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# MESSAGE FROM THE DIRECTOR



Welcome to the National Institute of Food and Agriculture (NIFA) Strategic Plan for Fiscal Years 2022-2026. This plan will serve as our roadmap for the next five years to shape our decision making and effectively and efficiently accomplish our critical priorities.

NIFA's mission is to lead and fund programs that advance agriculture-related sciences. Our investments play a critical role in building the evidence base and translating the evidence into action to ensure all Americans have access to safe, nutritious, and affordable foods, our farmers, ranchers and producers have equitable access to markets, and we are protecting and enhancing our environment with climate-smart agricultural decisions.

In developing this Strategic Plan, we considered feedback from a wide range of external stakeholders, Land-grant Universities, other partners, and our dedicated employees through listening sessions, focus groups and surveys. This plan reflects the tremendous sharing of information, ideas, and thoughts.

This plan is a living document. We will regularly revisit and update goals based on progress and input to meet evolving demands and new and important challenges.

We look forward to continued partnership to further strengthen research, education, and Extension- to best serve agriculture, communities, and society.

Dionne F. Toombs, Ph.D. Acting NIFA Director

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## STRATEGIC PLAN OVERVIEW

#### **ABOUT NIFA**

#### **MISSION**

Invest in and advance agricultural research, education, and extension to solve societal challenges.

#### **VISION**

Lead innovation across the nation through transformative discoveries, education, and engagement that address agricultural challenges.

NIFA is the extramural research funding agency at the U.S. Department of Agriculture. Congress has entrusted us with more than 70 funding programs, totaling almost \$2 billion. We provide funding mainly through capacity, or formula, and competitive grant programs. Our team of nearly 400 experts are dedicated to serving agriculture through research, education and Extension across all communities, benefiting all ages of people who call America home.

#### **ALIGNMENT OF USDA AND NIFA STRATEGIES**

As USDA's primary extramural research, education and extension funding agency, NIFA investments address critical and emerging issues in agriculture and the food systems. NIFA's work is cross-cutting in nature and the key strategies in this plan align with the goals set forth in USDA's 2022-2026 Strategic Plan:

- Strategic Goal 1: Combat Climate Change to Support America's Working Lands, Natural Resources, and Communities
- Strategic Goal 2: Ensure America's Agricultural System is Equitable, Resilient, and Prosperous
- Strategic Goal 3: Foster an Equitable and Competitive Marketplace for All Agricultural Producers
- Strategic Goal 4: Provide All Americans Safe, Nutritious Food
- **Strategic Goal 5:** Expand Opportunities for Economic Development and Improve Quality of Life in Rural and Tribal Communities
- Strategic Goal 6: Attract, Inspire and Retain an Engaged and Motivated Workforce that's Proud to Represent USDA

Additionally, NIFA's strategic objectives align with NIFA's three-pronged approach to deliver comprehensive program leadership and funding to partners and external stakeholders:

- Foundational and applied research ensures that strategies to manage national and global challenges in food, nutrition and agriculture are rooted in robust peer-reviewed evidence and theories;
- Extensive support for education ensures the next generation of scientists, educators, producers and citizens are prepared to understand and address the complex challenges that scientific research reveals; and
- Cooperation with outreach programs and the Cooperative Extension Service that convert scientific research and education into actionable knowledge external stakeholders can use to solve real-world problems.
- As illustrated in Figure 1, **Diversity, Equity, Inclusion and Accessibility (DEIA)** is also a core component of NIFA's service delivery, and strategies in this plan address NIFA's ongoing commitment to reach stakeholders and communities most in need of support.

NIFA's strategic objectives are outlined in this plan and mapped to the type of activity (i.e., Research, Education, Extension). These activities, along with those that support NIFA's overarching DEIA focus, are referenced throughout the document using the icons shown in Table 1.

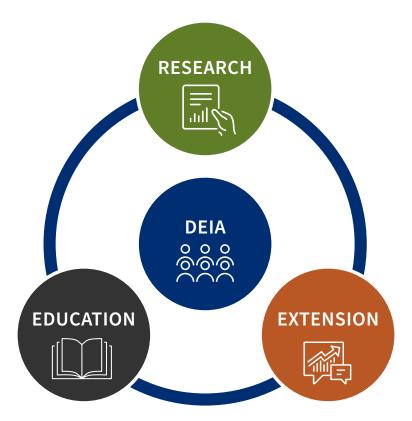


Figure 1. Core NIFA support areas of Research, Education and Extension; unified through the lens of Diversity, Equity, Inclusion and Accessibility.

| ICON | IMPLEMENTATION STRATEGY TYPE |
|------|------------------------------|
|      | Research Activity            |
|      | Education Activity           |
|      | Extension Activity           |
| **** | DEIA Activity                |

Table 1. Activity icons indicate the type of implementation strategies that are featured in the NIFA Strategic Plan.

#### IMPLEMENTATION AND EVALUATION

#### **KEY ENGAGEMENT STRATEGIES**

Implementation of the Strategic Plan relies on close collaboration with Land-grant Universities (LGUs), other education institutions, trade associations, non-profit and private-sector organizations, and many other interagency and federal partners and external stakeholders. This collaboration is the genesis for the developing innovative, scientific solutions to critical issues in agriculture, food, the environment, and communities and determining how those solutions are best applied to resolve the issues.

While NIFA provides program leadership and funding in support of its mission priorities, the agency welcomes feedback from stakeholders and partners through various forums, including Requests for Applications (RFAs), listening sessions, site visits, professional association meetings, and conferences.

#### **EVALUATING PROGRESS TOWARD GOALS**

- NIFA will monitor plan implementation through metrics/measures of success to ensure the objectives are met.
- The "Evaluating Progress" section under each strategic objective includes proposed measures to evaluate progress, sourced grant reporting and program data.
- NIFA plans to refine and define measures for the implementation strategies in each objective.
- Once the measures are defined, NIFA will revisit the Strategic Plan annually to evaluate progress.
- The Strategic Plan is intended as a living document and will be updated periodically to align with departmental priorities.

# STRATEGIC OBJECTIVES AND IMPLEMENTATION **STRATEGIES**

STRATEGIC OBJECTIVE 1: BOLSTER SCIENTIFIC RESEARCH TO ENHANCE THE NATION'S RESILIENCE AND RESPONSE TO CLIMATE CHANGE BY EMBRACING INNOVATIVE AND **NOVEL APPROACHES.** 

This objective aligns with USDA Strategic Goal 1, Combat Climate Change to Support America's Working Lands, Natural Resources, and Communities.

NIFA is committed to combating climate change by investing in research, education, and extension activities that support enhanced soil and forest health, climate-smart agriculture, and disaster risk mitigation and response. This agency-wide objective enables strategic monitoring and oversight into the investments NIFA makes to combat climate change. Measures of progress towards Strategic Objective 1 could include the continued support for Soil Health grants, Signals in Soil grants, SBIR investments in climate-smart agriculture, and/or investments focused on disaster mitigation efforts.

| IMPLEMENTATION STRATEGY TYPE | NIFA IMPLEMENTATION STRATEGIES TO ACHIEVE OBJECTIVE  |
|------------------------------|--|
|                              | Support implementation of advanced technologies and programs that promote climate resilience and seek to enhance soil and forest health.                             |
|                              | Support foundational and applied research to improve the nation's ability to mitigate, prepare for, prevent, rapidly respond to, and recover from natural disasters. |
|                              | Continue to build partnerships with USDA Climate Hubs to facilitate outreach and education that encourages adoption of climate-smart adaptation strategies.          |
|                              | Support USDA Small Business Innovative Research (SBIR) projects that focus on climate-smart agriculture.   |

## STRATEGIC OBJECTIVE 2: ENHANCE RESEARCH AND INVESTMENT IN COMMUNITIES TO ENSURE EQUITY, REDUCE BARRIERS TO ACCESS, AND ADVANCE OPPORTUNITIES FOR UNDERSERVED COMMUNITIES.

This objective aligns with USDA Strategic Goal 2, Ensure America's Agricultural System is Equitable, Resilient, and Prosperous.

Successful achievement of Strategic Objective 2 is critical to the agency's mission of investing in and advancing agricultural research, education, and extension to solve societal challenges. As NIFA continues to strategically engage in partnerships that ensure equitable, resilient, and prosperous agricultural systems, tracking progress towards achievement will ensure that investments generate meaningful results for all agricultural producers, with an emphasis on producers in underserved and underrepresented communities. Measures of progress towards Strategic Objective 2 could include partnerships that strengthen and sustain the agricultural system, increase support for farmers and ranchers, develop workforce training programs, and fund opportunities for minority-serving institutions.

| IMPLEMENTATION STRATEGY TYPE | NIFA IMPLEMENTATION STRATEGIES TO ACHIEVE OBJECTIVE  |
|------------------------------|--|
|                              | Evaluate the impact and increase investment in programs that support new and emerging markets, small businesses, and beginning farmers and ranchers.         |
|                              | Invest in workforce development and education for meat and poultry processing to enhance supply chain resilience and increase competitiveness of the market. |
|                              | Enhance the food and agricultural research capacity at minority serving Universities through targeted outreach and program offerings.                        |

## STRATEGIC OBJECTIVE 3: FOCUS ON CAPACITY BUILDING AND FACILITATE EQUITABLE PARTICIPATION IN NIFA PROGRAMS FOR ALL ELIGIBLE APPLICANTS.

This objective aligns with USDA Strategic Goal 2, Ensure America's Agricultural System is Equitable, Resilient, and Prosperous and Strategic Goal 3, Foster an Equitable and Competitive Marketplace for All Agricultural Producers.

NIFA is committed to equity and competition in the agricultural sector. Strategic Objective 3 focuses on enhancing research and investment into underserved communities and institutions to increase opportunities for MSIs, and expanding outreach, education, and technical assistance. Measures of progress for Strategic Objective 3 could include partnerships leveraged to support NIFA funding for MSIs, new AFRI programs developed to fund research on MSI-initiated topics, funding to support USDA Climate Hubs, and outreach and technical assistance activities supporting underserved and underrepresented agricultural producers.

| IMPLEMENTATION STRATEGY TYPE | NIFA IMPLEMENTATION STRATEGIES TO ACHIEVE OBJECTIVE   |
|------------------------------|---|
|                              | Increase NIFA investments in Minority-serving Institutions (MSIs) and Justice40 Initiative projects.  |
|                              | Expand understanding of available NIFA programs and services among underserved farmers, ranchers, forest landowners and operators through enhanced outreach and promoting awareness of funding opportunities. |

# STRATEGIC OBJECTIVE 4: INVEST IN RESEARCH, EDUCATION AND EXTENSION PROGRAMS WHICH PRIORITIZE NUTRITION INSECURITY AND SEEK TO ENSURE THE FOOD SUPPLY IS SAFE.

This objective aligns with USDA Strategic Goal 4, Provide All Americans Safe, Nutritious Food.

NIFA's funding opportunities and programs provide opportunities to ensure that safe and nutritious food is accessible and available to all Americans. Measures of progress for Strategic Objective 4 could include funding research efforts funded to assess the nutritional value of agricultural crops in a changing climate, nutrition security investments that serve underserved and underrepresented communities, NIFA programs that support food safety initiatives, and support for projects focusing on the availability of affordable, nutritious food.

| IMPLEMENTATION STRATEGY TYPE | NIFA IMPLEMENTATION STRATEGIES TO ACHIEVE OBJECTIVE  |
|------------------------------|--|
|                              | Fund research efforts assessing the nutritional value of agricultural crops in a changing climate.   |
|                              | Continue to support nutrition security initiatives which seek to ensure access to healthy and nutritious food in all communities.  |
|                              | Continue to focus on food safety initiatives such as enhancing food safety practices, as well as projects involving multi-state coordination and community outreach.                     |
|                              | Combat obesity by investment in programs that ensure availability of affordable, nutritious food, and programs that provide individuals and families science-based nutritional guidance. |

## STRATEGIC OBJECTIVE 5: STRENGTHEN PARTNERSHIPS AND FOCUSED OUTREACH IN **UNDERSERVED COMMUNITIES.**

This objective aligns with USDA Strategic Goal 5, Expand Opportunities for Economic Development and Improve Quality of Life in Rural and Tribal Communities.

NIFA is committed to tracking and reporting progress on its commitment to expanding opportunities for economic development and improving the quality of life in rural and tribal communities. By supporting outreach activities conducted through NIFA programs, and ensuring equitable access to NIFA programs, NIFA plans to generate meaningful results that will be communicated transparently. Measures of progress for Strategic Objective 5 could include outreach events and information sessions that target underserved and underrepresented communities, community colleges, rural non-land-grant colleges of agriculture, and technical schools, participation in Learning to Leading events, and funding which supports Cooperative Extension's presence in tribal communities.

| IMPLEMENTATION STRATEGY TYPE | NIFA IMPLEMENTATION STRATEGIES TO ACHIEVE OBJECTIVE   |
|------------------------------|---|
|                              | Increase participation of community colleges, technical schools, and rural institutions of higher education in NIFA programs through capacity building and technical assistance initiatives.  |
|                              | Support students from 1890 institutions, 1994 institutions, insular area institutions, Hispanic-serving institutions, Alaska Native-serving institutions, and Native Hawaiian-serving institutions and prepare them for careers in the food, agriculture, and natural resources sciences. |
|                              | Continue to support Extension's presence in tribal communities providing education, knowledge, and diversified and targeted outreach activities.  |

## STRATEGIC OBJECTIVE 6: BUILD THE AGRICULTURAL WORKFORCE AND CULTIVATE A **CULTURE OF MUTUAL RESPECT AND ACCOUNTABILITY.**

This objective aligns with USDA Strategic Goal 6, Attract, Inspire and Retain an Engaged and Motivated Workforce that's Proud to Represent USDA.

A diverse and motivated workforce is crucial to NIFA's success and agriculture's future. In considering the future agricultural workforce, NIFA may measure progress through K-14 engagement in agricultural literacy and workforce development programs at community and rural non-land-grant colleges of agriculture, initiatives to enhance 4-H and Positive Youth Development programs at land-grant universities in minority communities, and investments to MSIs. To support equity and diversity in NIFA's workforce, measures of progress under this Strategic Goal may include robust Diversity, Equity, Inclusion and Accessibility (DEIA) staff trainings.

| IMPLEMENTATION STRATEGY TYPE | NIFA IMPLEMENTATION STRATEGIES TO ACHIEVE OBJECTIVE   |
|------------------------------|---|
|                              | Diversify the U.S. food and agricultural workforce by expanding education and workforce development opportunities for traditional, underserved, and underrepresented communities. |
| 888                          | Develop and foster a diverse NIFA workforce reflective of the American people.  |
| 888                          | Establish an adaptive learning framework about DEIA topics to enhance understanding and implementation of DEIA practices in the workplace.  |

# OUTLOOK FOR THE FUTURE

As the USDA National Institute of Food and Agriculture prepares to lead agricultural innovation across the nation, the goals and objectives laid out in this plan will guide our programmatic and operational decisions to ensure we are addressing the most pressing issues facing our partners, our stakeholders, the agricultural enterprise and our nation. It is vital that we use the funds entrusted to us by Congress to resourcefully and effectively invest in projects that deliver the solutions we need to secure the nation's future, improve our food supply and nutrition, protect our environment, preserve our natural resources and prepare the next generation of agriculturalists and scientists.



National Institute of Food and Agriculture
U.S. DEPARTMENT OF AGRICULTURE