

WEEKLY WAVE



THE UNIVERSITY OF ARIZONA
COOPERATIVE EXTENSION

WATER RESOURCES RESEARCH CENTER



January 12, 2024 / Volume 12, Issue 2

The Water Resources Research Center - a research unit of the [College of Agriculture, Life and Environmental Sciences](#) and an Extension unit in [UA Cooperative Extension](#) within the Division of Agriculture, Life & Veterinary Sciences & Cooperative Extension.
[Land Acknowledgement.](#)

[WRRC Office Update](#)

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IN THIS ISSUE: Conference Registration, Chocolate Fest, 104(b), Factsheet, Upper Colorado River Commission, Indigenous Women's Leadership Network

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WRRC 2024 ANNUAL CONFERENCE



IMPLEMENTING
WATER
SOLUTIONS
THROUGH
PARTNERSHIPS

March 12-13

University of Arizona
Student Union Grand Ballroom
Tucson, AZ



REGISTER NOW!

Registration Now Open for WRRC 2024 Annual Conference

Early bird registration for this year's conference opens today! The WRRC Annual Conference will be held on March 12-13, 2024, at the University of Arizona Student Union Grand Ballroom, with livestreaming availability. This year's theme is *Implementing Water*

Solutions Through Partnerships. The conference program will showcase collaboration-based solutions across the state through speaker presentations and panels while providing multiple networking opportunities that include an evening reception and poster session. This conference will bring new information to the table regarding solutions to Arizona's water challenges, aiming to inspire new partnerships and collaborations. See the registration link below to join us this spring for an engaging and informative meeting. Register early for both days for \$160. Standard registration, beginning February 13, will be \$175. We are pleased to offer a discounted student registration rate of \$60. If you are interested in becoming a sponsor, there is still time! Sponsorship application information is available below.

Image: Clayton B. Lyon. WRRC 2023 Annual Conference

[Register Early and Save!](#)
[Become a Sponsor](#)

EVENTS



WRRC 2024
ANNUAL
CONFERENCE

**IMPLEMENTING
WATER
SOLUTIONS
THROUGH
PARTNERSHIPS**

MARCH 12-13
University of Arizona
Student Union Grand Ballroom

CALL FOR STUDENT POSTER ABSTRACTS

Extended Deadline - January 26!

All students in Arizona participating in water research, management, or community engagement projects in the Southwest region are encouraged to apply!

[More info ►](#)

Arizona Association of Women in Water & Agriculture: Networking Mixer and Annual Meeting – Co-sponsored by the WRRC

AAWWA "Wine, Women & Water" Cocktails & Networking Mixer – Enjoy an evening of spirits, networking with colleagues, new friends, and water!

Date: January 30, 2024

Time: 5:30 pm – 8:30 pm Arizona Time

Location: To be announced soon!

AAWWA Annual Meeting – Spend a day being inspired by women in the water industry! Visit the vendor market, breakfast, lunch, and network with women throughout Arizona who have an interest in water.

Date: January 31, 2024

Time: 9:00 am – 3:00 pm Arizona Time

Location: University of Arizona Student Union (Grand Ballroom): 1303 E University Blvd. Tucson, AZ



[Register Here](#)

[More Info](#)

Upcoming WRRRC Events

Feb 16: [WRRRC 20th Annual Chocolate Fest](#)

March 12–13: [WRRRC 2024 Annual Conference: Implementing Water Solutions Through Partnerships](#)

Upcoming WRRRC Co-sponsored Events

Feb 6: [NVIS Spring 2024 Seminar: Indigenous Ingenuity: A Path Forward – Co-sponsored by the WRRRC](#)

Mar 12: [NVIS Spring 2024 Seminar: Place Based Learning and Cultural Fire Practice in California – Co-sponsored by the WRRRC](#)

Apr 2: [NVIS Spring 2024 Seminar: \[Presentation title TBD\] – Co-sponsored by the WRRRC](#)

May 7: [NVIS Spring 2024 Seminar: Eleltek Waali \(I'm Reading Country\) – Co-sponsored by the WRRRC](#)

NEWS

Celebrate 20 Years of Chocolate Fests with the WRRRC

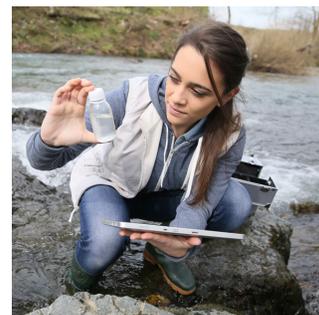
We invite you to join the WRRRC on Friday, February 16, from 3:30 to 5:00 pm for our 20th Annual Chocolate Fest. During this in-person event, you'll get to enjoy some delicious chocolate creations from Tucson kitchens and beyond. We encourage you to bring your homemade (or store-bought) goodies to share as part of our chocolate potluck. Aside from getting to enjoy these sweet treats, you'll have the opportunity to mingle with water colleagues and see the winning photographs from our 2023 Annual Photo Contest. So, mark your calendars and start thinking about chocolate! We hope to see you next month at Chocolate Fest 2024.



[Register Here](#)

WRRRC Invites Research Proposals for 104(b) Program

Faculty and research personnel at any of Arizona's three public universities are invited to submit research proposals to the WRRRC for grants of up to \$10,000. Grant funds are provided by the Water Resources Research Act (WRRRA), Section 104(b) program, through the US Geological Survey. Proposals should feature student work and explore new ideas



to address water problems in Arizona and the Southwest and expand understanding of water and related phenomena. Proposals from a broad range of academic disciplines and professional programs will be considered. Additionally, proposals that increase diversity, equity, inclusion, and justice, and address issues in historically marginalized or underserved communities are highly encouraged.

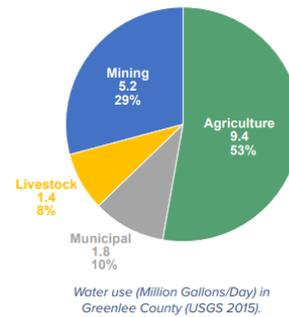
Proposals are due by 5:00 PM Friday, March 1, 2024. Funded projects will start on September 1, 2024, contingent on congressional budget approval. For more information visit the webpage below or email Communications Coordinator Jessie Hampton (jessiehampton@arizona.edu). For information on the other WRRRA grant program administered by the WRRC, the National Competitive Section 104(g) Grants, [click here](#) or read about it in next week's newsletter.

[Program Info & Instructions](#)



Did You Know?

Water demand in Greenlee County is split among different water user groups, primarily agriculture (53%) and mining (29%). Municipal water uses, including domestic and commercial (10%), and livestock operations (8%) make up the remaining water demands. Cattle ranching and mining are important cultural and economic activities within Greenlee County dating back to the 1870's. Currently, 82% of the land in Greenlee County is grazed by livestock while 5.5% is under agricultural production. Water use associated with livestock can involve growing feed, including hay and alfalfa, and maintaining stock ponds. Greenlee County is also home to Morenci Mine, the largest copper mine in North America. Water supplies are used in the extraction, treatment, and processing stages of mining operations, as well as for dust control at mining sites and are sourced from the San Francisco River, Chase Creek, and Eagle Creek, as well as leased Central Arizona Project water from the San Carlos Apache Tribe.



[Greenlee County Water Factsheet Source](#)

Proposal Seeks to Strengthen Tribal Involvement with Upper Colorado River Commission

After decades of exclusion from negotiation tables, Tribes that rely on the Colorado River may soon have a voice within an important commission overseeing the critical water resource. State and federal leaders did not include Tribes in the creation of the 1922 Colorado River Compact, which laid the foundation for the management of the river's water. Even as recently as 2007 and 2019, rules for managing the Colorado



Upper Colorado
River Commission

River were developed without Tribal participation. Under a proposal made by six Tribal nations to the Upper Colorado River Commission, which was announced in December at the 2023 Colorado River Water Users Association Conference, Tribes in the Colorado River's Upper Basin (Colorado, New Mexico, Utah, and Wyoming) could gain a permanent seat at the table to decide the river's future. The Commission, an interstate water administrative agency consisting of federal and state officials, will consider the plan and may vote on it sometime in February, according to Executive Director Chuck Cullom. If approved, the proposal could prove to be an important step forward in increasing Tribal representation on Colorado River matters.

[Read More](#)

Leadership Network Propels Indigenous Women in the Water Industry

Historically, Indigenous women have held leadership positions in their tribes as nurturing culture bearers. Colonization challenged the matriarchal nature of some native Tribes, pushing Native women into societies and workplaces that devalued them. To help Indigenous women reclaim their leadership roles, a group called the Indigenous Women's Leadership Network (IWLN) provides Indigenous women with networking and education opportunities, scholarships, and leadership skills. Women's leadership identity in most Indigenous cultures is that of "being stewards of Mother Earth and Father Sky" as UArizona's Karletta Chief, who has benefited from the IWLN, describes. Because of this, environmental sciences and natural resource fields provide culturally fulfilling positions for Indigenous women, while the field benefits from a strong knowledge base from these women. The IWLN, founded in 2021, was honored at the Colorado River Water Users Association meeting held in Las Vegas in December 2023, as AZ Central explains in its coverage. The IWLN is part of the Tribal water initiative in the Colorado River Basin, helping native women to become water managers and leaders like Lorelei Cloud, a current IWLN co-chair and first Tribal member of the Colorado Water Conservation Board. Valerisa Gaddy, a post-doctoral researcher with the WRRC whose research involves assessing methods of microbial water quality, is also a member of the IWLN.



[AZ Central Article](#)
[Indigenous Women Leadership Network](#)

WATER JOBS

- ADWR [Multiple Positions](#)
- North Carolina State University (Sea Grant, Space Grant, & WRRRI) [Communications Director](#)
- North Carolina State University (Sea Grant) [Research and Program Coordinator](#)
- Watershed Management Group [Community Conservation Program Director](#)
- Watershed Management Group [Events and Fundraising Coordinator](#)

Please visit [WRRC's website](#) for a complete listing of water jobs and opportunities.

NOTICES, PUBLICATIONS, and MEDIA



Special Issue: Water Research and Creative Activity

As increasing stress is placed on water resources, University of Arizona faculty, researchers, staff, and students are building collaborative strategies and innovations to tackle some of the most complex problems facing Southern Arizona and society as a whole. Follow along this semester as they share some of these inspiring stories.

[More Info](#)

New Extension Publication: Evaluating an in-situ, Low-Cost Soil CO₂ Sensor as a Soil Health Assessment Tool in Agricultural Soils

This study from authors Debankur Sanyal, John Heun, Charles Stackpole, and Pedro Andrade-Sanchez is available to read or download. [Read Here](#)

CALENDAR ANNOUNCEMENTS



- **Jan 12:** [2024 Bouwer Intern Scholarship – Application Deadline](#)
- **Jan 16:** [Tucson Groundwater Users Advisory Council Meeting](#)
- **Jan 18:** [Spring 2024 Tumamoc Talk: The Changing Hydroclimate of Southern Arizona – Dr. Michael A. Crimmins](#)
- **Jan 22:** [ENVS Colloquium — Dr. Julia Green \(UArizona\)](#)
- **Jan 22–24:** [Growing Water Smart: Integrated Water and Land Use Planning Workshop](#)
- **Jan 26:** [WRRC 2023 Annual Conference – Student Poster Abstract Deadline](#)
EXTENDED!
- **Jan 29:** [ENVS Colloquium — Dr. Jay Famiglietti \(ASU\)](#)
- **Jan 30:** [Arizona Association of Women in Water & Agriculture \(Wine, Women & Water Reception\) – Co-sponsored by the WRRC](#)
- **Jan 31:** [Arizona Association of Women in Water & Agriculture Annual Meeting – Co-sponsored by the WRRC](#)
- **Jan 31:** [3rd International Groundwater-Agriculture Conference: Toward Sustainable Groundwater in Agriculture - Linking Science and Policy – Abstract Deadline](#)
- **Jan 31:** [Pete McBride: Into the Grand Canyon, Between River and Rim](#)
- **Feb 4–7:** [NIWR 2024 Annual Meeting](#)
- **Feb 5:** [ENVS Colloquium — Rick Tafoya \(USDA\)](#)
- **Feb 6:** [NVIS Spring 2024 Seminar: Indigenous Ingenuity: A Path Forward – Co-sponsored by the WRRC](#)
- **Feb 8–9:** [First International Atmospheric Water Harvesting Summit](#)
- **Feb 11–13:** [AWWA/WEF Young Professionals Summit](#)
- **Feb 12:** [ENVS Colloquium — Dr. Sheldwin Yazzie \(Albuquerque Area Indian Health Board\)](#)
- **Feb 16:** [WRRC 20th Annual Chocolate Fest](#)
- **Feb 19:** [ENVS Colloquium — TBD](#)
- **Feb 22:** [Spring 2024 Tumamoc Talk: What Goes on Inside the Clouds? – Dr. Sylvia Sullivan](#)
- **Feb 22–23:** [2024 Family Farm Alliance Annual Conference – Resilience in Every Drop: Safeguarding America's Food Security](#)
- **Feb 25:** [AWRA/UCOWR/NIWR 60th Anniversary Joint Water Resources Conference –Topical Session Deadline](#)
- **Feb 26:** [ENVS Colloquium — ENViSion Peer Review](#)
- **Feb 26–27:** [Environmental Professionals of Arizona \(EPAZ\) Conference](#)
- **Feb 26–28:** [Water Resources Management & Sustainability: Solutions for Arid Regions 2nd International Conference](#)
- **Feb 27–29:** [2024 Southwest Adaptation Forum – Save the Date](#)

- **Feb 28–Mar 1:** [MSSC 2024 Annual Salinity Summit](#)
- **Mar 5–7:** [RiversEdge West 2024 Conference – Restoration for the Future: Promoting Resilience in Our Rivers and Communities](#)
- **Mar 10–16:** [National Groundwater Awareness Week](#)
- **Mar 11:** [ENVS Colloquium — Dr. Thomas Lavanchy \(Oklahoma State University\)](#)
- **Mar 11–14:** [AWWA WateReuse 2024 Symposium](#)
- **Mar 12:** [NVIS Spring 2024 Seminar: Place Based Learning and Cultural Fire Practice in California – Co-sponsored by the WRRC](#)
- **March 12–13:** [WRRC 2024 Annual Conference: Implementing Water Solutions Through Partnerships](#)
- **March 12–13:** [A Meeting of Sacred Waters: A Global Gathering of Indigenous Voices](#)
- **Mar 14:** [Spring 2024 Tumamoc Talk: The Influence of a Variable and Changing Climate on Upper Gila River Streamflow – Dr. Connie Woodhouse](#)
- **Mar 18:** [ENVS Colloquium — SEES Earthweek Keynote Speaker](#)
- **Mar 25:** [ENVS Colloquium — Dr. Katerina Dontsova \(UArizona\)](#)
- **Mar 25–27:** [AWRA 2024 Geospatial Water Technology Conference: Data to Decisions: Managing & Modeling Water Challenges](#)
- **Apr 1:** [ENVS Colloquium — TBD](#)
- **Apr 2:** [NVIS Spring 2024 Seminar: \[Presentation title TBD\] – Co-sponsored by the WRRC](#)
- **Apr 3–6:** [BSMAR18](#)
- **Apr 8:** [ENVS Colloquium — Dr. Luisa Ikner \(UArizona\)](#)
- **Apr 8–10:** [AWRA 2024 Spring Conference: Water Risk & Resilience: Research and Sustainable Solutions](#)
- **Apr 15:** [ENVS Colloquium — ENVS Undergraduate Presentations](#)
- **Apr 16–17:** [NGWA Conference: Groundwater in the PFAS Era: Stressors, Protection, & Compliance](#)
- **Apr 18:** [Spring 2024 Tumamoc Talk: The Science and Wonder of Arizona Lighting – Ron Holle](#)
- **Apr 22:** [ENVS Colloquium — Dr. Beth Marlowe \(Quest Diagnostic Labs\)](#)
- **Apr 23–25:** [97th Annual AZ Water Conference & Exhibition Annual AZ Water Conference & Exhibition](#)
- **Apr 29:** [ENVS Colloquium — Dr. Jen McIntosh \(UArizona\)](#)
- **May 7:** [NVIS Spring 2024 Seminar: Eleltek Waali \(I'm Reading Country\) – Co-sponsored by the WRRC](#)
- **Jun 10–13:** [AWWA 2024 Annual Conference & Expo \(ACE24\): Transforming Our Water Future](#)
- **Jun 17–20:** [3rd International Groundwater-Agriculture Conference: Toward Sustainable Groundwater in Agriculture - Linking Science and Policy](#)
- **Jul 28–30:** [2024 Arizona Water Reuse Symposium](#)
- **Sep 30–Oct 2:** [AWRA/UCOWR/NIWR 60th Anniversary Joint Water Resources Conference](#)

Do you have a story idea, water job announcement, or event to share?

[Contact us here](#)