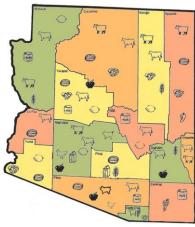


# Best Practices for the Arizona Department of Agriculture to Support Local Food Systems







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Policy recommendations will be presented to Governor Hobbs and the Arizona Department of Agriculture Director Paul Brierley.

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# **Executive Summary**

The following report, conducted by Master of Science Students at Arizona State University's Swette Center for Sustainable Food Systems, provides insights and recommendations for the Arizona Department of Agriculture (AZDA) and interested stakeholders. The focus of the report is to demonstrate the benefits that locally focused programs offer to farmers in other states and to increase the programmatic activities related to local food system efforts throughout the state of Arizona. To ensure recommendations were made within the context of the existing local food system landscape, the research team conducted interviews with a variety of stakeholders currently active within Arizona's local food landscape. Secondly, the research team conducted interviews and performed quantitative research on various state departments of agriculture including Idaho, Minnesota, and Vermont. Combining the insights shared by all interviewees and gleaned from reviewing state codes, budgets and department of agriculture websites, the research team formulated four recommendations.

#### Recommendations for the State of Arizona:

- 1. Pursue legislative action to expand AZDA's purview
- 2. Increase budget and staff capacity at AZDA
- 3. Enhance Arizona Grown® programmatic activities
- 4. Expand collaborative efforts among Arizona local food stakeholders

The research team strived to provide a timely report to the new leadership in the Governor's Office and at AZDA and looks forward to witnessing the implementation of the provided recommendations.

# Introduction

Vibrant local food systems continue to draw consumer interest, pull in new farmers, and increase awareness of local food at the municipal, state, and federal level (Low, et al., 2015). In Arizona, there are a plethora of local food activities, from lively farmers markets and producer cooperatives to school garden and urban agriculture programs. The Arizona Department of Agriculture (AZDA) has an opportunity to increase participation within the local food system, and this report provides recommendations on how AZDA can best meet the needs of existing local food system stakeholders while promoting Arizona grown food to ensure the next generations of Arizonans continue to support the legacy of Arizona agriculture.

Our researchers first asked how Arizona stakeholders are actively engaged in supporting a robust local food system and what opportunities they could identify for AZDA to increase their engagement within the local food system. Secondly, researchers engaged with various state departments of agriculture across the United States about existing programs focused on local food systems that could be implemented by AZDA. By including both existing Arizona stakeholders and other state departments of agriculture, the research team was able to create recommendations that include best practices from a national level while considering the needs of existing Arizona stakeholders.

This report includes an analysis of the currently used definitions of "local," metrics to assess the strength of local food systems, federal programs that provide funding to strengthen local food systems, and examples of existing reports for local food activities within Arizona. In the findings section, the report includes interviews with active stakeholders within the Arizona local food system, interviews with three state departments of agriculture and accompanying data showing the funding mechanisms and programs conducted by the department of agriculture, along with an interview of AZDA staff.

The discussion section contains the integration of the literature review with the interview responses and quantitative data gathered from various states with active local food programs. The discussion section is followed by the conclusion section, which outlines four key recommendations for AZDA to implement to further enhance the local food system in Arizona while ensuring collaboration with existing stakeholders active in the space.

# Methodology

## Arizona Stakeholder Interviews

To assess the opportunities that the Arizona State Department of Agriculture (AZDA) has to implement and expand new and existing programs that benefit the local food system of Arizona, two research questions were utilized:

- 1. How are Arizona stakeholders engaged in supporting a robust local food system?
- 2. What opportunities does AZDA have to be additive to the existing local food system within Arizona?

These questions were answered by review of several existing, published reports from various Arizona based organizations and interviews with ten non-governmental and community-based organizations that play key roles in Arizona's local food system. Due to the nature of the research, the research team submitted recruitment materials, consent forms, and interview questions to the Institutional Review Board at Arizona State University (ASU). Upon receiving IRB approval, the research team began to recruit stakeholders working for various organizations within the Arizona food system.

Organizations represented in interviews were:

- Arizona Association of Conservation Districts
- Arizona Farm Bureau
- Arizona Food Systems Network
- AZ Farm to School Network
- AZ Food Bank Network
- Central Arizona Land Trust
- Development of Regenerative Yields Cooperative (DRY Co-op)

- Future Farmers of America
- Local First AZ
- Oatman Farms/Oatman Flats
   Ranch
- Sun Produce Cooperative
- Local Agricultural Technical Assistance Provider (Anonymous)

More details about the Arizona stakeholders who participated in this research can be found in the findings section of this paper. Questions posed to Arizona stakeholders include assessing previous interactions the organization had with AZDA, familiarity with the existing Arizona Grown® program, identified needs that exist within the local food system that are being met by AZDA and needs that could be met by AZDA in the future, engagement with federal agencies and federal funding programs, and an assessment of resources that would increase the organizational capacity to promote and strengthen local food systems.

**Table 1: Interview Questions for Arizona Stakeholders** 

Focus Area	Question Posed
	Please introduce yourself and describe the
	organization you represent.
	2. Can you describe what part of the food system
	you're engaged with?
	a. Food production
Stakeholder role and	b. Food processing
understanding	c. Food aggregation
of AZDA programs	d. Food distribution
	e. Markets & Consumers
	f. Other
	3. What do you know about the Arizona Department
	of Agriculture (AZDA)?
	4. Are you familiar with AZDA's Arizona Grown®
	program?
	5. What are some major needs that exist within the
	local food system that are being met by
Local Food System Needs	AZDA?
	6. What are some major needs that exist within the
	local food system that you see AZDA meeting
	in the future?
	7. What programs currently exist in Arizona that help
	create access for producers and consumers
Local Food Promotion	to local markets and coops?
	8. What additional programs exist in Arizona that
	promote local food?
	9. What USDA agencies have you previously
	engaged with? (For example, NRCS, FSA,
	AMS, FNS, FPAC, NIFA, FSIS, etc.)
	10.Have you applied for USDA funding before?
Access to Resources	11. What resources would increase your capacity to
	promote and strengthen local food systems?
	12. Is there anything else you'd like to share with us
	about your organization's involvement with
	local food systems in AZ?

Interviewees consented to the interview being recorded and recordings were safely stored and only reviewed by the research team. Interviews were also transcribed to facilitate response coding. The research team took notes during the interview and populated a key takeaway spreadsheet (see Appendix 1). Transcriptions of interviews were coded to count the number of specific phrases used in the interviews, which allowed for tracking of overarching themes (see Appendix 2). The key themes from Arizona stakeholder interviews guided the next round of interviews with employees from state department of agriculture to provide programmatic insights that may be implemented by AZDA.

## **State Department of Agriculture Interviews & Analysis**

The second round of interviews focused on State Departments of Agriculture in Idaho, Minnesota, and Vermont, as well as Arizona. These states were selected based on a review of programmatic activity from department websites and the availability of staff to participate in interviews. Questions for the state employees were approved by the IRB and focused on the department's role in the local food system of said state, how they engaged in local food system work and how they collaborate with food system stakeholders.

**Table 2: Interview Questions for State Dept. of Agriculture Interviews** 

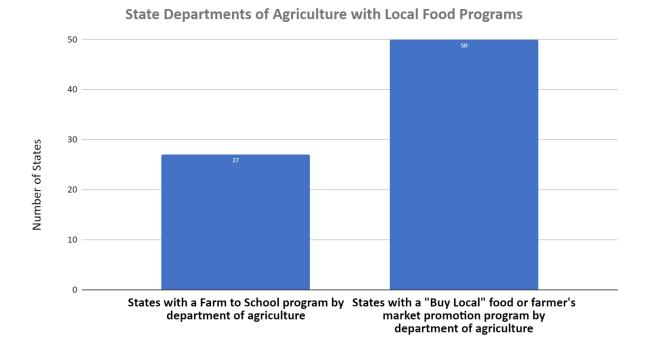
Focus Area	Question Posed		
	Please introduce yourself and share what state department of agriculture you are representing today.		
	In what capacity is your department of agriculture involved with the local food supply chain?		
State Department of Agriculture's Role in Local Food System	<ul> <li>3. Does your state department of agriculture have an existing program or initiative that promotes, supports or strengthens the local food system?</li> <li>a. If yes, what is it called and how does it fit within the department structure?</li> <li>b. If no, has there been a program/initiative implemented in the past?</li> </ul>		
	4. How is the program/initiative funded?		
	5. What activities and services does the program/initiative offer?		
	6. How does the program/initiative/dept. of agriculture define "local"?		
Lacal Food	7. What identified outcomes is the department of agriculture striving to achieve in regard to this program/initiative and how are they measured?		
Local Food System Engagement	Does your state department of agriculture encourage local businesses to purchase local?		
	9. How does your department of agriculture plan to use the recently announced Resilient Food Infrastructure Program (RFSI)?		
Collaboration with Stakeholders	10. What, if any, types of collaborations exist with non-profits, local or regional entities or cooperatives in the state?		
	11. Do you have any food policy advisory committees/coalitions that are convened by your state department of agriculture or that your department participates actively in?		

12. How do you partner with USDA agencies to support local food and producers?
13. Is there any other information you'd like to share with us today?

Additional research was conducted to better understand the vast array of programming that has been implemented to support local food systems throughout the country. These research questions included:

- 1. What are the best practices or programs that support a state's local food system?
- 2. What can be learned from local and regional food programs in state departments of agriculture to strengthen AZDA's capacity to support Arizona's food system?

While there were limitations in finding peer-reviewed and published papers on these topics, the research team was able to find various impact reports from state agencies as well as non-governmental organization reports that were published and available to the public. The research team also conducted website searches of all 50 state departments of agriculture throughout the United States to assess the existing programs implemented by the state department of agriculture to promote local food system activities. The two primary programs were a "buy local" or local food promotion program and a farm to school or farm to institution program. A compilation of findings is available in Appendix 3 and will be discussed in the literature view and findings section of this report.



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In addition to the broad research conducted on all 50 state departments of agriculture, the research team utilized census data, budgetary information and state codes for the three states interviewed and Arizona. Census data was gleaned from the USDA Census of Agriculture conducted in 2017, the most recently published data available. State budgets were found in the most recent legislative session or directly from the department of agriculture's website. Each state has published codes for the codification by subject matter of the general and permanent laws of said state. Chapters and titles referring to the creation of the department of agriculture, the appointment of the director, the various rules, powers and duties to be conducted by the state department of agriculture. This information was used in combination with interviews to create a comprehensive overview of the various programs and initiatives facilitated by the state departments of agriculture, as well as understanding the associated costs and funding mechanisms.

Figure 1

# **Literature Review**



Photo credit: Arizona Food Systems Network (AZFSN)

## **Defining Local**

What is a local food system? A food system is a group of interconnected elements which work to provide food to people. Food systems include production, distribution, and consumption of food within a defined area (Phillips, R. and Ellett, J., 2019). However, there is no agreed upon definition of "local" within a food system context at this time (Rossano, 2022).

The state of Arizona does not have a definition of "local" when it comes to food production. In fact, only eight states in the U.S. have passed legislation that defines "local" (Rossano, 2022). Some states provide parameters in programs that promote and market local food. For example, the Idaho Preferred program defines locally grown food by ensuring such food "must be grown in Idaho, processed products must contain at least 20% locally grown ingredients, meats must be raised or processed in Idaho, and wines must be made of 95% Idaho grown grapes (Idaho Preferred, 2023)."

Some definitions of "local" rely on a geographical distance from the consumer of said local product. In Vermont, "local" is limited to a 30-mile radius (Rossano, 2022) whereas for some federal programs, a 400-mile radius can be considered "local" (Martinez, et al.,

2010) though this definition does not apply to all federal programs. Governments and communities need to work together to develop appropriate definitions and strategies to strengthen their local food systems, even if the specific boundaries of "local" may vary from one place to another.

## THE LOCAL FOOD SYSTEM



Figure 2 (Awasthi, 2023)

## **Trends in Local Food Systems**

The trends in local and regional food systems are well described in the published report, *Trends in U.S. Local and Regional Food Systems* (Low et. al, 2015), and can be used to define local food systems, assess the barriers to strengthening a local food system, and outline the policy opportunities that can enhance local food systems in a specific locale.

There are two main marketing channels utilized by local and regional food producers (Low et. al, 2015). Direct-to-consumer marketing channels include farmers markets, roadside stands and u-pick operations where consumers come to the farm and harvest the products they wish to purchase. Intermediate marketing channels include sales directly to restaurants and sales to regional food aggregators and institutional buyers. The USDA Census of Agriculture includes questions on both marketing channels and

the data collected are utilized in understanding the local food system in a specific state or region (Martinez, et al., 2010). Another component within local markets are food hubs though research on these enterprises and their benefits is not available. According to Low et. al. (2015):

"Food hubs may compete with other types of local food sales in certain regions. Existing research suggests that local food marketing outlets may be more competitive than complementary, but research on whether food hubs and farmers' markets are competitive or complementary outlets for local food is not available (p. 7)."

Trends show that people are willing to pay a higher price for local food if they are aware that said food is local (Low et al., 2015). According to the report (Low et al., 2015, p. 50), "demand for local foods can enhance the markets available to local farms, possibly increasing their financial viability." There are a variety of barriers that limit farmers' access to both direct to consumer and intermediary markets. These barriers include accessing processors and adequate food safety regulations and guidelines, including available technical assistance to navigate obstacles such as quality control and meeting consumer demand (Low et al., 2015).

Various policies can be implemented on a local and state level to enhance local food systems. Examples of successful policies include tax relief for farmers' markets, appropriated funding for capital infrastructure projects as well as funding to promote production, distribution and marketing of locally grown food, and various efforts to support community gardens and urban agriculture (Low et al., 2015). At a federal level there are numerous programs that support local food systems and those will be outlined later in the literature review section of this report. Government entities can also collaborate with existing non-profit organizations that work within local food systems in a given area. Collaborations may include buy local campaigns like the <a href="Buy Fresh">Buy Fresh</a>, <a href="Buy Fresh">Buy Fresh</a>, <a href="Buy Fresh">Buy Local campaign</a> used in 21 states (Low et al., 2015).

## Supporting Local at the State and Federal Level

#### **Statewide Local Food Promotion**

Numerous local food promotion programs exist at both the state and federal levels. According to Nassz, et. al. (2018), state branding programs are "initiatives intended to increase sales of locally grown and processed products by differentiating products produced within the state" (p. 1). Oftentimes, these state branding programs use logos to inform consumers about the product. These labels can indicate where in the state the

product was grown and whether the product was grown, raised, or processed in the state. The Arizona Grown® program is managed by the Arizona State Department of Agriculture, and its purpose is to "raise awareness about the benefits of buying locally grown" and "make it easy for shoppers to spot Arizona products" (Arizona Grown®, 2018).

AZDA's Specialty Crop Guide lists two organizations in Arizona that provide tools for consumers to find local food around the state (AZDA, 2023). The Arizona Farm Bureau manages a tool called "Fill Your Plate." This interactive tool allows site visitors to find farmer's markets near them, search the state for vendors that sell a certain farm product, recipes, and a travel guide for consumers to explore the many agritourism opportunities throughout the state (Arizona Farm Bureau. All Rights Reserved, n.d.). Similarly, Local First AZ's "Good Food Finder" contains a search tool that allows consumers to search the state by location, keywords, and categories of local food such as: bread, prepared food, BIPOC owned, Eggs, Women Owned, Veteran Owned and more (Good Food Finder, n.d.).

"Buy local" marketing campaigns are often implemented by state agencies and have been shown to change consumer behavior (Stearns, 2017). Most of these campaigns are focused on consumer education, however some include consumer pledges where the customer (individual, business, or corporate entity) pledges to spend a certain amount of their budget on local purchases.

## **Statewide Farm to Institution Programs**

Many state departments of agriculture have an existing program that supports institutional procurement, allowing producers and aggregators to sell directly to public schools and other institutions within the state. These programs can increase market opportunities for local producers and increase access to local food for children enrolled in public schools (English, et al., 2020).



Photo credit: Arizona Food Systems Network (AZFSN)

In a review of all existing programs offered by the various state departments of agriculture in the U.S., 38 states publicized a farm to institution program on their website (see Appendix 3). The Arizona Farm to School Network (AZF2SN) supports farm to school programming in Arizona. The network convenes communities of practice around school gardens, food education, and institutional local food procurement. AZF2SN exists as a state-wide hub of connections, research, and resources.

## **Federal Programs Supporting Local Food Systems**

Since 1996, the federal government has passed several acts to support local food, including the Community Food Security Act. Various programs have evolved to include local food purchasing support like the WIC and Senior Farmers' Market Nutrition Programs. In 2009, the USDA introduced the *Know Your Farmer, Know Your Food* 



initiative to raise awareness of and support local and regional food systems (Liang, 2015). Beginning in 2012, the USDA allocated \$9 million to the Farmers Market Promotion Program, and it has since expanded to the Local Agriculture Marketing Program (LAMP), to \$133 million in 2023. Within that span, the number of farmers markets in the US grew from 7,864 (USDA Directory Records More Than 7,800 Farmers Markets, 2012) to 10,010 (National Farmers Market Directory, 2023).

The Local Agriculture Marketing Program currently offers four funding opportunities on an annual basis. These programs provide grant dollars to farmers, ranchers, food entrepreneurs, nonprofits, and public agencies to develop, strengthen, and support new and existing local food systems throughout the country (AMS, 2023). Programs include the Farmers Market Promotion Program, Local Food Promotion Program, Regional Food System Partnership Program and the Value-Added Producer Grants. The first three programs are administered by USDA Agriculture Marketing Services, while the Value-Added Producer Grants are administered by USDA Rural Development. Another program, Food Distribution Program on Indian Reservation (FDPIR) provides "food and administrative funds to participating Indian Tribal Organizations and state agencies" that serve low-income Native Americans. Despite initially facing some resistance from tribes who viewed this program as another form of unnecessary federal intervention, FDPIR is typically welcomed by tribal organizations due to the large variety of fresh food it provides (FDPIR, n.d.).

Each state department of agriculture is eligible to apply for the Specialty Crop Block Grant Program on an annual basis, since being established by the Specialty Crops Competitiveness Act of 2004 which was crafted to both increase competitiveness of specialty crops and bolster the industry. Arizona submitted a plan to utilize \$1,308,495.84 during the 2022 fiscal year through the Specialty Crop Block Grant Program (Killian, 2022).

Earlier this year, the USDA announced a new program, the Resilient Food Systems Infrastructure program, that would provide funding for all state departments of agriculture. In June of this year, AZDA presented the plan for implementing the RFSI in Arizona, in partnership with the Arizona Food Systems Network (James, 2023). The focus of the cooperative agreement between USDA AMS and AZDA is on supply chain coordination. The program will last for four years, ending in May 2027. Arizona was allocated just over \$4.5 million and AZDA is the lead administrator of the funding. The "funds will support expanded capacity for aggregation, processing, manufacturing, storing, transporting, wholesaling, and distribution of locally and regionally produced food products, including specialty crops, dairy, eggs, grains for consumption, aquaculture, and other food products, excluding meat and poultry" (James, 2023). The finalized state plan will be submitted by the time this report has been finalized and if approved by USDA AMS, there will be a competitive grant process created and launched by May 2024 for sub-awarded funding for infrastructure projects.

Various municipalities, schools and non-profit organizations in Arizona have received funding through the Urban Agriculture and Innovation Production Competitive Grants program as well as the Community Compost and Food Waste Reduction Project (USDA, 2021). These programs are provided by the Office of Urban Agriculture and Innovative Production, housed under USDA Natural Resource Conservation Service.

# Measuring Arizona's Local Food System

Given the various definitions of local, as discussed above, measuring, or assessing a local food system can be a complex undertaking. Census of Agriculture data, gathered every five years by the USDA, reports food marketing practices including food sold directly to consumers and food sold directly to retail markets, institutions, and food hubs for local or regionally branded products. These data points can be utilized to assess the local food system of a state (Martinez, et al., 2010). Farms that earn income from agritourism and recreational services may also sell direct-to-consumers and in 2010, "49 percent of organic producers" (Martinez, et al., 2010, p. 21) also sold direct-to-consumers. These Census of Agriculture data points can be used to measure a local food system.

The existing Arizona agriculture sector is abundant, with over 26 million acres in farmland and just over 19,000 individual farm operations (USDA, 2019). In 2017,

Arizona had 826 farms selling food directly to consumers, accounting for \$26,588,000 and 187 farms selling locally or regionally branded products to retail markets, institutions and food hubs, accounting for \$231,342,000 (USDA, 2019). There were 202 farms participating in agri-tourism and recreational services in 2017. There were 74 farms selling certified organic products, accounting for \$97,956,000 in sales in 2017 (USDA, 2019).

In 2017, Arizona had 826 farms selling food directly to consumers, accounting for \$26,588,000 in sales.

Cross-referencing USDA Census of Agriculture data with marketing and promotional activities for locally grown food in Arizona is one way of assessing the current local food system. There are two main actors providing this type of service across the state. The Arizona State Department of Agriculture offers a marketing program called Arizona Grown®. In addition, a non-profit entity, Local First Arizona, promotes local food through their initiative "Good Food Finder".

Arizona Grown® lists 78 farmers markets in twelve counties (AZDA, 2023, p 16-21) whereas the Good Food Finder shows 48 throughout the state (Good Food Finder, 2023). The National Farmers Market Directory counts 105 farmers' markets throughout the state (National Farmers Market Directory, n.d.b). Farmers market counts vary by organization, as some directories rely on submissions from existing markets, whereas others may require a membership to be included as a listing. According to Kathleen Merrigan, former deputy secretary of the USDA, "farmers markets are a critical ingredient to our nation's food system. These outlets provide benefits not only to the farmers looking for important income opportunities, but also to the communities looking for fresh, healthy foods" (National Farmers Market Directory, n.d.b). Regardless of the precise count, a sizable number of farmers markets in a state showcase a local food system's presence.

# **Existing Food System Reports in Arizona**

#### Arizona's Statewide Food Action Plan

In 2022, the Arizona Food Systems Network (AZFSN) published a statewide food action plan. This plan was created to guide advocacy work, build stakeholder capacity and create opportunities for investment in Arizona's local food system (Arizona Food

Systems Network, 2022). The action plan was created with support from Vitalyst Health Foundation and convened by Pinnacle Prevention. Fourteen local and statewide organizations (including 150 participants) supported the creation of the plan in 2017 after AZFSN convened to assess Arizona's existing food policy coalitions. According to the action plan, key challenges in the local food system were identified and through a participatory planning process, the statewide food action plan was published in 2022 (Arizona Food Systems Network, 2022). The Arizona Food Systems Network has five key values:

# The Elements of Arizona's Food System Growing, Foraging and Ranching Environmental Processing Preservation Transporting and Sustainability Distributing Stewardship Equity Wisdom-sharing Respect **Human rights** Retailing and Marketing Preparation Waste and Cooking Management Consumption

Figure 3 (AZFSN, 2023)

According to the <u>Arizona Statewide Food Action Plan (2022)</u>, coordination of the plan includes ten elements of the Arizona food system including growing, foraging, ranching,

processing, transporting, distribution, retailing, marketing, preparation, cooking, consumption, waste management, safety, land and water stewardship, and environmental preservation.

The Statewide Food Action Plan outlines four key priorities to achieve tangible outcomes towards the goal of "a vibrant, sustainable and equitable community food system for Arizona" (Arizona Statewide Food Action Plan, 2022, p 12). with various strategies and actions under each priority. The first priority listed is food access and distribution to ensure all Arizona residents and visitors can access food grown and sold within the state. Key activities within this priority include activating "sustainable funding sources for a locally grown marketing campaign" and "supporting policy efforts aimed at incentivizing local food procurement" (Arizona Statewide Food Action Plan, 2022, p 15).

The second identified priority is ensuring access and protection of land and water. Many of the strategies for addressing this priority are based on policy activities, including streamlining barriers for producers to access USDA programs (Arizona Statewide Food Action Plan, 2022, p 17). The third priority is focused on climate smart food ways to ensure the environmental and cultural diversity of Arizona is leveraged for food production going forward. The fourth priority outlined in the food action plan is focused on developing the agricultural workforce. Strategies include engaging more youth in apprenticeship programs, creating peer-to-peer learning opportunities, and increasing access to technical assistance (Arizona Statewide Food Action Plan, 2022, p 21).

# Regional Case Study: Food System Evaluation in Maricopa County

In 2019, the Food Assessment Coordination Team (FACT), a subdivision of the Maricopa County Food System Coalition, completed a comprehensive food assessment for Maricopa County, a mostly urban county with 59% of the state's population. According to the University of Arizona Cooperative Extension, Maricopa County agriculture "accounts for 31% of Arizona's total agricultural cash receipts" producing crops like hay, vegetables, grain, and cotton (UACE, 2020). The report highlights that Arizona is known for its vegetable production. However, farmers are facing issues with accessing land and water, as well as necessary infrastructure for processing and distributing food across the state (Vitalyst Health, 2019). Despite there being a lot of interest in supporting local food producers, there are tensions between urban land development and protecting farmland. Maricopa County is one of the most impacted counties for farmland loss in Arizona (American Farmland Trust, 2022).

The report outlines various policies that support local food systems in Arizona including allowances of food production in urban areas, community gardens in Homeowners

Associations (HOAs) and edible landscapes on city property, designations that allow for agritourism and agritainment, and education programs for gardening and composting (Vitalyst Health, 2019, p. 17-18). The report also outlines various opportunities to enhance economic resilience by implementing "eat local" marketing campaigns and diversifying market opportunities for farmers, as well as strengthening connections between food system stakeholders and advocating for policy that protects the existing food system and ensures its continuation for future generations (Vitalyst Health, 2019, p. 28-30).



Figure 4 (The Maricopa County Food System Coalition, 2019)

Another report, completed in 2018, was also focused on the local food system of Maricopa County. The report, published by CRC Works, titled *Building Community Networks Through Community Foods*, highlights various ways to build a more robust local food system. One key takeaway is increasing connectivity between all players in the food system to turn the food silos into a food system (Meter & Goldenberg, 2018). Another finding in the report highlights the lack of trust between producers and politicians, primarily due to development pressures and the lack of farmland protection initiatives (Meter & Goldenberg, 2018).

# **Findings**

## **Arizona Stakeholder Profiles**

In order to assess the existing local food system activities within Arizona, interviews were conducted with ten participants representing twelve entities. These entities spanned the Arizona network, from producer cooperatives to local technical assistance providers to non-profit organizations to educational programs. Each group provided valuable insights into the existing local food system and how the Arizona Department of Agriculture could further enhance the growth and vibrancy of the local food system. To provide context for the interview findings, each group will be profiled before sharing key takeaways from the interviews. Interview questions can be found in the methodology section of this report.

The following groups participated in Arizona stakeholder interviews with the research team:



1. Created by Arizona's Conservation Districts in the 1940s, the Arizona Association of Conservation Districts (AACD), a 501(c) nonprofit organization, was established as a means of support to help coordinate and fund locally-led conservation efforts across the state and to unify and represent District goals and interests. Through its efforts, AACD helps to get more conservation funds to the Districts so that they can get more conservation work on the ground.



2. The Arizona Farm Bureau is an advocacy organization representing agricultural producers across the state. The main activities include policy advocacy, communications and agricultural education. The Arizona Farm Bureau is the largest general agricultural service non-profit in the state.



3. Arizona Food Systems Network is a network of food system stakeholders who work together to improve Arizona's local food system and functions as a statewide food policy council. It is convened by Pinnacle Prevention with support from Vitalyst Health Foundation and recently published a Statewide Food Action Plan, as noted in the literature review section of this report.

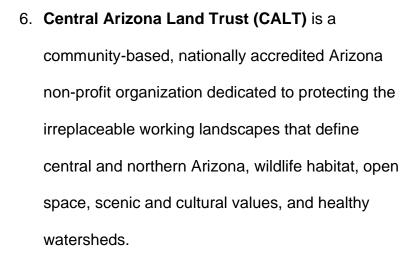


4. The Arizona Farm to School Network is a network of stakeholders who support farm to school activities across Arizona. They focus on three pillars of farm to school which are school gardens, procurement, and education. AZ Farm to School Network convenes communities of practice to encourage collaboration among participants to share data, resources and celebrate successes.



5. Arizona Food Bank Network is a network made up of five regional food banks in Arizona. The network collaborates with smaller local food pantries to address hunger and food insecurity.







## 7. Development of Regenerative Yields

Cooperative (DRY Co-op) supports reciprocal interaction of agricultural producers and service providers to create and maintain equitable, transparent, and sustainable local food supply chains while providing ecosystem services and networking benefits for their members and their communities to support both planetary and human health.



8. **Arizona Association FFA** provides opportunities for students to grow and develop careers in agriculture. This is a nationwide organization with active chapters throughout the state of Arizona.



9. Local First Arizona is a nonprofit organization that supports a thriving economy in Arizona by supporting small businesses, and promoting local food and an equitable food system. They offer services to increase the economic development in rural and urban areas. One initiative offered by Local First AZ is the Good Food Finder, which is a tool utilized by Arizonans and visitors who are seeking to purchase and enjoy locally grown food.





## 10. Oatman Farms/Oatman Flats Ranch is a

Regenerative Organic Certified<sup>®</sup> farm that grows heritage wheat, holistically grazes livestock, and produces a variety of value-added products sold locally and nationally. The farm operation seeks to model a resilient farming system in dry and hot climates.

11. Sun Produce Cooperative is a statewide coop
that partners with producers, distributors, and
customers to increase access to Arizona grown
food throughout the state. They are actively
involved in farm to school activities and corporate
wellness programs. Sun Produce Cooperative
works with small farms and ensures local food is
accessible by accepting SNAP/EBT at many of
their farm bag pickup sites.

## 12. Local Agricultural Technical Assistance

**Provider -** this organization contributed to the research but wanted to remain anonymous.

## **Arizona Stakeholder Interview Themes**

## Interview Key Takeaways

Interviewees provided insights into how the Arizona State Department of Agriculture could support existing local food system efforts, fill gaps within the existing activities, and further enhance the growth of the local food system across the state. During the Arizona stakeholder interviews, local organizations recognized historical collaboration with AZDA in the following ways:

- 1. Partnering with food systems organizations and farmers to implement food recovery programs through gleaning projects. State legislation was passed to reimburse donated crops;
- 2. Hosting "Ag Day", annual Food Summits and various food access workshops;
- 3. Advocating for former Governor Ducey to sign a proclamation for Farm to School month; and
- 4. Offering a variety of training for growers focused on farm and food safety practices.

Many interviewees noted the need for AZDA to receive additional funding to increase staff capacity and hire staff who are passionate and knowledgeable about local food system work. Four key themes emerged from the interviews related to existing programs or activities currently conducted by AZDA, along with the overarching key theme to increase AZDA staff capacity. Those key takeaways include:

- 1. Increasing capacity of AZDA staff;
- Enhancing the Arizona Grown® program;
- Leaning into multi-stakeholder collaborations across the state; and
- 4. Partnering with youth programming and educational offerings, including farm-toschool programs.

For a full list of themes from stakeholder interviews, see Appendix 1.

#### Interview Coding

One method of data interpretation on interviews is to code interviews to pull out words or phrases that show up throughout various interviews. This shows an emergent theme in topics or areas of focus that show cohesive thoughts across various interviewees. See Appendix 2 for the full coding spreadsheet. Thirteen key phrases were identified across the Arizona stakeholder interviews. These include land access, capital, farmers markets, food access, marketing (promotion), supply chain, processing, funding, economic, aggregation, student, youth, and education. Food access, funding and marketing appeared in almost all interviews and over 50 times. Using this insight, the next phase of interviewing various state departments of agriculture allowed the research team to gather details about programs offered by departments of agriculture that address these three key areas of need in Arizona.

# Key Takeaway 1: Increase Staff Capacity

As noted in numerous interviews, AZDA has limited staff capacity to increase programmatic activities within the local food system efforts. To expand capacity, AZDA would need additional funding and the ability to hire staff knowledgeable about local food system efforts and program management. Based on interviewees responses to questions related to engagement with AZDA, it was acknowledged that there is not a lead staff contact for local food efforts, nor a consistent staffing position that supports efforts around strengthening the local food system or promoting local food markets within Arizona. Any programmatic efforts that AZDA undertakes will require increased staff capacity to ensure successful program implementation.

## Key Takeaway 2: Enhance Arizona Grown®

Most interviewees were aware of the Arizona Grown® program, offered by AZDA, but did not rely on it for marketing services or educational uses. Some interviewees expressed concerns about the parameters used within the Arizona Grown® program, referring to the unclear definition of "local" food as discussed in the literature review. In Arizona, many food systems leaders refer to local food as food grown in the state of Arizona. However, there is nuance on tribal lands and near the US-Mexico border, as many people live across man-made borders. For example, some farmers grow their crops on Mexican soil, but live in the US. Similarly, farmers can live, process and sell their food in Arizona, but grow the produce in New Mexico. The various accepted definitions of local may lead to further confusion within a statewide local food promotion campaign, like Arizona Grown®.

Many interviewees mentioned the opportunity for AZDA to increase their marketing of Arizona Grown® products and provided potential partnership ideas including the Fillyourplate.org project, the Arizona Specialty Crop Guide, and Local First AZ's Good Food Finder. Interviewees noted that this type of marketing is mainly consumer driven, which helps ensure individual buyers are aware of locally grown and sold products but may not lead to an expansion in markets that is necessary for farmers to ensure long-term economic viability and desired growth.

## Key Takeaway 3: Lean in to Collaboration

Certain interviewees mentioned the opportunity for a new funding infrastructure coming through the Resilient Food System Infrastructure (RFSI) program awarded to each state department of agriculture. This program supports the middle of the supply chain for local foods, expanding "capacity for the aggregation, processing, manufacturing, storing, transporting, wholesaling, and distribution of locally and regionally produced food

products" (Resilient Food Systems Infrastructure Program, n.d.). AZDA recently shared it's implementation plans and according to one interviewee, some of the funding will be given through subawards to existing organizations that have direct relationships with small and mid-scale producers and infrastructure assets in the regional food system. More information about this funding opportunity is included in the literature review section. A common theme among the interviewees was the need for AZDA to increase collaboration with existing entities in the food system. Based on interviews, there are many organizations working on local food activities throughout Arizona and AZDA can play a role in supporting those with additional grant programs, building relationships to strengthen collaboration, provide coordination support and participate in existing convening opportunities such as the AZ Food System Network. Various interviewees noted that AZDA had been facilitating the Food and Agriculture Policy Advisory Committee (FAPAC) but it has not met since leadership shifted with the past election cycle.

# Key Takeaway 4: Partner for Youth and Educational Offerings

Various interviewees mentioned the opportunity for AZDA to be more engaged with farm to school programs and educational offerings for youth. There are federal funds available for farm to school programs, but state funding support is limited. AZDA could play a key role in Arizona's farm to school efforts. AZDA worked with the Arizona Department of Agriculture along with the Governor of Arizona to establish a proclamation that declared October as Farm to School Month. This is one way that AZDA has been involved in farm to school but based on interviews, stakeholders believe AZDA could play a bigger role. One interviewee mentioned the opportunity for AZDA to better support youth engagement efforts and educator programs that would allow for externships at various agricultural businesses.

# **State Department of Agriculture Case Studies**

The research team interviewed three staff members from state departments of agriculture, Idaho, Minnesota, and Vermont. Initially, the research team attempted to schedule interviews with additional states, including Alaska, California, South Carolina, Florida, and Maryland but were unsuccessful with outreach attempts. To ensure comprehensive information was gleaned from each state, the research team conducted an analysis of census data, department budgets, and state code's dictating the scope of the departments of the states participating in the interviews.



Figure 5 (Idaho Preferred, 2023)

#### Overview of Local Food in Idaho

Idaho had a population of 1,716,943 people in 2017 and is the only intermountain west state interviewed for this research. Based on Census of Agriculture data from 2017, Idaho has 1,765 farms, representing approximately seven percent of farms in Idaho, that sell direct to consumers and 281 farms, approximately one percent of farms in Idaho, selling local or regionally branded products to retail markets, institutions, and food hubs. The total sales value in dollars for both direct to consumer sales and sales to retail markets, institutions, and food hubs for locally branded products in 2017 was \$88,347,100, which was 1.13% of the total state sales. The ratio of sales per capita for sales value sold direct to consumers is \$16.31 (USDA, 2019). Idaho has 79 farmers markets (National Farmers Market Directory, n.d.e) throughout the state, which equates to one market for every 21,733 residents.

#### **Defining Local**

Idaho State Department of Agriculture staff reported that they define local food as "anything grown or processed in Idaho."

## Idaho State Department of Agriculture Local Food Promotion Program

The Idaho State Department of Agriculture has a total approved budget of \$51,183,300 for the 2023 FY (Idaho H.B. 325, 2023). The Idaho State Department of Agriculture's primary program related to supporting the local food system is the <u>Idaho Preferred program</u>. This program is designed to "promote, connect, motivate producers by focusing on supply chains" and "promotes local food: direct to consumer, to retailers, restaurants, schools; as well as distributors" (Idaho Preferred, 2023). Based on information shared in the conducted interview, the primary source for funding this program are federal grants from the United States Department of Agriculture.

## **Key Programmatic Activities & Successes**

The Idaho Preferred program has many activities spanning across four main pillars. The program connects with producers in the following ways (Idaho Preferred, 2023):

- 1. Directly through agritourism, e-commerce, and farmers markets;
- 2. Retail through direct, brokers, and distributors;
- 3. Restaurants through distributors, chefs, and food service workers; and
- 4. Farm to School through nutrition service providers and distributors at pre-K to university educational institutions

The Idaho Preferred program provides match-making services at the retail and restaurant level. They offer retailers promotional signage to showcase local food available in stores. There are various tours offered throughout the year including chef tours to farmers and social media influencer tours that expand the messaging across social platforms. Idaho Preferred is also targeting agritourism to increase economic activity for local producers.

Based on a 2022 annual report, Idaho Preferred increased the number of retail participants to 12 grocers with 65 retail locations (Idaho Preferred, 2023). In 2022, Idaho Preferred hosted an inaugural harvest festival in collaboration with Boise Co-op hosting 21 agricultural vendors (Idaho Preferred, 2023). One way to measure success of this program is to assess sales data from annual promotions. In 2022, there were over \$37.3 million in specialty crops sales stemming from various promotional campaigns (Idaho Preferred, 2023).

Additional governmental acknowledgement is given to the local food systems of Idaho by way of proclamations made by the sitting Governor. The governor of Idaho has proclaimed September as Idaho Preferred Month on an annual basis for 17 years (Idaho Preferred, 2022). This year, Governor Brad Little proclaimed August as Farmers Market Month, to "showcase the bounty and diversity of Idaho agriculture" (Plum, 2023).

The Idaho Preferred program is making great strides in promoting and developing markets for Idaho based food producers to connect with the local communities. The program achieved this by updating their website with a new targeted search engine and a Buy Online/Buy Direct section. Their social media following on Facebook, Instagram and YouTube has grown to over 18,500 in the last few years. The program is successful in achieving their mission "to connect Idaho agriculture and food producers with consumers, retailers and food services to grow their marketplace" (Idaho Preferred, 2023).

#### **Overview of Local Food in Minnesota**

Minnesota had a population of 5,746,606 people in 2017 and of all the states interviewed for this research, has the population size closest to that of Arizona. Based on Census of Agriculture data from 2017, Minnesota has 3,533 farms, approximately five percent of farms in Minnesota, selling direct to consumers and 637 farms, approximately one percent of farmers in Minnesota, selling local or regionally branded products to retail markets, institutions, and food hubs. The total sales value in dollars for both direct to consumer and farms selling to retail markets, institutions, and food hubs for locally branded products in 2017 was \$107,754,000, which was 0.29% for total state sales. The ratio of sales per capita to sales value sold direct to consumers is \$7.01 (USDA, 2019). Minnesota has over 300 farmers markets (National Farmers Market Directory, n.d.f) throughout the state, which provides one market for every 25,581 residents.

## **Defining Local**

Based on a recently published request for applications for the <u>Minnesota Local Food</u> <u>Purchase Assistance Program</u>, the state of Minnesota defines local as:

"Food that is raised, produced, aggregated, stored, processed, and distributed in the locality or region where the final product is marketed to consumers, so that the total distance that the product travels between the farm or ranch where the product originates and the point of sale to the end consumer is at most 400 miles, or both the final market and the origin of the product are within the same State, territory, or tribal land" (MN Local Food Purchase Assistance Program, n.d. p 10).

## Minnesota Department of Agriculture Programs & Funding

The Minnesota Department of Agriculture (MDA) receives state appropriations and funding through USDA's Specialty Crop Block Grant program. The department had a total budget of \$93 million for FY 2021 (State of Minnesota, 2022).

The Minnesota Grown<sup>™</sup> program has existed for 30 years and was established to link customers to sources of locally grown products and agritourism opportunities. The budget for Fiscal Years 2024-2025 is \$500,000 (MDA, 2023).

Through the <u>Agricultural Growth, Research and Innovation (AGRI) program</u>, the MDA offers various grant programs depending on producers' operation(s), their target market(s) and experience levels. Applicants may request up to \$50,000 to be used to demonstrate more profitable farming operations, energy and/or resource efficiency, other environmentally friendly practices, or for development of new or expanded market promotion. The budget for FY 2024 is \$350,000 (MDA, 2023).

MDA also implements the <u>Farm to School and Early Care Grant program</u> that connects school districts and early childhood education centers with local food producers to obtain fresh, healthy food. The grant program provides reimbursement for Minnesota grown and raised foods, as well as funding for kitchen equipment that assists school districts and early care centers to buy, prepare and serve more local food. In addition to the grant, the MDA provides training and support to producers and schools to help increase and promote Farm to School and Early Care efforts across Minnesota (*Farm to School and Early Care Grants | Minnesota Department of Agriculture*, n.d.). The budget for AGRI in FY 2024 is \$935,000 (MDA, 2023).

# **Key Programmatic Activities & Successes**

MDA has various programs that support and promote the local food system across the state The Minnesota Grown program is a partnership between MDA and local producers. The Minnesota Grown logo is licensed to 1,290 farms and farmers markets. This functions as the primary local food promotion service throughout the state. Participating producers pay a membership fee to obtain a license to use the logo and access other marketing materials that are published in an online directory of goods used to promote Minnesota grown products across the state. According to a survey conducted by the department and discussed in the interview, 91% of the members see value in the program and 80% of consumers recognize the Minnesota Grown logo. Funding for this is included in the annually appropriated budget for the state department of agriculture. Under the appropriations language provided by the state, for every four dollars from the state, a one-dollar match must come for private sources, such as licensing fees for the Minnesota Grown program. As the program expands, there are rising costs. However, with a 25% growth in activities, there has been a 15% growth in viewership. This shows the importance of a well-funded local food promotion program.



Figure 6 (Minnesota Grown, 2023)

Despite a robust local food promotion program, the Department acknowledges that there are supply chain barriers and market gaps that continue to exist. The Department

is seeking to be more inclusive of diverse communities, expand member knowledge in outreach including printing materials in multiple languages, as well as building partnerships with institutions, restaurants, and retail stores. To ensure grant funding for addressing these barriers, the department acknowledges that it needs to collect robust data, which often relies upon relationship building. To support these efforts, MDA is working with partners through the <a href="Statewide Cooperative Partnership">Statewide Cooperative Partnership</a> to build relationships, foster collaborations and collect more robust data on Minnesota's local producers and markets that can inform future efforts (*Cooperative Partners | Minnesota Department of Agriculture*, n.d.).

Collaborating with stakeholders has been a key driver of success for MDA. Recently, a three-year cooperative project through the Statewide Cooperative Partnership for Local and Regional Markets allowed stakeholders to better identify producer and consumer needs based on data. This partnership is led by the Department along with the University of Minnesota. The Local Food for Schools (LFS) and Local Food Purchase Assistance (LFPA) programs are utilized to contract with Minnesota growers, and that food often feeds underserved communities. In addition, the USDA Resilient Food Systems Infrastructure (RFSI) program has awarded MDA \$12.25 million and MDA began seeking input to prioritize objectives from its stakeholders in July 2023.

The collective successes from LFS, LFPA, RSFI and the Statewide Cooperative Partnership programs have enabled producers and consumers to connect to and support the Minnesota Grown initiative. With over 37,000 individual followers and over 900 organizations follower on Facebook (*Minnesota Grown (Facebook, n.d.)*), the Department can continue to grow its capacity to reach more Minnesotans, grow and strengthen their local markets, and prioritize, target, and serve diverse producers. These initiatives are strengthening the local and regional food systems throughout the state, and the MDA staff are excited to support and collaborate with other state departments to do the same.

#### **Overview of Local Food in Vermont**

Vermont had a population of 623,657 people in 2017 and has the lowest birthrate as well as being the smallest sized state that was interviewed for this research. Based on Census of Agriculture data from 2017, Vermont has 1,833 farms, approximately 27% of farms in Vermont, selling direct to consumers and 737 farms, approximately 11% of farms in Vermont, selling local or regionally branded products to retail markets, institutions, and food hubs. The total sales value in dollars for both direct to consumer and selling to retail markets, institutions, and food hubs for locally branded products in 2017 was \$104,114,000 which was 6.63% of the total state sales. The ratio of sales per capita for sales value sold direct to consumers is \$80.13 (USDA, 2019). Vermont has

112 farmers markets (National Farmers Market Directory, n.d.i.) throughout the state which provides one market for every 5,568 residents.

Vermont has robust local food activities, primarily spearheaded by the Farm to Plate Network. In 2009, the Vermont Legislature designated the Vermont Sustainable Jobs Fund to administer the <u>Farm to Plate Investment Program</u>. This program was initially tasked to strengthen the Vermont food system over 10 years and in 2019 it was reauthorized to continue the activities for additional 10 years (Vermont Agriculture & Food System Strategic Plan, 2021).

# **Defining Local**

In 2020, the Vermont Legislature passed Act 129 (H. 656) to change the definition of "local" and related terms from the original definition adopted in 2007. According to the 2021 Vermont Agriculture & Food System Strategic Plan (p. 201):

"The new definition differentiates food by category and clarifies how various types of food qualify as "local" or "Vermont" food products. The new definition also makes "local" synonymous with "Vermont" with respect to food products, offering opportunities to celebrate Vermont's brand and recognize the value of buying Vermont products. Under the new definition, a person's or company's food is categorized into one of three areas: Raw Agricultural Products, Processed Food, or Unique Food Products. Each category has its own requirements to be considered local, including consideration of ingredients, manufacturing, and company headquarters for processed food items."

# **Vermont Agency of Agriculture Programs & Funding**

The Vermont Agency of Agriculture is primarily funded through USDA block grants and state legislature appropriations. The agency has a total budget of \$51.2 million for fiscal year 2024 (Vermont Legislative Joint Fiscal Office, 2023). The agency has several programs that support the local food system.

Firstly, the Vermont Agency of Agriculture has an outreach and education program that includes support for agritourism and direct-to-consumer sales. Agritourism adds value to the Vermont brand and boosts product sales (*AgriTourism* | *Agency of Agriculture Food and Markets*, n.d.). The Vermont Agency of Agriculture is working to develop spaces in which farmers can engage directly with consumers like farmers markets and farm stands. An online directory of the farmers markets is part of this program (*Farm Stands*, *CSA & Farmers Markets* | *Agency of Agriculture Food and Markets*, n.d.).

The second program that the Vermont Agency of Agriculture implements is the <u>Local Food Purchase Assistance program</u>. This program maintains and improves food and agriculture supply chain resiliency by supporting local, regional, and underserved producers through making direct purchases. This program has a budget of \$500,000 for fiscal year 2024 (Vermont Legislative Joint Fiscal Office, 2023).

The third program offered by the Vermont Agency of Agriculture is the <u>2 + 2 Farm Scholarship program</u>. This program provides scholarships to youth residents of Vermont who wish to pursue a career in the dairy industry. This program has a budget of \$217,222 for the fiscal year 2024 (Vermont Legislative Joint Fiscal Office, 2023).

The Vermont Agency of Agriculture has vast collaborations throughout the state and has a lot of legislative support behind the farm to plate movement. From 2011 to 2020 Vermont's food output expanded from \$7.5 billion to \$11.3 billion. Local food purchases rose from \$114 to \$310 million of the total \$2.2 billion spent on food in Vermont annually. The food system added 6,650 new jobs (VT Farm to Plate, 2017). Vermont has been active in this work for decades, and this commitment is shown in the impact reports and programmatic activities.

#### Farm to Plate in Vermont

The Farm to Plate program is a statewide program that operates independently of the Vermont Agency of Agriculture. This program represents a great example of a collaboration among several statewide stakeholders and their support for local programs. The Farm to Plate program has a budget of \$135,000 in 2024 (Vermont Legislative Joint Fiscal Office, 2023). Farm to Plate has the following goals:

- Increase economic development & jobs in the farm and food sector
- Improve soils, water and resiliency of working landscapes
- Reduce the effects of agriculture on climate change
- Improve access to healthy, local foods



Figure 7 (Home, 2023)

## **Key Programmatic Activities & Successes**

Vermont's Farm to Plate strategic plan is focused on 15 goals to achieve by 2030. Based on the conducted interview, the state legislature has committed to this plan by establishing intended outcomes for the first three goals. These goals are centered around the promotion of local food and accessibility to that food for all. The three goals are (VT Farm to Plate, 2021, p 13):

- 1. Increase sustainable economic development and create jobs in Vermont's food and farm sector.
- 2. Improve soils, water, and resiliency of the working landscape in the face of climate change.

3. Improve access to healthy local foods for all Vermonters.

There is a published annual report showcasing the successes of Farm to Plate activities. A highlight from the 2021 report states (VT Farm to Plate, n.d. p 1):

"Employment data from 2021 shows the food economy is recovering, gaining nearly 1,500 net new jobs, the second-largest annual employment gain in the food system since 2009—though that follows the historic loss of 6,500 net jobs in 2020 that resulted from the pandemic. The peak of the pandemic did not depress local food purchasing in Vermont, as total purchases of local food and beverages in Vermont reached \$371 million. This represents 16.1% of total food purchases in Vermont and is an increase of \$61 million in local food purchases from 2017."

#### **Additional States**

The research team was unable to conduct interviews with additional states but did collect Census of Agriculture and farmers market data on California, Alaska, Florida, Maryland, and South Carolina. The team analyzed the Census of Agriculture data from those states, as the currently agreed upon data points for measuring the existing local food systems are gathered in Census of Agriculture data (noted in the literature review.) Assessing the number of farmers markets in the states provides a measure of the availability of local foods in a community. The research team utilized the National Farmers Market Directory data to get a total number of markets per state and used Census data to calculate a per capita rate of farmers markets. See Appendix 5 for additional Census of Agriculture data.

Table 3: Comparing Local Food Data from the 2017 Census of Agriculture

State	2017 Population	# of Farms	% Selling Direct to Consumers	Total Value for Direct-to- Consumer Sales (\$)	% of State Sales	Ratio of Sales per capita for Sales Value Sold Direct to Consumers (\$)	# of Farmers Markets	Ratio of Farmers Markets to Residents
Alaska	739,795	260	26%	\$4,446,000	6.31%	\$6.01	42	17,614
California	39,536,653	7,623	11%	\$782,028,000	1.73%	\$19.78	847	46,678
Florida	20,948,400	3,440	7%	\$37,179,000	0.97%	\$1.77	303	69,137
Maryland	6,052,177	1,347	11%	\$54,097,000	2.19%	\$8.94	182	33,254
South Carolina	5,042,369	1,522	6%	\$29,987,000	1%	\$5.95	148	34,070

#### Alaska

<u>Alaska Grown</u> is an important and long-standing program aimed at promoting and supporting the agriculture industry in Alaska. The program's vision reflects its commitment to local agriculture and food production and fostering a strong and reliable market for Alaskan farmers. It has been supported by the Alaska Division of Agriculture for over 30 years.

According to the Alaska Grown, the programs vision is threefold:

- "That everyone has access to Alaska Grown food and farm products.
- That all Alaskan Farmers have a reliable market.
- That every person, business, and organization fulfills their role."
   (Buy Alaska Grown Supporting Alaska's Agriculture Industry, n.d.)

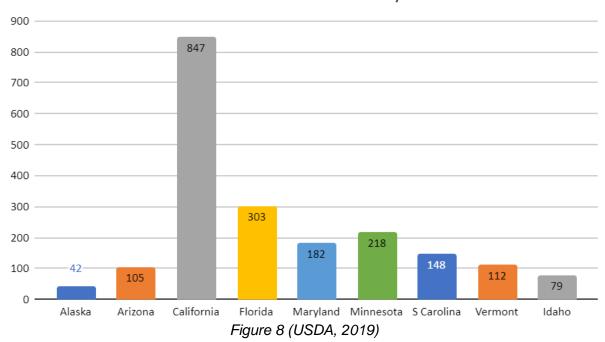
# Maryland

The marketing division of Maryland's Department of Agriculture plays a pivotal role in helping farmers and agricultural producers thrive by identifying and capitalizing on marketing opportunities, accessing federal resources, and providing information on policies and regulations that can impact their businesses. By doing so, the division contributes to the financial well-being of the agricultural community in the state (*Maryland Products/Marketing*, n.d.).

#### **South Carolina**

The South Carolina Department of Agriculture (SCDA) purchases locally produced food and delivers it to disadvantaged communities. This initiative seeks to preserve and enhance the resilience of the food supply chain while also assisting small-scale, regional, and economically marginalized farmers and ranchers. The SCDA uses this federal program to help farmers in South Carolina grow their operations, explore new markets, and establish connections with distributors to strengthen the sustainability of the region's food system (*Local Food Purchase Assistance Program - South Carolina Department of Agriculture*, n.d.).

# Number of Farmers Markets by State



# Number of Farmers Markets per capita (per 1,000 people)

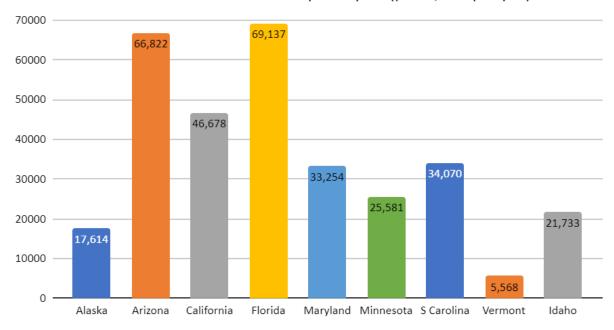


Figure 9 (USDA, 2019)

# **Arizona State Department of Agriculture Insights**



Figure 10 (Homepage | Arizona Department of Agriculture, n.d.)

## **Overview of Local Food in Arizona**

According to AZDA, the state of Arizona is the third highest producer of vegetables in the United States, producing 81 million cartons of produce in 2022 (AZDA, 2023). Ten vegetables make up 87% of Arizona produce production: iceberg, romaine and leaf lettuce, spinach, cantaloupe, broccoli, cauliflower, cabbage, watermelon, and spring mix (AZDA, 2023).

**Table 4: 2017 Census of Agriculture Data for Arizona** 

2017 Population	% Selling Direct to Consumers	Total Value for Direct-to- Consumer and Locally Branded Products Sales (\$)	% of State Sales	Ratio of Sales per capita for Sales Value Sold Direct to Consumers (\$)	# of Farmers Markets	Ratio of Farmers Markets to Residents
7,016,270	4%	\$1,263,709,000	32.12%	\$3.79	105	66,822

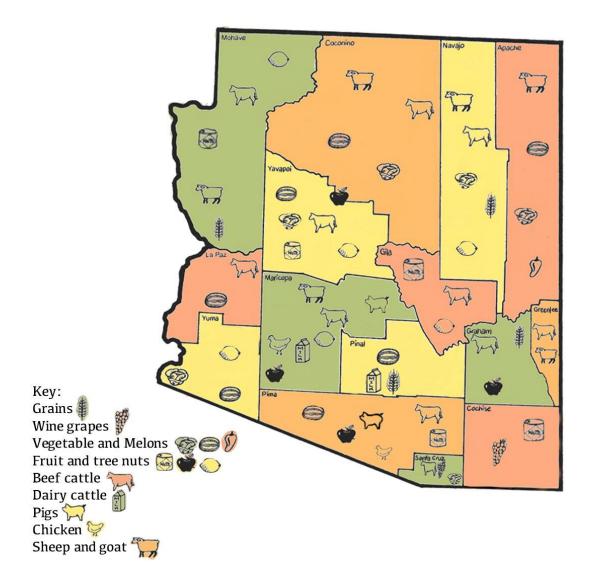


Figure 11 (Graphic created by Alexandra Cordova using data from the University of Arizona Cooperative Extension's Arizona County Agricultural Economy Profiles)

# **Programs & Funding**

AZDA has an approved budget for FY 2023 of \$54,796,800. Almost half of the budget is funded by the General Fund with additional dollars from various appropriated funds including the Air Quality Fund, federal funds, and fees collected from various inspections and services offered (AZDA, 2022).

AZDA implements a wide range of programs including training programs for producers such as pesticide safety training and food safety training (Killian, 2022). AZDA also houses numerous councils and boards that focus on a variety of topics from citrus and lettuce research to grain promotion and employment relations (Killian, 2022). Livestock and animal health are monitored through the animal services division of AZDA. AZDA

oversees numerous licensing and inspection services that span aquaculture, feedlots, meat & poultry processing, dairy and egg production, fresh produce grading and standardization, food safety modernization, country of origin labeling, organic certification, pesticide use, and worker protection (Killian, 2022). AZDA houses agricultural laboratory testing services that include food safety for meat and specialty crops, pet and animal feed, fertilizer, pesticide formulations, seed export requirements, and total THC levels for hemp material (Killian, 2022). The weights and measures division of AZDA ensures a trustworthy marketplace in Arizona by licensing devices that are used to determine cost of commodities, providing price verification inspections, verification of contents of packaged goods, overseeing air and fuel quality, investigate consumer complaints, and provide educational programs (Killian, 2022).

AZDA participates in the Specialty Crop Block Grant Program (SCBGP) as a pass-through entity. The SCBGP "funds projects that enhance the competitiveness of specialty crops in the state and support specialty crop growers through marketing, education, and research" (USDA, 2022). AZDA was awarded \$1,308,495 in FY2022 (Killian, 2022). Specialty crops are not required to be sold intrastate, but program applicants may be focused on Arizona markets. Based on a USDA press release (USDA, 2022), AZDA funded 18 projects in 2022 through the SCBG program. One highlighted project included funding for the International Rescue Committee's New Roots Phoenix Specialty Crop Promotion and Marketing Project which supports "refugee and other underserved specialty crop farmers through a diverse advertisement campaign and improved access to linguistically appropriate marketing resources" (USDA, 2022). Additional funding provided the opportunity to enhance specialty crop competitiveness, expand availability and access to specialty crops, educate consumers, provide continuing education offerings, assist producers in receiving various certifications, and support research and development efforts (USDA, 2022).

According to the AZDA Specialty Crop Guide, they are celebrating 15 years of crop guide publications (AZDA, 2023). The guide provides consumer education content including farmers markets and u-pick farm directories, a seasonal availability calendar, recipes, information about agriculture careers and education, and buy-local opportunities (AZDA, 2023). The current published guide highlights the Arizona Grown® program but there is not a dedicated page or other references to the Arizona Grown® or the specialty crop guide on the AZDA website.

#### Interview Takeaways

The purview of AZDA is vast but there is currently no program focused on supporting, promoting, or strengthening local food system activity in Arizona. Based on interviews, AZDA's Food & Agriculture Policy Advisory Committee (FAPAC) has hosted various

meetings and workshops focused on increasing access to Arizona grown food. Based on available budget information and annual reports, it is unclear if there are budget line items for these specific activities. Interviewees shared that most of the work to host meetings and workshops are done by volunteers and partnering organizations. According to AZDA staff, the first Food Summit was hosted in 2016 and was attended by 75 individuals. The 4th Food Summit was hosted in 2022 at Arizona State University and had 240 attendees. The growth of attendance at the Food Summits can be viewed as a sign of interest in the work of FAPAC and the involvement of AZDA in local food system activities. Due to a recent change in the AZDA Director position, FAPAC is currently being reconstructed.

A recently signed cooperative agreement with the USDA-AMS provides AZDA with funding for addressing local food systems through the Resilient Food System Infrastructure (RFSI) program. Based on interviews conducted, the proposal for use of funds was submitted to USDA in August 2023 and AZDA is waiting for final approval. If the proposal is approved, AZDA will be partnering with Pinnacle Prevention (a stakeholder interviewed for this project) to address activities related to the middle of the supply chain. AZDA will also pursue the hiring of a coordinator for these efforts and to administer portions of the RFSI funding. At the time of publication, there is no additional information available on the AZDA website.

# **Discussion**

State Departments of Agriculture have a variety of opportunities to support and strengthen local food systems, as shown in the interviews, literature review, and data analysis conducted in this report.

While the definition of "local" varies across locales, there are overarching themes found in the definitions of local. Oftentimes, local means produced within the state, but this was not a limiting factor as some definitions include a geographical region that surpasses state boundaries. In the case of Arizona, there has been no definition formalized through legislative action. Through interviews and research, it is clear that "local" can encompass different things in different communities throughout the state. Instead of defining "local" for the state, the Arizona Department of Agriculture can be thoughtful about border relations so that New Mexico grown, tribal lands, and farms beyond the US-Mexico border can all be considered local. Taking into consideration the values of the borderland and tribal communities will be key to any successful "eat local" campaign conducted at a state level.

Various programs offered by state departments of agriculture were frequently cited in literature and in the interview findings. Local food promotion programs, such as Arizona Grown® or Idaho Preferred, are a popular way for a state to actively participate in marketing local food consumed by local people. All states have some type of active marketing program that is focused on buying local food or promoting farmers markets within the state. Out of the three states interviewed, all states have budgets and staffing for this program that exceeds that of AZDA given that there is no line item in the AZDA budget for these activities. For Fiscal Year 2024, Minnesota will spend 2.7% of their budget on the Minnesota Grown program. Vermont appropriates less than 1% of their budget on farm to plate programs. More research is needed to understand how much money Arizona is appropriating for the Arizona Grown® program. However, if Arizona was to spend 2.7% of AZDA's on local food promotion programs, it would be amount to \$1.5 million.

The currently agreed upon data points for measuring the existing local food systems of a state are dependent upon USDA Census of Agriculture data collected every five years. While this can provide insights into the shifts within a local food system, the timeline may not provide governmental agencies or stakeholders with metrics for measuring their programmatic impact. Comparing one state to another through Census data can provide some insights into the robustness of a local food system but doesn't analyze the whole landscape. Comparing Arizona with data gathered from eight other states, Arizona has the lowest number of farms selling direct to consumers at 4.3%. In

comparison, Alaska and Vermont have over 26% of farms selling direct to consumers which is over 6.4% of the total state farm sales, with Maryland and California having over 10% of farms selling direct to consumers which is over 2.2% of their total state farm sales.

Minnesota has a similar number to Arizona for direct sales at just over five percent, but it has substantially more farms-- 3,533 farms in Minnesota as compared to 826 in Arizona. While California has only 10% of farmers selling direct to consumers, the sales value is over \$780 million, compared to Maryland, which also has 10% selling direct to consumers, but the sales value is just under \$55 million. These stark differences show that deeper analysis is necessary to compare and contrast Census data between states to make a claim about the strength, scale or robustness of a local food system. However, using Census data to measure shifts within local food systems at the state level can be a way for a state department of agriculture to assess various programmatic goals, if coupled with additional data collection methods including participant surveys.

## Ratio of Sales per capita of Farmers Selling Direct to Consumers

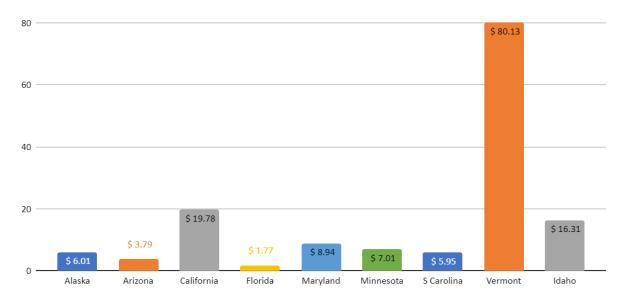
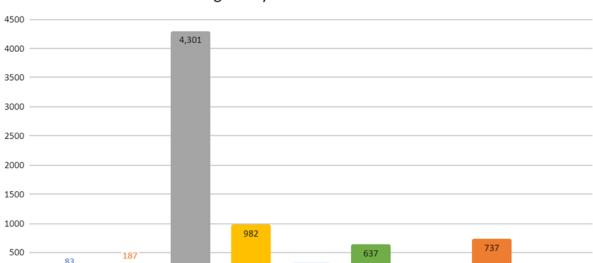


Figure 12 (USDA, 2019)

281

Idaho



Number of Farms Selling to Retail Markets, Institutions & Food Hubs for Local or Regionally-Branded Products

Figure 13 (USDA, 2019)

Florida

0

Alaska

Arizona

California

319

Maryland

287

S Carolina

Vermont

Minnesota

Collaborations at the state and local level were mentioned throughout the literature review and in both stakeholder and state department interviews. Collaborations occur in various ways, including formalized cooperative agreements, often part of accessing federal funding programs like the Local Food Purchase Agreement, as well as informal collaborations such as hosting statewide events or organizing policy councils. Informal collaborations can be hard to measure quantitatively but continuing to assess the outcomes through qualitative measurements can be a way to ensure that collaborative efforts are continuing to strengthen local food systems. The formalized cooperative agreements often include outcome metrics within the grant reporting itself, and those outcomes can be used to showcase the successes of the collaboration. At this time, AZDA is not a formalized collaborator with a Farm to School program, the Arizona Department of Education oversees the program. It's important to point out that across the country, there are 27 state departments of agriculture that have active Farm to School programs. As well, broader collaborations, like the Vermont Farm to Fork program, involve a variety of stakeholders including economic development offices, universities and colleges, and for-profit businesses. Collaborations such as this exist within Arizona, as showcased in the Arizona food system reports published within the last ten years. Examples of these collaborations are the Pima County Food Alliance, the Arizona Food Systems Network, and the Arizona Farm to School Network.

There are a few key limitations to this research project that should be addressed. One limitation is the lack of tribal representation in the Arizona stakeholder interview section.

Attempts to include tribal representation were made, but scheduling conflicts limited the research team's ability to include adequate representation. Another limitation was the number of state departments of agriculture interviewed. The research team attempted to schedule nine interviews but were unsuccessful with outreach. The team utilized quantitative data gathered from the Census of Agriculture, as well as reviewing every state department of agriculture's website.

A final limitation is the counting of farmers markets within each state. This is not part of the Census of Agriculture data, but researchers used the National Farmers Market Directory to provide state level numbers. This information may not be accurate as farmers markets change from season to season, and it is unclear how the counts are gathered by the directory. As mentioned previously, there are three different counts for Arizona. While these limitations are important considerations, the research team believes that the recommendations made in the following section would be similar if the above limitations were addressed.

# Conclusion

The Arizona Department of Agriculture is a statewide and state funded department that provides substantial services to farmers and food businesses across Arizona. While there have been efforts to strengthen and support the local food system in Arizona, the research team proposes that additional programmatic activity within AZDA can further support a robust local food system.

# Recommendation #1: Pursue legislative action to expand department purview

The current purview of the Arizona State Department of Agriculture is a regulatory entity, providing key oversight to protect public, livestock and crop health and safety, ensure standardized inspections, tests, and licensing to weighing and measuring devices as well as pest control companies and pesticide applicators (Arizona State Department of Agriculture, n.d.). While these are necessary functions of the department, the research team recommends seeking an expansion of the statutes to include marketing activities and to charter the existing Food Access Policy Advisory Council.

The Agricultural Consultation & Training Division of AZDA currently houses the Resilient Food System Infrastructure (RFSI) Program and the Specialty Crop Block Grant Program (SCBGP). This division published the Arizona Specialty Crop Guide which features farmers markets, u-pick farms, local harvest schedules and more. While the Arizona Grown® website lists AZDA in the "contact us" section, there was no visible link from the AZDA website. The AZDA annual report published in 2022 did not include any information on the Arizona Grown® program. The research team was unable to find information about the scope, budget, or statutes regarding the Arizona Grown® program. Given the success of these local food marketing and promotion programs in various states, the research team recommends expanding this division to include the Arizona Grown® program. The research team expands on the Arizona Grown® program activities in recommendation #3, however, that recommendation may require a statutory change to formalize the activities and funding of the program itself.

In Title 3, Chapter 9 of the Arizona Administrative Code, there are ten chartered agricultural councils and commissions (Arizona Legislature, n.d.). The research team recommends seeking legislative action to add an additional article to this chapter to officially charter the activities of the Food Access Policy Advisory Council.

# Recommendation #2: Increase budget, data analysis and staff capacity

The current budget for AZDA does not include specific budgetary lines for the Arizona Grown® program, the Food Access Policy Advisory Council (FAPAC), or any other potential program that relates directly to local food system activities. The research team highly recommends that AZDA seek additional funding through the legislative appropriations process to ensure the inclusion of local food promotion programming, staff facilitation of FAPAC, and related events such as the Arizona Food Summit. It is also recommended that additional funding permit AZDA staff to continue to pursue stakeholder collaboration at the minimum of the current level or at a higher level. The research team commends the salary increases that were approved in the FY2023 budget and recommend ensuring that staff salaries are competitive and livable, based on the cost of living in Arizona at the time of budgeting. Staff should be trained and equipped to prioritize data collection that shows the program's economic impact on the local food system.

Stakeholders interviewed showed interest in supporting legislative action to expand the purview and funding of AZDA. The research team recommends communicating with these stakeholder groups to devise an advocacy strategy to ensure the legislature moves forward with the first and second recommendations.

# Recommendation #3: Enhance Arizona Grown® programmatic activities

As noted in recommendation #1, the Arizona Grown® activities are not visible on the current AZDA website. However, the Arizona Grown® program has an opportunity to lead local food promotional efforts across the state, including a more formalized "eat local" campaign to increase consumer awareness of locally grown food and relevant access points. Taking cues from Idaho, Minnesota, and Vermont, the Arizona Grown® program can expand visibility by attending and hosting various events throughout the state, including chef and retail buyer farm tours, establishing a celebratory day, week or month to promote the Arizona Grown® offerings, attend farmers' markets and host tasting events at retail locations, as well as increasing social media activity to reach a broader audience. The current Arizona Grown® Facebook page has over 5,000 followers but the most recent post was made in July of 2022. The research team recommends dedicating staff time to enhancing the social media presence, including adding additional platforms to reach different demographics, including X (formerly known as Twitter), Instagram and TikTok.

# Recommendation #4: Expand collaborative efforts

Existing collaborations including the Arizona Food Summits, training programs, AFB and FFA engagement, and attendance at the Arizona Food Systems Network meetings were all acknowledged and appreciated by interviewees. These efforts should continue and have the potential to be enhanced by formalizing involvement in the Arizona Food Systems Network, pursuing formalized cooperation, if not leadership, in the state's farm to school program and with the support of the Arizona Farm to School Network, and engaging FFA in seeking opportunities to support their educator training offerings.

An example of a recent collaboration is the co-hosting of the 2022 Arizona Food Summit by ASU and AZDA. The research team recommends enhancing the collaboration between AZDA and universities across the state. Inviting the University of Arizona, Northern Arizona University, Arizona State University, and Tribal Colleges and Universities to have representation on the Food Access Policy Advisory Council is another opportunity to enhance collaborations with the various universities in Arizona that are actively working in agriculture and educating the next generation of food system leaders.

#### Final Considerations:

The research team is aware that a recent change in leadership has taken place at AZDA with the appointment of Paul Brierley to the position of Director by Governor Katie Hobbs. This transition occurred in late June 2023. Therefore, the research team believes these recommendations come at an appropriate time where new leadership can continue to ensure AZDA's role in the local food system efforts taking place across the state. While the recommendations may not be immediate solutions, the research team hopes this report provides key insights and strategies that can be implemented in a thoughtful manner on an appropriate timeline.

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# **Appendix**

# **Appendix 1: AZ Stakeholder Key Takeaways**

Interview Number	Important Takeaways	Key Theme
1	<ul> <li>Many small growers cannot easily access or qualify for AZDA resources.</li> <li>There is a need for training on available local infrastructure and supply chain funding.</li> <li>AZDA could build relationships with alternative groups that provide food including food hubs and cooperatives.</li> <li>There is a need for an "echo" around the state that farmers/farmland matters. As a state, we need to create a sense of place around local foods and farms.</li> </ul>	Increase Staff Capacity  Lean in to Collaboration  Partner for Youth & Educational Offerings
2	<ul> <li>With more funding, the Arizona Grown® program could continue to be a valuable resource for local food promotion.</li> <li>There is a strong desire among small growers and urban farmers to build relationships with AZDA staff in order to promote equitable resource distribution.</li> <li>Land, Water and Labor are a top priority for many of those stakeholders involved in agriculture. Residents want to see that reflected in AZDA's priorities.</li> </ul>	Enhance Arizona Grown® Partner for Youth & Educational Offerings

3	<ul> <li>Some smaller organizations are not able to access USDA funding due to matching requirements. Some stakeholders see this as an opportunity for AZDA to support local food.</li> <li>There is a need for tailored technical assistance and support for farmers and institutions looking to purchase local food.</li> <li>AZDA could increase staff capacity to support smaller growers.</li> <li>AZDA could have a larger impact on food policy.</li> </ul>	Increase Staff Capacity Lean in to Collaboration
4	<ul> <li>Arizona Grown® could be reinvigorated.</li> <li>There is a need for smaller farmers and growers to access AZDA resources.</li> <li>Several statewide food systems organizations are doing good work and would love the opportunity to collaborate with the state.</li> <li>AZDA needs increased funding for programs and to continue to hire passionate people.</li> </ul>	Enhance Arizona Grown®  Increase Staff Capacity  Lean in to Collaboration
5	<ul> <li>State agencies could have a warmer presence in the local food system.</li> <li>Many farmers around the state are growing food using regenerative, sustainable and holistic practices. This could be reflected in state agricultural policy priorities.</li> <li>Smaller producers need unique opportunities to access credit for their farms. For example, local banking systems can be encouraged to consider the long term impact that investment in agricultural infrastructure and capital can make (and creating a shorter supply chain) can create long term.</li> </ul>	Increase Staff Capacity  Lean in to Collaboration Increase Staff Capacity  Lean in to Collaboration

6	<ul> <li>More training is needed for small growers trying to sell to institutions and restaurants.</li> <li>The Arizona Grown® program could be revitalized as the state's local food promotion campaign.</li> <li>AZDA used to host the well-loved Food Summit. Having AZDA represented as a leader for these summits brings a strong presence from a state agency in the local food system.</li> </ul>	Enhance Arizona Grown®  Lean in to Collaboration  Partner for Youth & Educational Offerings
7	<ul> <li>AZDA is well known for providing fantastic food safety trainings.</li> <li>Many local food organizations are doing work that qualifies for federal grant funding. However, there are few organizations in Arizona that have capacity to host statewide local food grants.</li> <li>AZDA needs increased funding and staff capacity to provide statewide marketing programs for local food.</li> </ul>	Enhance Arizona Grown®  Increase Staff Capacity  Lean in to Collaboration
8	<ul> <li>Local food promotion mostly happens through smaller organizations. A statewide local food marketing campaign would be beneficial</li> <li>Specialty crop block grants have supported many farmers across the state. However, capacity is a limiting factor for non-academic entities across the state.</li> <li>Many growers would benefit from increased funding for specialty crop block grants and other federal money.</li> <li>Increased funding and staff capacity at AZDA would benefit the local food system.</li> <li>There is a need for advocacy at the state level for officials to prioritize food producers, supply chain infrastructure and local food promotion.</li> </ul>	Enhance Arizona Grown® Increase Staff Capacity

9	<ul> <li>There is a need for AZDA to build relationships with smaller growers.</li> <li>AZDA could partner with local food system stakeholders to implement statewide local food marketing campaigns.</li> <li>Smaller farmers need better access to training and funding opportunities offered by AZDA.</li> </ul>	Enhance Arizona Grown®  Increase Staff Capacity  Lean in to Collaboration
10	<ul> <li>Arizona Grown® is used as a resource in classrooms.</li> <li>More youth are interested in agriculture than there are available educators.</li> <li>More collaboration with AZDA would be valued - attending career fairs, supporting creation of an educator externship program, etc.</li> </ul>	Lean in to Collaboration  Partner for Youth & Educational Offerings

# **Appendix 2: AZ Stakeholder Interview Coding**

Phrases:	Total # of times the phrase appeared:	# of Interviews the phrase appeared in:
land access	8	3
capital	5	3
farmers market	13	10
marketing (promotion)	64	10
supply chain	14	5
processing	18	5
funding	66	9
economic	18	7
aggregation	5	3
student	14	3
youth	5	2
education	27	9
food access	64	7

# **Appendix 3: State Department of Agriculture Program Spreadsheet**

9	Farm to School	Buy local Food	
	Program	or Farmer's	
_	Department of	Market	State Department of Agriculture
State	Agriculture	program	Website
	Farm to School	Buy Local	https://agi.alabama.gov/
Alaska	Farm to School	Buy Local	http://dnr.alaska.gov/ag/
Arizona		Buy Local	https://agriculture.az.gov/
Arkansas	Farm to School	Buy Local	https://www.agriculture.arkansas.gov/
California	Farm to School	Farm to Fork	https://www.cdfa.ca.gov/
Colorado		Buy Local	https://www.colorado.gov/agmain
Connecticut		Buy Local	https://portal.ct.gov/DOAG
Delaware	Farm to School	Buy Local	https://agriculture.delaware.gov/
Florida	Food to School	Buy Local	https://www.fdacs.gov/
Georgia		Local Food	http://agr.georgia.gov/
			https://www.nasda.org/state-
			department/hawaii-department-of-
Hawaii	Farm to School	Buy Local	agriculture/
Idaho		Buy Local	https://agri.idaho.gov/main/
Illinois		Buy Local	https://agr.illinois.gov/
Indiana		Buy Local	https://www.in.gov/isda/contact-us/
lowa	Farm to School	Buy Local	https://iowaagriculture.gov/
Kansas	Farm to School	Buy Local	https://agriculture.ks.gov/
Kentucky	Farm to School	Buy Local	https://www.kyagr.com/
Louisiana		Buy Local	https://www.ldaf.state.la.us/forestry/
Maine		Buy Local	https://www.maine.gov/dacf/
			https://mda.maryland.gov/Pages/default
Maryland	Farm to School	Buy Local	<u>.aspx</u>
			https://www.mass.gov/orgs/massachus
			etts-department-of-agricultural-
Massachusetts	Farm to School	Buy Local	resources
Michigan		Buy Local	https://www.michigan.gov/mdard/
Minnesota		Buy Local	https://www.mda.state.mn.us/
Mississippi	Farm to School	Buy Local	https://www.mdac.ms.gov/
Missouri	Farm to School	Buy Local	https://agriculture.mo.gov/

Montana	Farm to School	Buy Local	https://agr.mt.gov/
Nebraska		<b>Buy Local</b>	https://nda.nebraska.gov/
Nevada	Farm to School	Buy Local	http://agri.nv.gov/
New Hampshire		Buy Local	https://www.agriculture.nh.gov/
New Jersey	Farm to School	Buy Local	https://www.nj.gov/agriculture/
New Mexico		Buy Local	https://nmdeptag.nmsu.edu/index.html
New York	Farm to School	Buy Local	https://agriculture.ny.gov/
North Carolina		Buy Local	NCDA
North Dakota	Farm to School	Buy Local	https://www.ndda.nd.gov/
Ohio		Buy Local	https://agri.ohio.gov/home
Oklahoma	Farm to School	Buy Local	https://ag.ok.gov/
			https://www.oregon.gov/ODA/Pages/de
Oregon	Farm to School	Buy Local	<u>fault.aspx</u>
			PA Dept. of
			Agriculturehttps://www.agriculture.pa.g
Pennsylvania	Farm to School	Buy Local	<u>OV</u>
Rhode Island		Buy Local	https://dem.ri.gov/
South Carolina		Buy Local	SCDA
South Dakota		Buy Local	https://danr.sd.gov/
Tennessee		Buy local	https://www.tn.gov/agriculture.html
Texas	Farm to School	Buy Local	https://www.texasagriculture.gov/
Utah	Farm to School	Buy local	https://ag.utah.gov/
Vermont		Farm to Plate	https://agriculture.vermont.gov/
Virginia	Farm to School	Buy local	https://www.vdacs.virginia.gov/
Washington	Farm to School	Buy Local	https://agr.wa.gov/
West Virginia	Farm to School	Buy Local	https://agriculture.wv.gov/
			https://datcp.wi.gov/Pages/Homepage.
Wisconsin		Buy Local	aspx
Wyoming		Buy local	https://wyagric.state.wy.us/

# **Appendix 4: Farm to School Month Declaration**

GOVERNOR DOUGLAS A. DUCEY

# STATE OF ARIZONA COMMENDATION

WHEREAS, Arizona benefits from year-round agricultural production so that Arizona's agribusiness system contributes directly and indirectly, via the multiplier effect, approximately \$23.3 billion in sales; and

WHEREAS, some Arizona counties rank in the top one percent of all United States counties in measures of crop and livestock production; and

WHEREAS, Arizona ranks among leading states in the production of lettuce, spinach, broccoli, cantaloupe, honeydew melons, durum wheat and other commodities; and

WHEREAS, the clear majority of Arizona farms are family-run operations and partnerships and account for the bulk of farm sales; and

WHEREAS, 885 schools with 573,065 students participate in a Farm to School Program; and

WHEREAS, the Farm to School Program is growing strong in Arizona and participation has tripled in the last three years since data collection began 10 years ago; and

WHEREAS, Farm to School strengthens and sustains Arizona agriculture through procurement of Arizona grown food for cafeteria meals and classroom snacks, student education about agriculture, food, health, and nutrition, and school gardens where students participate in experiential learning.

NOW, THEREFORE, I, Douglas A. Ducey, Governor of the State of Arizona, do hereby recognize October 2022 as

#### **FARM TO SCHOOL MONTH**

and encourage all Arizonans to celebrate the important connection between Arizona agricultural producers and Arizona schools.

IN WITNESS WHEREOF, I have hereunto set my hand and caused to be affixed the Great Seal of the State of Arizona

GOVERNOR

DONE at the Capitol in Phoenix on this thirteenth day of October in the year Two Thousand and Twenty-Two and of the Independence of the United States of America the Two Hundred and Forty-Seventh.

ATTES

SECRETARY OF STATE

# **Appendix 5: USDA Census of Agriculture Data**

State	2017 Census Data - # of farms selling direct to consumers	% of farm to State total of farms	% to US Total
Alaska	260	26.3%	0.2%
Arizona	826	4.3%	0.6%
California	7,623	10.8%	5.9%
Florida	3,440	7.2%	2.6%
Idaho	1,765	7.1%	1.4%
Maryland	1,347	10.8%	1.0%
Minnesota	3,533	5.1%	2.7%
S Carolina	1,522	6.1%	1.2%
Vermont	1,833	26.9%	1.4%
Total US Farms in these			
categories	130,056		6.37%

State	2017 Census Data - # of farms selling to retail markets, institutions & food hubs for local or regionally branded products	% of farm to State total of farms	% to US Total
Alaska	83	8.38%	0.29%
Arizona	187	0.98%	0.65%
California	4,301	6.10%	14.85%
Florida	982	2.06%	3.39%
Idaho	281	1.12%	0.97%
Maryland	319	2.57%	1.10%
Minnesota	637	0.93%	2.20%
S Carolina	287	1.16%	0.99%
Vermont	737	10.83%	2.55%
Total US			
Farms in			
these			
categories	28,958		1.42%

			Ratio = # of residents per one farm selling directly	Sales per capita of farmer sales directly to
State	Population 2017	% to US Total	to consumers	consumers
Alaska	739,795	0.23%	2,845.37	\$ 6.01
Arizona	7,016,270	2.16%	8,494.27	\$ 3.79
California	39,536,653	12.16%	5,186.50	\$ 19.78
Florida	20,948,400	6.44%	6,089.65	\$ 1.77
Idaho	1,716,943	0.53%	972.77	\$ 16.31
Maryland	6,052,177	1.86%	4,493.08	\$ 8.94
Minnesota	5,576,606	1.72%	1,578.43	\$ 7.01
S Carolina	5,042,369	1.55%	3,312.99	\$ 5.95
Vermont	623,657	0.19	340.24	\$ 80.13
Total US Farms in these categories	325,100,000		2,499.69	

# **About the Authors**

## **Amy Mattias**

Amy Mattias is the Executive Director of the Sun Valley Institute of Resilience. In her tenure with SVIR, her team launched the Impact Idaho Fund, published three annual Locally Grown Guides, hosted a plethora of educational and engagement events, and helped build relationships between numerous food producers and interested buyers. Amy was the lead author of their 2050 Food Vision. Her commitment to regional food systems and regenerative agriculture is highlighted by her volunteerism with various organizations including board secretary for the Idaho Center for Sustainable Agriculture, board chair for FARE Idaho's Farm and Agriculture Committee, and executive committee member for the Upper Big Wood River Grange. Amy received a BA in Sociology from Western Michigan University in 2012 in addition to a Certificate in Regenerative Agriculture and Resilient Systems from California State University in 2022. She is an avid gardener, seed keeper, chicken tender, food preservationist, and advocate for localized food and fiber systems.

## **Copeland Vidal**

Copeland has great appreciation and passion for the soil and its relationship to sustainable food production. He received training as an Agronomist from the University of The West Indies in Trinidad and Tobago and Jamaica, majoring in Plant Production and Protection and Soil Science. Copeland has been engaged in agricultural activities for over thirty years. He has worked with various stakeholders in the agriculture sector in Jamaica, developing and managing farms, and other environmental related projects. He worked with farmers, environmental groups, community leaders and has taught agricultural science for four years. Copeland enjoys conversing and learning about plants and the environment. He has been a 4-H leader for many years. He is also a volunteer for the Great Kids Farm/Baltimore City Public Schools where he informs students about healthy eating habits, the importance of the natural sciences, and sustainable agricultural practices.

# **Kaley Necessary**

Kaley graduated from Indiana Wesleyan University in 2014 with a degree in Biology and International Community Development. Since then, she has advocated for strong local food systems by supporting agriculture that increases access to fresh produce in low-resource communities. Kaley has eight years of experience managing market farms, growing vegetables in Texas, Indiana, Illinois, and Arizona. She also has experience teaching sustainable tropical agriculture practices to students and community leaders in Puerto Rico, Dominican Republic, Nicaragua, and Guatemala. She is currently a Program Coordinator at the University of Arizona Maricopa County Cooperative

Extension in the SNAP-Ed program, working closely with school and community gardens and small growers. Her specific agricultural interests include innovative post-harvest techniques, local food procurement, and season extension. Kaley also serves as the Director of Extension for Harvest Craft, a nonprofit that supports environmental stewardship and social justice by supporting agricultural development work in Haiti.

#### **Keith Arnold**

Keith attended California State Polytechnic University-Pomona where he received a BS in Food Science and Technology in 2012. Keith's work experience includes 5+ years in retail and 9+ years in food manufacturing in quality assurance and at one point served as a plant manager. He then transitioned to the Air Force Reserve with an interest in financial planning. He hopes to become a Director in Quality Assurance (QA) or once again become a plant manager. Recently, Keith moved from Northern California to North Carolina where he is continuing his studies in the MS Sustainable Food Systems program as well as looking to become commissioned in the Reserves or Air National Guard.

#### **Mauricio Cordova Flores**

Mauricio had over 25 years of operational leadership in the non-profit and for-profit sectors prior to becoming the Chief Operating Officer of Episcopal Community Services of San Francisco in 2023. In his immediate past role as the Chief Operating Officer at Loaves and Fishes Family Kitchen in San Jose, Mauricio was responsible for operations, facilities, budgeting, contracts, and meal programs that distribute over 1.8 million prepared meals to the community in the South Bay. Mauricio holds a BS in Business Administration from California State University - East Bay, and certificates in Nonprofit Organizational Management from the University of the Pacific.





# Contact for more information:

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Swette Center for Sustainable Food Systems is a unit of ASU School of Sustainability