



THE UNIVERSITY OF ARIZONA

# Cooperative Extension

Gila County



4-H Youth  
Development



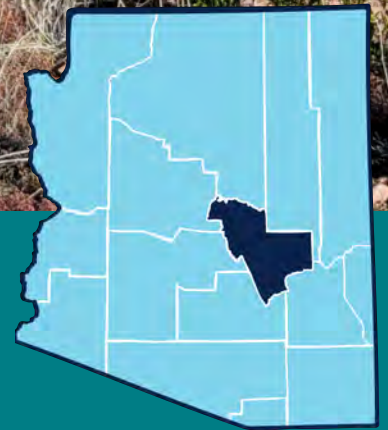
Agriculture &  
Natural Resources



Family, Consumer  
and Health Sciences



Federally Recognized Tribal  
Extension Program



# Gila County Cooperative Extension

Annual Report  
2023

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# Gila County Cooperative Extension 2023 Annual Report



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*"To engage with people through applied research and education to improve lives, families, communities, the environment and economies in Arizona and beyond."*

*Mission Statement*

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# From the Director



2023 was a year of numerous accomplishments delivered by the University of Arizona Gila County Cooperative Extension (GCCE). GCCE is a vital resource providing education and outreach programs to the residents of Gila County, Arizona. It offers expertise in agriculture, natural resources, 4-H youth development, family and consumer health sciences, community development, and tribal programs. Through workshops, classes, publications, and online resources, Extension serves to educate and empower individuals, families, and communities with knowledge and skills for improved well-being and sustainability.

We work closely with those we serve to create programs which address community-identified needs. These program areas include:

- 4-H Youth Development (4-H): As the state's largest youth-serving organization, Arizona 4-H is inspiring the next generation of leaders, entrepreneurs, and problem solvers.
- Agriculture and Natural Resources (ANR): We have been assisting farmers, ranchers, agency personnel, and others involved in natural resource management for over 100 years to increase profits and steward our natural resources responsibly.
- Family, Consumer, & Health Sciences (FCHS): Our community-specific programs and educational classes help build strong families, strong minds, and strong bodies.
- Federal Recognized Tribal Extension Program (FRTEP): With more than a 30% tribal land- base in Arizona, initiatives engage Native American communities through education and outreach on development, sustainability, and resiliency.

During 2023, 4-H expanded programming through the innovation of the STEM Mobile Makerspace, Exploring 4-H program, and expanded lessons and curriculum for Ag Daze. ANR continued to monitor the range, to offer clinics to improve farming production, to teach Master Gardener courses, and workshops, and to mitigate fires and improve forest health. FCHS expanded programming to help families build financial security and bridge the communication gap between parents and teens. FRTEP worked with agriculture partners on improving food accessibility in San Carlos tribal lands.

Thank you to Gila County, the many community partners, advisory board members and volunteers who, through their efforts and dedication, contribute to the University of Arizona Cooperative Extension mission of bringing research-based, land-grant developed innovations, advancements, and education to Gila County and beyond. I invite you to learn more about the work we do in Cooperative Extension in this report and encourage you to join us in future programming offered throughout the coming year.

## **Renee Carstens**

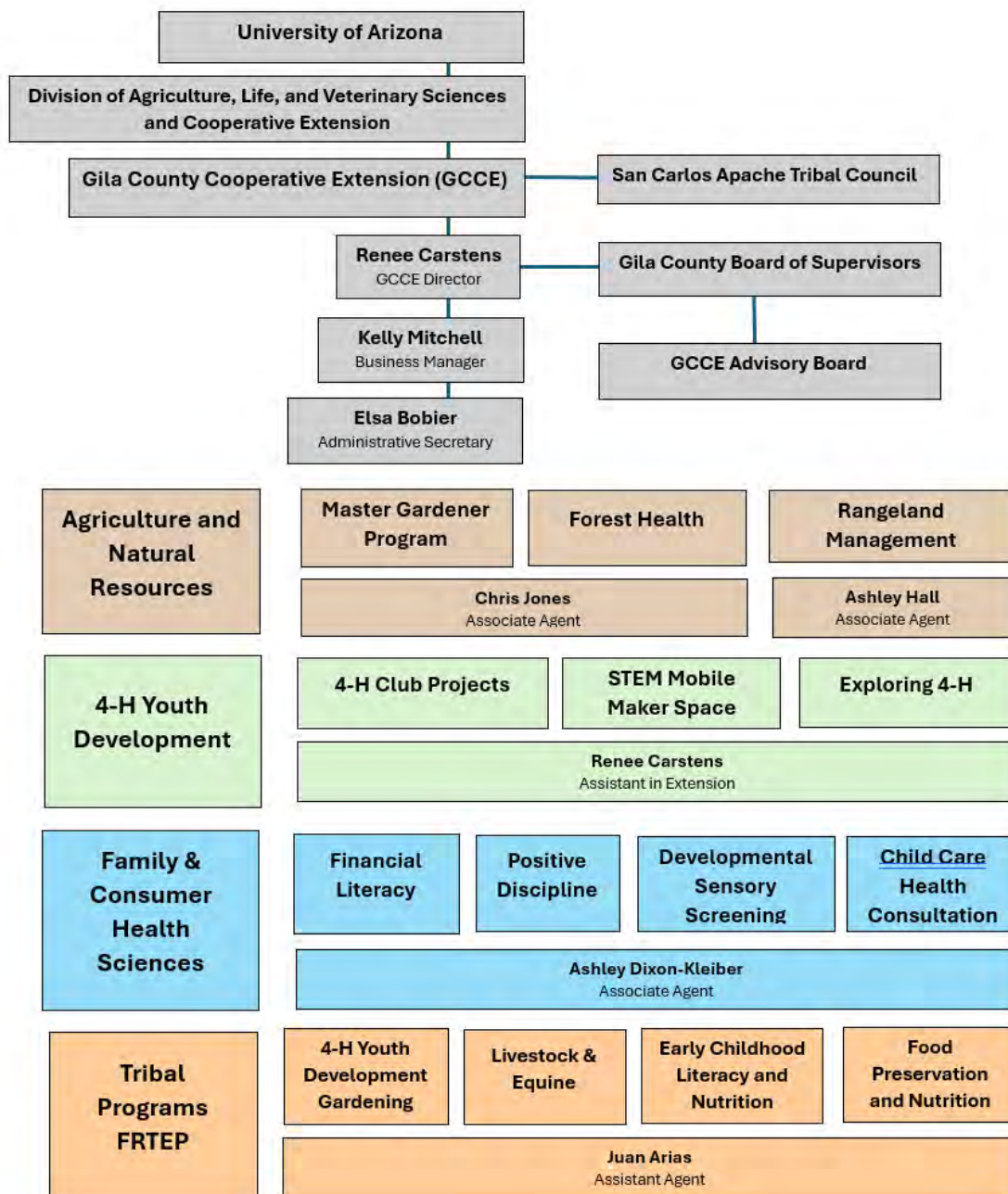
Director, Gila County Cooperative Extension

[rcarstens@arizona.edu](mailto:rcarstens@arizona.edu)

# Gila County Cooperative Extension Organization

Gila County Cooperative Extension (GCCE) is an Extension Unit of the University of Arizona, housed under the Division of Agriculture, Life, and Veterinary Sciences and Cooperative Extension. We have three locations in Gila County:

- GCCE Globe Office, 5515 S Apache Ave Suite 600, Globe, AZ 85501
- GCCE Payson Office, 514 S Beeline Highway, Payson, AZ 85541
- GCCE San Carlos Office, 400 Apache Avenue, (PO Box 850) San Carlos, AZ 85550



# Advisory Board

Per ARS Title 3, the Gila County Board of Supervisors appoints our seven-person Gila County Cooperative Extension Advisory Board. Our Advisory board meets on a quarterly basis and all meetings are open to the public. Our offices are located at 5515 S Apache Ave Suite 600, Globe, AZ and 514 S Beeline Hwy, Payson, AZ. Meetings are held in a hybrid format, with some people attending online and others attending at the GCCE Globe or Payson office. Agendas are posted on our website at <https://extension.arizona.edu/gila>. Our Advisory boards provide essential input to help us achieve our goals. Per UArizona guidance, external advisory boards are not governing bodies, but they do provide direction, build networks and partnerships, and help raise funds.

In 2023, three of our Advisory Board members, Dorine Prine, Marsha Fitzhugh and Janet Brandt, stepped down. We are indebted to their years of service. Current members are serving two-year terms ending December 31, 2025.

## Members:

- Clark Richins, 32 years as range program manager with San Carlos Tribe. Advisory board member since 1998.
- Ben DalMolin, contractor for the local mines, owner of Radium Allotment Ranch (business partners with brother Tyler DalMolin, Globe. 4 kids that participate in 4-H. Advisory board member since 2014.
- Cassie Waggoner, Ranch owner for 6 years, Advisory board member since 2021.
- Sammi Jenkins RN, 5th generation Gila County native, Former Gila County 4-H member, leader, and mother of 4 past/present Gila County 4-H members; Gila County Rancher, Retired Registered Nurse. Advisory board member since 2021.
- Paul Wolterbeek, 5 years with Gila County Government. Advisory board member since 2023.

## Past Members:

- Dorine Prine, President of the Warming Center, President of Payson Helping Payson, President of Payson Lions Club, Chairperson for the Lions Sight and Hearing Program, Public Sector Representative for the Gila County Community Action Program. Advisory Board Member & Community Consultant, resigned 2023.
- Marsha Fitzhugh, Retired High School Teacher, Career Technical Education Director, resigned 2023.
- Janet Brandt, Owner of MJB Art Glass Studio for 25 years, after retirement spent the next 15 years volunteering with Pine Strawberry Fuel Reduction, writing grants, developing programs and events, serving on the board 2 years, resigned 2023.



Clark Richins  
Chairman



Ben DalMolin



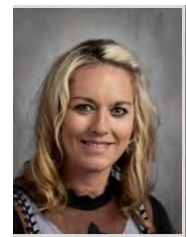
Cassie Waggoner



Sammi Jenkins



Paul Wolterbeek



Shelbi Parker Wilson

## Gila County Board of Supervisors



Steve Christensen  
District I



Tim Humphrey  
District II



Woody Cline  
District III

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# Three Phase Plan



*"We have to prepare the people we work with for jobs that don't even exist yet, and that's a very difficult thing to do".*  
-Dr. Martin

## Arizona's Cooperative Extension is preparing for the future!

Recognizing the ever-changing needs of Arizona communities, University of Arizona Cooperative Extension leaders launched a three-phase strategic planning process in May 2022, led by Director Dr. Ed Martin.

### Building the Plan: Two Phases Completed

The planning process has seen two key phases completed:

- Economic and Functional Impact Analysis (May 2022): This report assessed the financial impact of Extension's operations and the broader benefits it delivers across the state, including social and community improvements.
- Statewide Needs Assessment Survey (January 2023): This survey gathered data from Arizonans in English and Spanish, covering topics like health, education, agriculture, environment, and economic development. The results will guide strategic planning efforts.

### Next Steps: Strategic Action Plan

"We're using these findings to develop a strategic action plan, something we haven't done in years," says Dr. Martin. This plan will ensure Extension programs align with its mission: continuous innovation in agriculture, youth development, community health, and connecting communities to UArizona research.

### Stay Informed!

For more information and county-specific data, visit the Strategic Positioning Page: link to Strategic Positioning Page: <https://extension.arizona.edu/ace-strategic-positioning>



# 4-H Youth Development

Gila County 4-H Youth Development Program uses a learn-by-doing approach to enable youth ages 5 to 18 to develop the knowledge, attitudes, and skills they need to become competent, caring, responsible citizens, and agents of community change. This is achieved by using the knowledge and resources of caring adult volunteers and UACE 4-H professionals. 4-H is the only national youth development program federally mandated through a partnership with Cooperative Extension (land-grant universities) and the U.S. Department of Agriculture. Youth can participate in a variety of ways such as clubs, special interest groups, after-school programs, camps, and other methods.

Youth enjoying High Ropes Course  
AZ Summit, Tucson Village Farm





4-H Youth at Ag-Daze 2023

## 4-H Youth Development

The **4-H Club program** offers 4-H members firsthand learning opportunities to develop leadership, technical, social, emotional, cognitive and life skills. Youth members participate in community club activities and choose one or more projects to complete during the 4-H year. In Gila County, we offer a wide variety of projects including those focusing on large livestock (beef, dairy cattle, dairy goat, goat, sheep, and swine), small livestock (poultry, cavy, turkey, and rabbit), reptile, quilting, fiber arts, cooking, gardening, horse, dog, shooting sports and much more. The 4-H calendar begins each year on Oct. 1st and ends Sept. 30th. This report reflects membership that concluded Sept. 2023.

**20 Project clubs** offer 4-H activities and provide access to Gila County projects and state-level learning experiences.

**212 youth** learned about animal care, STEM, quilting, fiber arts, dog training, shooting sports, life skills such as civic engagement, responsibility, and much more under the guidance of **37 adult volunteers and leaders** during the 2022-23 4-H year.

Our volunteers and leaders provided over **3,652 hours of service** mentoring and teaching Gila County youth **valued at \$110,034.76** based on Independent Sector 2023 Value of Volunteer Time Report at an hourly rate of \$30.13 for Arizona volunteers.

**205 youth** showed animals and **73 4-H entries** were exhibited in the hall during the 6-day 2023 Gila County 4-H Fall Fair held September 19th – 24th.

**Total Sales of \$316,985.00** were raised from the sale of **83 animals** at the 2023 livestock auction. Thank you to the generous buyers who support our 4-H and FFA youth by purchasing their project steers, swine, goats, lambs and turkeys.

The 5th Annual **Junior Beef Cook Off** provided **112 youth** an opportunity to show off their skills as they worked in teams to create delicious dishes using a pound of ground beef.

**Next Step 4 Leadership (NS4L)** is a statewide Cooperative Extension grant with the objectives to widen youth knowledge of the agriculture systems and technologies, provide support for youth-led community action, and provide readiness skills for students for workforce and college. **14 students** completed the **13 session** pilot program.



Renee Carstens

## 4-H Youth Development Team

4-H Assistant in Extension **Renee Carstens** has managed 4-H in Gila County since 2017. **Thuy Bishop** and **Teri James** provided leadership for many programs, alongside Americorp Members, **John Griffin** and **Kendra Martinez** working on Ag Daze lessons, and 4-H enrollments. **Mollimae Griffin** was essential in planning and announcing events via published and social media and recruiting new volunteers and presenters. **David Flores** and **Toni DeAnda** coordinated curriculum kits and taught lessons.





4-H Youth at Jr. Beef Cookoff 2023

### Exploring 4-H

Exploring 4-H is a unique opportunity for non-club youth to discover their spark through special interest events, classes and workshops offered to ages 5 to 18 in Southern Gila County. These programs inspire kids and teens to explore new career possibilities, actively engage with their communities, and develop the skills they need to become leaders for a lifetime. Participants engage in hands-on projects in agriculture, health, STEAM (science, technology, engineering, art, and math) and civic engagement in a positive environment where they receive guidance from adult mentors and are encouraged to take on proactive leadership roles.

Young people who take part in research-backed 4-H experiences are four times more likely to contribute to their communities and two times more likely to make healthier choices, be civically active, and participate in STEM programs. In addition, studies link high-quality adult mentors in improved high school graduation rates, higher self-esteem and self-confidence, and improved interpersonal skills in youth.

### Mobile Makerspace

The 4-H Mobile Makerspace is a portable trailer filled with 21st century equipment and technology to provide youth and community members with opportunities to gain advanced work readiness skills. Youth can use these tools to learn design and computer skills. 3-D printers, laser cutters and vinyl printers offer endless possibilities for creative and entrepreneurial experiences.

### Ag DAZE

In partnership with the Tonto NRCDC and the H-4 Ranch, Cooperative Extension coordinates and delivers 8 agriculture lessons to 4th and 5th grade classrooms throughout Gila County. The objective is for students to better understand how agriculture affects their everyday life, explore careers, learn about what is unique to Arizona agriculture, and broaden their knowledge about food production. 431 students and teachers engaged in hands-on farming activities at the H-4 Ranch in Tonto Basin.

### Camps

Many local youths received scholarships to attend 4-H camps throughout Arizona. AZ 4-H Summit provided campers 14 to 18 years old with precollege experience as they lived in dorms on the University of Arizona campus, while filling their days with academic and recreational activities. Our younger campers ages 8 to 13 packed their bags for an adventure at the 4-H camp on Mingus Mountain to enjoy the cooler temperatures in the pines as they participated in hikes, archery, crafts, and canoeing.



Thuy, Renee, Toni, Teri



Johnny



David



Jon H, Renee, Toni, Kendra, Mollie



# Agriculture and Natural Resources (ANR)

Gila County residents and agricultural producers have access to a range of research-based programs through the Gila County Cooperative Extension ANR Agents. These programs cover topics such as Rangeland and Forest Health, Horticulture, and Master Gardener Classes, as well as Range Monitoring and Sustainability Programs.

These programs provide valuable information and expertise to help individuals achieve their goals and improve their relationship with the environment. By accessing these programs, Gila County residents can gain insights and expertise to promote sustainable agriculture and eco-friendly practices.





Globe Master Gardeners

## Master Gardener/Horticulture Programs

Horticulture and Master Gardener programs help Gila County community members create healthy outdoor spaces, enhance biodiversity, and strengthen their knowledge, appreciation, in the rich, rugged and dynamic landscape that features a mix of mesas mountains, and canyons. Our **Master Gardener** provides advice and education to the public, maintains demonstration gardens, and provides technical assistance for community, organizational, and home gardens.

In 2023, the Payson Master Gardener Group, held monthly meetings and conducted volunteer educational activities. Nine volunteers, invested **534.5 hours** of volunteer service in maintenance, pruning, and seeding in Gila County.

Globe Master Gardener Group participated in seed packages for the Globe seed library, office garden, and landscape, and in stinknet pulls in April and May.

**Master Gardener** presentations reached **240 participants** with information about garden planning, plant selection, irrigation, pruning, and more.

**824 clients** were provided horticulture information and assistance; through approximately **60** phone calls and **85** emails.

Our Master Gardener offered three Master Gardener training courses in partnership with Eastern Arizona College, on botany, composting, soil, water and plant relationship, and tree care. **55 new Master Gardeners** were certified after participating in our 16-week training course.

**50 apple and 50 plum rootstock** were potted at Gisela Farm Project. The seedlings will be grafted as a volunteer project next spring.

Our Master Gardener organized the 5 C's (copper, citrus, cotton, cattle & climate) 5 series workshop at Miami Library reaching **100 participants**.

**Chris Jones** has been the Gila County Cooperative Extension Agent for Agriculture and Natural Resources for over 24 years. Current programs include biochar awareness and arid land agroforestry, and Master Gardener activities, such as fruit tree grafting (Payson, Gisela) and stinknet rapid response (Globe-Miami). Chris earned a Bachelor of Science Degree in Forestry at Northern Arizona University and a Master of Science Degree in Renewable Natural Resources at University of Arizona



Christopher Jones



## Forest Health and Sustainability Programs

Agent, Christopher Jones, teamed up with the **Payson Community Garden** in Northern Gila County to feature spring gardening classes.

**6 Kiln demonstrations** included Society of Range Management, Young Library, Buckeye, Flagstaff and Globe Schoolhouse Cooperative, with a total of **128** participants.

**Invasive Plants Education Program** raises awareness and addresses noxious weed issues in Gila County. Stinknet has become a widespread non-native invasive plant in Maricopa County, and it is arriving in Globe-Miami.

Volunteers have pulled Stinknet along highway 60/70 and businesses in Gila County. Presentations on noxious weeds at Gila County Fairgrounds and Tonto Basin have reached **25 participants**.

**Rethinking Fires and Floods Research Project** grant is to examine the aftermath of fires and protect community health. It involves a 14-member local community advisory board. **36** residential participants participated in sampling, and **86 floodplain samples** were collected in 2022. Contaminants released by the fires and transported by water and wind have been researched and quantified in 2023.

**FFA Career Development Event** on February 24-25, 2023, had **52 students** from **13 schools** participating.

**Firewise Outreach Program** provided **three** presentations reaching **80** homeowners. A Firewise practitioner workshop reached **20** participants.

The **Biochar Kiln Demonstration Program** was initiated in 2022. The kilns are used to reduce waste wood and hazardous fuels to make biochar, an organic soil amendment that makes water and nutrients available to plants and loosens compacted soil.



**Bio Char Kiln Demonstration**



Rangeland Monitoring near Young

## Rangeland Management & Livestock Production

Rangelands play a vital role in society by producing goods and providing ecological services. Gila County is a hub for beef cattle ranching, with employment in this sector five times more concentrated than the national average. Cattle and calves are the top agricultural commodities by sales, generating **\$5.8 million** in Gila County according to the latest Census of Agriculture.

It's crucial to balance livestock grazing with preserving natural resources. This is especially true as livestock producers have been reducing and managing herds because of drought conditions for the last two decades. Applied research aids in addressing land management questions, with ongoing monitoring of ranches for soil and vegetation trends. Collaboration occurs with the US Forest Service (USFS), Natural Resource Conservation Districts (NRCDC), and local ranchers.

VGS, software developed at UArizona to collect ecosystem data, is an integral part of the Gila County monitoring program and similar programs across the southwest. It's utilized across **97** federal and state agency offices, universities, and private consultants. Ashley is a member of the VGS Development Team.

Healthy rangelands support livestock production, wildlife habitats, and other natural resource benefits for Gila County.

In 2023, **105 sites** on **25 USFS allotments** were monitored, including **3 allotments (12 new sites)** that had not previously participated in the monitoring program.

Presented at **11 workshops/seminars** focusing on range monitoring and management, forage nutrition, plant identification and botany basics, drought planning, and vegetation response to fire.

Co-organized and presented at **2 Artificial Insemination 3-day Clinics** held at V Bar V Research Ranch. Each clinic was full with **24 participants** in total.

Provided **6 VGS trainings** to **100 federal employees** across the southwest and IT support for **10 VGS users**.

During Tonto NRCDC Ag Daze taught lessons to **250 youth** on fire awareness, rangeland restoration, and the importance of range health.

**Area Associate Agent, Ashley Lauren Hall**, has been serving Gila and Pinal Counties since August of 2016. Programs focus on Rangeland Management and Livestock Production which provide workshops and other educational opportunities on various subjects relating to rangeland management, monitoring, livestock nutrition, and other identified needs requested by clientele.



Ashley Hall



# Family Consumer and Health Sciences (FCHS)

Our community-specific programs and educational classes help build strong families, strong minds, and strong bodies. This is where Extension works to empower individuals with the knowledge and skills to make informed decisions regarding their health and nutrition, food preparation and food safety, financial management/literacy, family development, child development, and parenting.

Cate Gore giving out materials  
Read-On Express, Globe AZ





Financial Literacy and Nutrition fusion program, San Carlos, AZ

## Family, Consumer, and Health Sciences

According to the United States Census the official estimated **poverty rate** in 2020 was at **11.4%** for the entire United States. In Arizona, that rate increases to **14.1%**, with a poverty rate of **20% in Gila County**.

“Cumulative exposure to adversity (poverty, maladaptive financial strategies, poor nutrition, violence, and negative parenting), causes stress that behaves as a toxin in the developing the brain of a child and can change a child’s neural architecture resulting in emotional disorders and cognitive deficit.”

The influence of poverty and harsh environments may significantly affect the quality of parenting a child receives. Not only does poverty affect an adult’s individual experiences, but racial-ethnic disparities and historical trauma also contribute an additional layer of stress. The way they parent their children also needs to be considered when studying long-term child outcomes in relation to parental mental health. To combat this, a multipronged approach becomes necessary, considering financial literacy, parenting education, mental health, the developmental health of their children, and beyond.

In Gila County we offer the following programs:

**Financial Literacy:** Offering one-time, 2 hour single session overview, Where Does Your Money Go? and the more in-depth 4 session series Building Financial Security for Self, Family, and Community.

**Positive Discipline:** A current, engaging, and creative 5-session parenting series that encourages caregivers being both kind and firm with their children 3-18 years old.

**Child Care Health Consultant (CCHC):** Work with childcare providers to promote safe and healthy learning environments for young children and staff.

**Nutrition, Obesity and Physical Activity (NOPA) in San Carlos Apache:** This program provides health education to young children, their families, and childcare providers to support their ability to achieve and maintain a healthy weight and lifestyle.

**Developmental and Sensory Screening (DSS), Gila Region and San Carlos Apache Region:** Provides education about early screenings as well as hearing, vision, and development screenings and referrals for 0-5 year olds.

**Associate Area Agent Ashley Dixon-Kleiber** has been serving Gila County for 7 years, including serving San Carlos Apache Lands, as well as a small appointment in Yuma and Pinal Counties. She enjoys working with families and diverse groups and has a passion for working with children and individuals who have experienced trauma and challenging life events.



Ashley Dixon-Kleiber



Child Abuse Prevention Parade, San Carlos



Vision Screening  
Read-On Express Event, Globe

## Family, Consumer, and Health Sciences

In 2023, because of the FCHS Programming in Gila County:

**7 residents** of Gila County have benefits-eligible positions and together create a versatile and dynamic FCHS team of instructors for Gila County and San Carlos.

On children 0-5 years of age in Gila County and San Carlos Apache Tribal Lands:

**347 vision screenings** were conducted with **42 referrals** to see their primary care doctor to have their vision checked.

**371 hearing screenings** were conducted with **12 referrals** after their hearing rescreen indicated there was a potential for hearing delays/challenges.

**40 developmental screenings** were conducted with **5 referrals** for further assistance after receiving a screening outcome that indicated concern.

**3 Positive Discipline Series** were held in Gila County. Of those that completed the series, findings indicate that parents: 1) Increased parental ability to see things from their child's perspective. 2) Decreased use of spanking as a discipline tool. 3) Increased assigning of age appropriate roles to children.

**19 Where Does Your Money Go? Workshops** were offered to **40 participants**. More than half reported they would track expenses, work on reducing spending leaks, spend on needs before wants, and decided to develop a spending/savings plan.

**14 Building Financial Security for Self, Family, and Community** workshops offer reaching **73 participants**

**50 parents/caregivers** in San Carlos participated in at least **5 sessions** of nutrition and physical activity programs

**86 childcare providers** in San Carlos attended at least one session of **Healthy Kids, Healthy Future** series and **19 completed/graduated** the series.

**10 childcare sites** in Gila County completed a **Health and Safety Checklist** with the CCHC, identifying challenges and creating a plan to improve these challenges, making safer environments for children to thrive while in childcare.

Family, Consumer, and Health Sciences Gila County Team: **Pam Trobaugh** (Educational Specialist DSS San Carlos and Child Care Health Consultant), **Ashley Dixon-Kleiber** (Associate Area Agent and Team Lead), **Melody Thomas** (Instructional Specialist for NOPA and beyond), **Chrisanne Dawson** (Educational Specialist Senior DSS Gila), and **Cate Gore** (Instructional Specialist for Financial Literacy and Positive Discipline). Not pictured: **Josie Castillo** (Instructional Specialist for Financial Literacy and Positive Discipline)







# Federally Recognized Tribal Extension Program (FRTEP)

Federally Recognized Tribal Extension Program (FRTEP) San Carlos Apache Tribe, funded by a competitive grant from the United States Department of Agriculture (USDA) NIFA. The program provides an opportunity to reach the tribal community through educational programs. Based on the community's request and need to increase community health, resources, and program adaptation, FRTEP programs provide Tribal Extension Agent funding to work directly in the San Carlos Apache Region. FRTEP programs include contacting and/or providing the community with Agriculture, Natural Resources, FCHS, and youth development programs.



Hubert Thomas teaching a drone demonstration  
Land Days Event at Nalwoodi Denzhone Life Center



EQUINE EDUCATION - YOUTH & ADULTS

## Federally Recognized Tribal Extension Program

**Livestock & Equine Resource Program** includes two components that support San Carlos.

First, **Beef Quality Assurance** teaches the beef industry essential BQA principles in cattle care and handling. Through practical husbandry and transportation methods, stakeholders can make responsible transport decisions for the welfare of the cattle. The Beef Quality Assurance training provided locally for producers focused on critical aspects such as record keeping, USDA programs, Livestock Nutrition, Vaccinations, Body Score condition, poisonous plants, and equipment resources. This comprehensive training aimed to enhance the knowledge and skills of cattle associations in San Carlos in various essential areas related to beef production.

**Second, Equine Education** sessions tailored to beef production are designed to provide valuable knowledge and skills to ranchers, producers, and owners in the equine industry. Topics covered may include horse health and nutrition, proper handling and care techniques, breeding and reproduction, and training and care for rodeo practices. These sessions aim to enhance participants' understanding and expertise in all aspects of equine management and welfare.

### **Native American Agriculture Fund (NAAF),**

Expanding Tribal Capacity to Improve Animal/Human Health and Enhance Economic Sustainability, was awarded to support initiatives, including additional resources providing kits to training producers and tribal agents.

The educational kits are tailored to support livestock and equine care in rural communities, including tribal areas. These kits contain valuable resources and information on animal health, nutrition, handling, and general care practices.

### **Overcoming Business and Land Challenges: Assisting Refugees, Indigenous Peoples, and other Limited Resource Beginning Producers in Arizona,**

Making small-scale agricultural production more economically viable will be addressed by providing education and assistance on BFRDP priority areas of business and entrepreneurship training, innovative land acquisition strategies, basic production practices, diversification, marketing strategies, risk management, recordkeeping and food safety, and mentoring.

## Tribal Extension Program San Carlos

Juan Arias, FRTEP agent, has devoted more than ten years to serving the San Carlos Apache Tribe. His expertise spans various areas, including Agriculture, Natural Resources, Youth Development, Food Preservation, and Family Programs. His role as an Assistant Agent is supported by the Federally Recognized Tribal Extension Program (FRTEP), funded by a competitive grant from the USDA's National Institute of Food and Agriculture (NIFA), which has been pivotal in enhancing the community's well-being through various educational programs.



Juan Arias



Youth Archery Range, San Carlos

# Tribal Youth Development

Extension agents and staff at San Carlos use a hands-on classroom approach involving artistic and applied science methods to motivate young people to adopt positive attitudes about growing their food, raising their animals(ag tours), and learning archery and traditional crops within the community.

**Tribal 4-H** serves youth on the tribe directly focusing on topics that include life skills, STEM, welding, cattle/equine education, food preservation and most importantly creating a safe space for community members. San Carlos Extension supports three traditional 4-H clubs and provides several projects that reach over **100 youth** in San Carlos.

Extension works with youth to teach them **gardening** activities to produce crops utilizing their own land. Youth learn about plant needs, parts, soil types, seed saving, planting season, water preservation, composting/worms, and physical activity. Families participate in activities related to growing food on their land to provide for community members. Extension also works with kids at early childhood centers to help them learn about fruits and vegetables and the importance of physical activity, healthy eating, literacy, and agriculture.

**Land DAZE**, a summer camp designed to introduce elementary, middle, and high school students to agriculture natural resource careers. School enrichment activities include poultry, seed saving, horticulture, composting, and mapping 21st century technology. **271 youths** reached during Land Daze

**AZ 4-H Tech Changemakers** empowers young people to close the digital divide and provides #Opportunity4All (link is external) to people in their communities by providing the education and tools they need to teach "teens as teachers" digital skills to adults in their communities.

**Preserving Indigenous Agricultural Wisdom: Native Youth Utilizing Technology to Connect the Past, Present, & Future of Tribal Food Sovereignty**, youth reach through agriculture education teaching knowledge in livestock, horses, plants, and 21st-century technology.

## San Carlos FRTEP Team

The FRTEP Team provides several topics specifically supporting underserved tribal communities like San Carlos. **Juan Arias**, Assistant Agent, has served the community for ten years, providing ANR, FCHS, and 4-H education. **Hubert Thomas** joined the team to assist in the expansion of soil sampling, mapping, food access, and youth development.



Hubert Thomas, Juan Arias



Apache Dippers, Grown by FRTEP Team

## Community Development - Family & Early Childhood Programs

**Traditional food systems** and food security topics are provided to support the San Carlos community's needs. Community garden demos are established to teach community members how to sow traditional and modern crops. Topics provided include tree propagation, seed saving, composting, pest management, soil preservation, and restoration.

**Three sister** planting gardens have been established for seed preservation, reintroduction, and crop access among three sites. Native crops include Apache Giant, Apache White corn, Apache sunflower, and Apache Dipper. At least **109** participants were reached during compost, biochar, crafting, seed saving, and the garden demo workforce.

**Coupling Human and Machine Knowledge to Optimize Tribal Food Systems** - University of Arizona wants to develop tools and disseminate information to tribal producers for optimizing the production of culturally essential crops for combating climate change and food insecurity on U.S. Tribal reservations.

**Growing Futures in AZ Agriculture: An Immersive Professional Development Series for Integrating Agricultural Concepts into K-8 Curricula**, in this project we engage K-8 teachers with agricultural experts/producers and Extension educators. We facilitate collaboration between teachers, Extension staff, and ag professionals to create agriculturally focused, culturally relevant K-8 classroom curricula and interactive toolkits.

**Family & Early Childhood Programs** include reaching families through a series of educational sessions that include Apache language implementation through literacy sessions using local resources reaching families, among other topics.

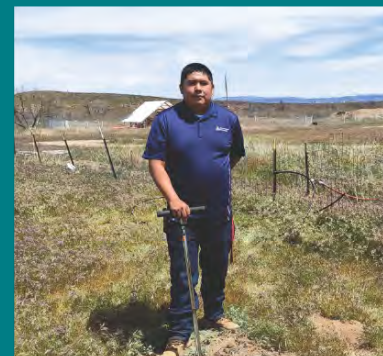
**Community-Based Culturally Responsive Early Literacy Programming for Parents of Young Children on the San Carlos Apache Tribal Lands** is a community-based and sustainable program that aims to improve young children's early literacy by providing resources to community members in the San Carlos Apache Tribe.

**Nutrition/Obesity/Physical Activity** program provides educational sessions in nutrition, physical activity, and resources for healthy eating. Activities themed around a garden give access to fruit and vegetables at locations for food sustainability and healthy eating.

**Financial Literacy** program offers a session on basic resources, including the Where Does Your Money Go funded by Wells Fargo, for tribal communities.

### San Carlos FRTEP Team

Hubert Thomas join the team in 2022, assisting delivering pregameing in all areas of Extension. Thomas currently focuses his efforts on projects that include ARS mapping, youth development, and horticulture/food safety activities.



Hubert Thomas

# Financials



## GCCE Funding

Gila County Cooperative Extension is supported with resources from State, Federal, and County funding, as well as awarded grants and donations. In addition, Gila County Cooperative Extension also receives support from Gila County government with office space provided for conducting Extension work in our Globe, Payson, and San Carlos offices.

## Revenues

State, Federal, and County funding provide faculty and staff salaries and support a portion of our travel and operating expenses. State funds are appropriations to the University of Arizona College of Agriculture. Federal funds include USDA funding for Cooperative Extension programs and funding specifically for the San Carlos Apache Reservation. Gila County funds are an appropriation from county government and support faculty and staff salaries and in-county operating expenses. A variety of awarded and continuing State and Federal grants also help support programming throughout Gila County.

## Expenditures

Operations and supplies expenses include items used for Gila County Extension program delivery such as training and curriculum materials, items for food demonstrations, and basic office supplies. Standard operating expenses as well as other costs for vehicle repair and maintenance, fuel, and utilities are also included in this category. Expenditures for travel expenses include reasonable lodging, airfare, mileage, and/or per diem for faculty and staff who travel to conduct business on behalf of Gila County Cooperative Extension.

## Salary and Benefits

Gila County Cooperative Extension employs 18.2 FTE (full-time equivalent) faculty and staff. The majority of our funding provides salaries and benefits that allow GCCE to provide programming and services to youth, families, ranchers, farmers, and community organizations throughout Gila County as well as neighboring communities.



## Donations or Other Resources

Donations to Cooperative Extension are tax-deductible and help provide education for improving lives and communities in Gila County and throughout Arizona.

For more information, please visit <https://extension.arizona.edu/give>



# Gila County Cooperative Extension Staff

## Administration

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- Kelly Mitchell, Business Manager,
- Elsa Bobier, Administrative Assistant, [ebobier@arizona.edu](mailto:ebobier@arizona.edu)
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## Family Consumer and Health Sciences (FCHS)

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## Federally Recognized Tribal Extension Program (FRTEP)

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- Hubert Thomas, Instructional Specialist, [hthomas91@arizona.edu](mailto:hthomas91@arizona.edu)

## Locations

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928 275-6314

### Payson Office

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Payson, AZ 85541  
928 267-3112

### San Carlos

400 Apache Ave  
PO Box 850  
San Carlos, AZ 85550  
928 475-2350



# Gila County Cooperative Extension is possible thanks to our community partners, sponsors, and volunteers!





**Petting Zoo at Ag DAZE  
H-4 Ranch, Tonto Basin**



We respectfully acknowledge the University of Arizona is on the land and territories of Indigenous peoples. Today, Arizona is home to 22 federally recognized tribes, with Gila County being home to San Carlos Apache. Committed to diversity and inclusion, the University strives to build sustainable relationships with sovereign Native Nations and Indigenous communities through education offerings, partnerships, and community service.

Gila County Cooperative Extension  
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