

Building resilience to the health impacts of extreme weather and climate-related hazards facing the Southwestern United States and arid regions globally through research and community partnerships and programs.

Research Focus and Priorities



Cores and Research Projects

SCORCH is structured as three cores and two research projects; *Administrative* (overall coordination and fiscal oversight). *Community Engagement* (facilitates partnerships and co-development of research and programming), and *Integrated Data and Visualization* (develops tools and data visualization to support decision-making) and two projects; 1) Greenspace to Build Resilience to Climate Change Impacts on Health Developing an assessment tool to predict potential health outcomes of greenspace design, led by **Shujuan Li, PhD**, Landscape Architecture and Urban Planning, and 2) Heatwaves during Pregnancy, Neurodevelopment, and Resiliency, examining how maternal heat exposure affects long-term neurodevelopment in children led by **Melissa Furlong, PhD**.



SCORCH Principal Investigators (MPIs):

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SCORCH by the Numbers:



38 total trainees, 21 staff



Faculty from 5 colleges



\$250,000 in awarded SEED grant support



Engaged with 90 participants across the state in rural and tribal heat listening sessions



Produced more than 50 abstracts, presentations, publications, and reports



Hosted 56 community outreach events reaching over 5,000 people



Collaborated with 159 organizations on heat-related initiatives

SCORCH Highlights

Building Cross-campus and Community Capacity in Extreme Weather and Health

- Develop public health and climate workforce training module with the Western Regional Public Health Training Center
- Convene workshops to build partnerships with community members and cross-campus faculty
- In partnership with AZ Department of Health Services (ADHS), convene Heat and Medications Taskforce to build awareness of associated adverse synergistic effects among the broader health care provider community and the public.
- Develop interprofessional exercise (IPE) curriculum for the health effects of extreme heat

Decision-support for Community Partners

- Develop infographics to provide decision-maker support related to extreme heat seasonality and trends
- Develop interactive GIS tool to identify heat vulnerability with National Weather Service
- 2024 heat summit recommendations integrated into Governor Hobbs' Extreme Heat Preparedness Plan

Community Outreach and Health

- Partner and collaborate with organizations representing rural, tribal, and urban communities across the nation, providing expertise and technical assistance
- Co-develop educational materials and Science Cafés for community education
- Conduct community listening session on extreme heat and health with rural and urban communities
- Collaborate with City of Tucson and Pima County Health Department to organize the annual Southern Arizona Heat Summit

Transdisciplinary Science

- Convene workshop to initiate co-development of planning tool that predicts health outcomes associated with greenspace designs
- Engage community in photovoice project to share health and greenspace relationships
- Co-develop the PhApp, an all-hazards platform, with We Health corporation in partnership with National Weather Service and ADHS

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