The MOU expires on October 1, 2034.

6.11. No Third-Party Beneficiaries: Nothing in this MOU, express or implied, is intended to give to, or will be construed to confer upon, any person not a Party any remedy or claim under or by reason of this MOU, and this MOU will be for the sole and exclusive benefit of the Parties.

6.12. Schedule/Milestones: Schedules and milestones will be established through separate documents relating to any collaborative initiatives resulting from this MOU.

7. SECURITY

7.1. DARPA efforts will be protected under the guidance and oversight of the DARPA Security and Intelligence Directorate (SID).

7.2. Protection guidance for any CUI initiatives will be through consultation with the DARPA program managers and in accordance with DoD Instruction (DoDI) 5200.48, DoDI 5230.24, and applicable DARPA CUI Guides for specific initiatives. DARPA SID is responsible for foreign disclosure decisions on matters related to this MOU.

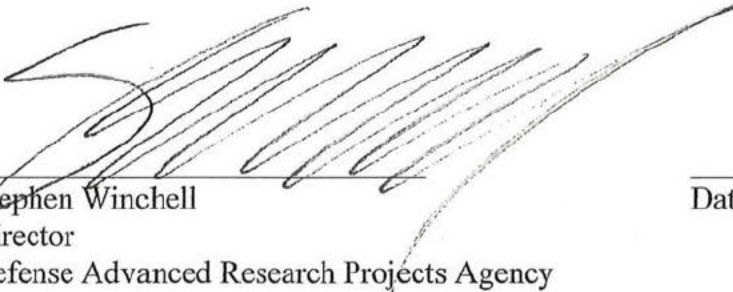
8. PUBLIC RELEASE OF INFORMATION

8.1. DARPA will remain the office of primary responsibility for external relations (public and congressional affairs) for matters pertaining to DARPA efforts conducted under the terms of this MOU, including efforts resulting from DARPA's Ag x BTO seedlings. All external requests for information will be submitted to DARPA's Communications Office, which has sole responsibility for public release authorization determinations regarding DARPA efforts while the efforts are managed by DARPA. All data, information, and documentation related to DARPA-funded efforts intended for external release must be submitted to the DARPA Public Release Center for "Distribution Statement A" approval.

8.2. USDA will serve as the office of primary responsibility for external relations for matters directly pertaining to its operations, policies, and future plans regarding USDA efforts or efforts transitioned from DARPA to USDA by modification to this MOU or transitioned by separate agreement.

8.3. In instances where both DARPA and USDA have equity pertaining to public information, the communications and public release offices for both Parties shall collaborate and jointly address external relations requirements.

9. APPROVAL



Stephen Winchell
Director
Defense Advanced Research Projects Agency

FEB 11 2026

Date



Scott H. Hutchins
Chief Scientist
Under Secretary for Research, Education, and Economics
U.S. Department of Agriculture

FEB 11 2026

Date