

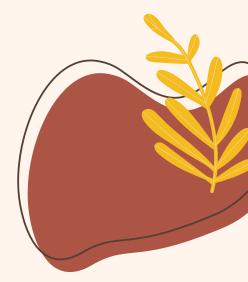
Addressing Food Insecurity

with School Gardens

Presented by Brandon Merchant

School Garden Education Coordinator

START



Brandon Merchant 📈





Born and Raised in Arizona

- Southwest Victory Gardens
- LifeLab Certified Garden Educator
- Pima County Master Gardener
- Native Seeds/SEARCH Board

Member





ARIZONA

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How We Help

We focus on three key areas to end hunger and poverty:







HEALTH & FOOD

Access to nutritious food to live a healthy life is a basic human right.

EDUCATION

We provide opportunities for people to come together, learn, and build better communities.

COMMUNITY DEVELOPMENT

We can build a sustainable future by investing in small farms and local food systems.













Our Programs

- Emergency food assistance
- Grab & go meals
- Senior meals
- Culinary training
- Child nutrition programs
- Farm and garden programs
- Health and nutrition
 programs
- Local food programs





Culinary Training

Caridad Community Kitchen's 10-week culinary training program provides opportunities for motivated individuals with barriers to employment to learn new skills, gain confidence, and build a new career in the food industry.







Nutrition Education

We're always finding ways to fit nutrition education into our food distributions, from cooking demonstrations at school pantries to sharing healthy recipe cards and other resources in our emergency food boxes. Our team has also developed a nutrition policy and regularly evaluates the nutrition profile of the food we distribute.





FEEDING[®] AMERICA

Garden Workshops



Our Nuestra Tierra Learning Garden and Las Milpitas Community Farm offer free garden workshops where participants can learn everything from garden basics, soil and compost, and water conservation to keeping backyard chickens and food justice.





Nuestra Tierra Learning Garden

MMUNITY FOOD BANK

OF SOUTHERN ARIZONA

Nuestra Tierra Learning Garden is an educational oasis located at our main branch in Tucson. The garden features vegetable and herb gardens, a greenhouse, a chicken coop, and worm and compost demonstrations, and serves as a demonstration garden for organic desert food production and rainwater harvesting.





FEEDING

Las Milpitas Community Farm 2405 S. Cottonwood Lane • Tucson, AZ 85713

Las Milpitas de Cottonwood is a six-acre community farm located on the banks of the Santa Cruz River in Tucson. We provide materials, education, and support for local residents to grow food for themselves, making healthy, homegrown food more accessible to lowincome families.







Santa Cruz River Farmers' Market

Located in the Mercado MSA Annex (267 S. Avenida del Convento), our weekly, year-round market features:

- Fresh fruits and vegetables grown locally in Southern Arizona without chemical pesticides
- Double-Up SNAP food stamp matching program
- Cooking demonstrations and food samples
- Culturally relevant foods not available in grocery stores
- Community spaces to engage with growers and neighbors







Abundant Harvest Cooperative



Abundant Harvest Cooperative is a network of backyard gardeners and small farmers who sell produce at our weekly farmers' markets. The Cooperative provides:

- Economic opportunities for small-scale food producers
- Fresh produce accessible to lowincome customers
- Welcoming spaces for cooperative members to come together, share knowledge and resources, and build community around local food





Farm to Institution

Our Farm to Institution initiative connects local farmers to large institutional buyers like hospitals and schools. Access to these larger markets provides economic security for local growers, increases the region's supply of healthy, local food, and keeps resources right here in our local community.



We work with **70 local farmers & small-scale growers** to get fresh local produce to schools and institutions.





Farm to Child Program



Over 12,000 students (83%) in SUSD qualify for the free or reduced priced school lunch program.

Our Farm to Child program supports educational garden spaces in the Sunnyside Unified School District. Learning in the garden helps kids understand the role of food in their lives and appreciate the connections between classroom lessons and hands-on knowledge.

























DREXEL

ELEMENTARY SCHOOL



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FARM CHILD PROGRAM

Comprehensive Support for Garden Programs

Grow With	Us: Resc	ources, Pl	annina. I	Materials*

Fostering College, Career, & Community Readiness Through School Gardens

Free Seeds & Plants

Garden Planning & Design

Low-Cost Garden Materials

Sub-Irrigated Planters

Drip Irrigation Systems

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Tools, Gloves, & Equipment

Aquaponics System Design

Common Core & NGSS in the Garden Classroom Common Funding for School Garden Programs Curriculum

Sustainable & Innovative Garden Education

Indoor & Outdoor Composting Systems

- Insect & Wildlife Habitat Gardens
- Low Water Use Gardening Methods
- Native & Desert Adapted Plants
- Permaculture & Organic Gardening Methods
- Self-Watering Containers
- Worm Composting Bins

START YOUR SCHOOL GARDEN-Contact: schoolgardens@communityfoodbank.org

*Please Note: Our school garden program has limited resources and may not be able to fulfil all requests. We prioritize requests based on need and availability of resources. Schools that are Title 1 eligible and located in high priority areas designated by the Community Food Bank will be given preference. Please contact us with questions or for more information.

Benefits of School Gardens

Holistic Education

 School gardens offer hands-on learning experiences that enhance academic performance across subjects like science, nutrition, and environmental studies, fostering a well-rounded education.

Health and Wellness

 Gardens promote healthy eating habits, reduce childhood obesity rates, and improve emotional wellbeing, contributing to overall student health and wellness.

Life Skills Development

 Engaging in gardening activities teaches valuable life skills such as responsibility, teamwork, problemsolving, and patience, preparing students for personal and professional success.

Community Engagement

 School gardens encourage community involvement, environmental awareness, and sustainable practices, fostering a sense of environmental stewardship and equity within communities.



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Our Impact

SCHOOL HEALTH

RESEARCH ARTICLE

Evaluation of the Impact of School Garden Exposure on Youth Outlook and Behaviors toward Vegetables in Southern Arizona

ABBY M. LOHR, MPH^a 😰 Nick Henry, BA^b Denise Roe, DrPH, MS^c Claudio Rodriguez, AAS^d Rosalva Romero, BA^e Maia Ingram, MPH^f

The objective was to evaluate the effect of garden-based learning on outlook and behaviors toward vegetables among primarily Latinx students.

Students in schools with more garden exposure were more likely to answer "Yes" to survey questions reflecting a positive attitude and behaviors toward vegetables.

The length of exposure to a school garden appears to have a positive impact on both perceptions of and desire to consume vegetables.



Findings

Result 1

Third- and fourth-grade students who were exposed to a school garden for more than 3 years had a more positive outlook and behaviors toward vegetables than third- and fourth-grade students who were exposed to a school garden for <3 years.

Result 2

School garden exposure did appear to be related to students' preference in vegetables. Class discussion results demonstrating that students are more likely to list the vegetables grown in the school garden as their favorite vegetables suggest that exposure has an impact on positive outlook and behaviors.

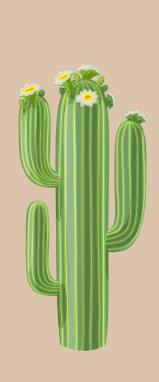
































Food Bank Farm Programs

Oregon Food Bank

 <u>Seed to Suppe</u>r was co-created by the Oregon Food Bank and OSU Extension. For many years, Oregon Food Bank oversaw administration, and OSU Master Gardeners served as program educators. Today, the program is entirely run and administered as an OSU Extension project.

Chicago Food Depository

• <u>Growing Home</u> urban farm supplies households in need with fresh, locally-grown produce. The Englewood-based, organic farm makes weekly deliveries of nutritious greens to the nearby food pantry at The Salvation Army Red Shield Center. Guests are able to pick from a selection of crops that were grown and harvested just blocks away,

Food Bank of Delaware

 The five-acre <u>Food Bank Farm</u> consists of a propagation house, four high tunnels, a demonstration garden, bee hives, fruit trees, and field growing space for annual crops. The farm is made possible thanks to ongoing financial support from Corteva Agriscience. It is maintained by three fulltime employees, seasonal farm interns, and volunteers from the community

Second Harvest Food Bank

<u>Harvest Solutions Farm</u>, located on 45 acres in Irvine, was started in August 2021. The Farm is a partnership between Second Harvest, University of California South Coast Research & Extension Center and Solutions for Urban Agriculture. The Farm provides 50,000-60,000 pounds of fresh produce every, week for those in need in Orange County.



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FB School Garden Programs

Food Bank for NYC

 <u>CookShop Classroom</u> uses hands-on exploration, cooking and physical activities to foster children's enjoyment and consumption of healthy food, and their appreciation for good nutrition and living an active lifestyle. CookShop Classroom reaches students in more than 2,200 public elementary schools and after-school classes throughout the five boroughs.

Josephine County Food Bank

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In 2022, through the support of AllCare Community Health, Oregon State University, and the <u>Oregon Farm to Child Nutrition Program</u>, JCFB launched launch a school garden renovation program aimed at keeping children in touch with their food and merging the garden and the classroom.

Thurston County Food Bank

• The <u>TCFB School Gardens Program</u> offers garden education and greater food access to students in the North Thurston, Tumwater and Olympia School Districts. The program provides student access to nutritionally-dense food, educates students on food systems and nutrition, and provides structural support to our community's school gardens.

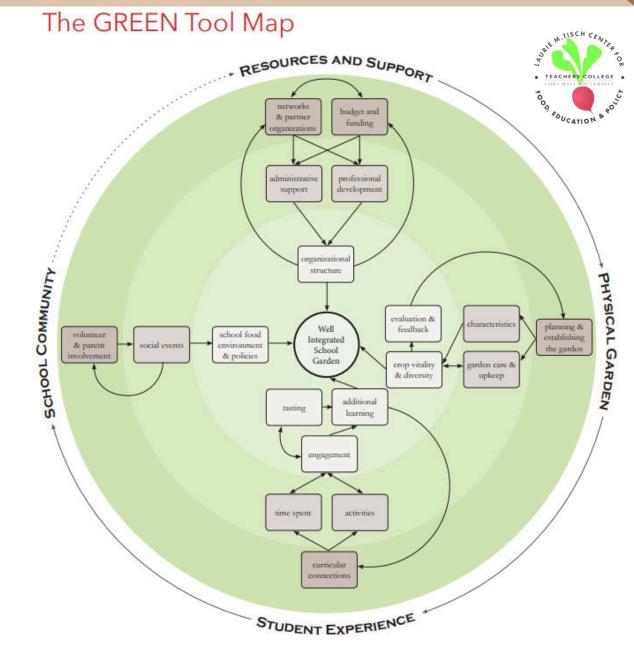
Cambridge Food Bank

The <u>Waterloo Region School Food Garden (WRSFG) program</u>, in partnership with the Cambridge Food Bank, has been key in establishing and expanding more than two dozen food gardens in elementary and secondary schools since 2017. WRSFG acts as a facilitator to schools and educators interested in building a garden in their school by providing the funds and resources they need.



The GREEN Tool

Garden Resources, Education, and Environment Nexus





School Garden Resources

Life Lab

 Life Lab is a national leader in the garden-based learning movement. Through workshops and consultations, they have provided tens of thousands of educators across the country with the inspiration and information necessary to engage young people in gardens and on farms.

SGSO Network

 The <u>SGSO Network</u> is an open peer-to-peer learning network with the goal of growing, sustaining and elevating a movement of equitable gardenbased education. They provide professional & leadership development, resources, and platforms to connect for members serving at a school, district, regional, state, or national level.

Edible · Schoolyard Project

 The Edible Schoolyard Project is a nonprofit organization dedicated to the transformation of public education by using organic school gardens, kitchens, and cafeterias to teach both academic subjects and the values of nourishment, stewardship, and community.

Project . Learning Tree

Project Learning Tree is an award-winning environmental education program designed for teachers and other educators, parents, and community leaders working with youth from preschool through grade 12.



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More School Garden Resources

Ú of A School Garden Workshop

The University of Arizona's <u>School Garden Workshop (SGW)</u> places undergraduate and graduate students trained in the basics of sustainable agriculture as interns at school gardens in underserved Tucson neighborhoods.

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Mollen Foundation

 <u>The Mollen Foundation</u> is a non-profit organization dedicated to educating and empowering schools and communities to transform their lives by adopting healthy habits to achieve life-long benefits. The Mollen Foundation offers a comprehensive approach to healthy living through food education, physical activity, leadership and resiliency skills.

Blue Watermelon Project

• <u>The Blue Watermelon Project</u> works with teachers and staff to integrate taste education and hands-on techniques into curriculum to engage all senses and encourage learning through doing.

AZ Farm to School Network

The <u>Arizona Farm to School Network</u> is a state-wide hub of connections, research, and resources that are gathered and shared to support all communities working to implement and sustain farm to school programming.

School Garden Grants

Native Seeds SEARCH

 <u>Community Seed Grants (CSG)</u> are available once every year for school gardens and community organizations with regional and cultural connection to the NS/S seed collection. They are offered to garden projects working toward collective food security, seed sovereignty, traditional knowledge, education, and other efforts of community wellness.

Whole Foods Whole Kids

The Whole Foods Whole Kids Garden Grant program provides a \$3,000 monetary grant to support a new or existing edible educational garden located at either a K-12 School or Non-profit organization (501(c)(3) in the US/Registered Charity in Canada) that serves children in the K-12 grade range.

USDA Farm to School Grant

• This program awards grants that support planning, developing, and implementing farm to school programs that connect students to the sources of their food through education, taste tests, school gardens, field trips, and local food sourcing for school meals.

Captain Planet Foundation

Captain Planet Foundation™ invests in high-quality, solution-based programs that embrace STEM learning and empower youth to become local & global environmental change-makers. Participants in these programs are eligible to receive certain grants.

Question Time

