OFFICE OF SUSTAINABILITY
CAMPUS SUSTAINABILITY FUND

Environmental Learning Experiences for Undergrads

Grant Type
Annual Grant

Application Type
Final Application

Project Manager 1 Name
Colin Waite

Project Manager 1 Status
Staff

Project Manager 1 Email
cwaite@arizona.edu

Project Manager 1 Department
Teaching, Learning, and Sociocultural Studies

Project Manager 2 Name
Mariah Kuehl

Project Manager 2 Email
mariahc@arizona.edu

Project Manager 2 Status
Staff

Project Manager 2 Department
Teaching, Learning, and Sociocultural Studies

Project Manager 2 Role
Co-lead

Project Advisor Name

Project Advisor Email

Project Advisor Department

Fiscal Officer
Dawn Brown

Fiscal Officer Email
dawnmbrown@arizona.edu

Fiscal Officer Department Name
Teaching, Learning, and Sociocultural Studies

Requested Funding Amount

Only enter this number after completing the budget sheet (the budget template will round up your request).
Mini Grants may request $250 up to $5,000.
Annual Grants may request $5,001 up to $100,000, and up to three years of funding.

Year 1:
$16600

Year 2:
$16600

Year 3:

Project Name
Environmental Learning Experiences for Undergrads

Primary Project Category
Social Sustainability (including Social/Environmental Justice)

Secondary Project Category
Natural Environment

Background and Context

Please provide relevant background about your organization/team including your mission and/or expertise. Lay out the rationale for the proposed project, focusing on the issue that your project would address. You may also share how the project is new or how it complements, builds upon, or scales existing initiatives. This section is meant to give us more information about you and the context for the project, while the questions below provide space to go into detail about your proposal's plan and specifics.

Response:

The Cooper Center for Environmental Learning (Cooper Center) is an outreach project of the College of Education, focused on educating and inspiring people of all ages to live more lightly on the Earth

through campus outreach, community events, professional development for current and future educators, research, and Camp Cooper, a living classroom in Tucson's desert foothills, run in partnership with Tucson Unified School District (TUSD). Each year, more than 3,000 children visit Camp Cooper for hands-on, outdoor lessons and activities designed to inspire youth to care about the environment by revealing the science and wonder of nature. More than 90% are impoverished, with limited access to real world, nature-based experiences. These experiences are key extensions of science education in the classroom, and they inspire each child to live more sustainably in our community. Operating since 1964 and today funded almost entirely by grassroots donors and private grants, Camp Cooper now often hosts the grandkids of its earliest students, welcoming a third generation to its 150,000 alumni around the world.

As has been clearly outlined during the development of the University's Sustainability and Climate Action Plan, strengthening Campus Culture and Engagement around environmental issues is pivotal in the achievement of our goals. One key element in this area is providing experiential learning opportunities for undergraduate students. Cooper Center requests support from the Campus Sustainability Fund to continue offering paid student worker positions to undergraduates, so that they can be an active part of our work to inspire our next generation of environmentally responsible citizens and leaders. We will prioritize the hiring of students from underrepresented and underserved communities, those who are often marginalized from outdoor experiences. In 2020, Cooper Center worked with the College of Education's Diversity, Equity, and Inclusion Coordinator to create more inclusive position descriptions and to identify new strategies for marketing and promoting opportunities. These efforts resulted in the successful hiring of three full-time employees from underrepresented communities, who have brought new perspectives and experience to our team. We will employ these same strategies in the hiring for these student worker positions.

Student workers will directly engage with PreK-12 students from across Southern Arizona alongside Cooper Center's full-time education team. They will learn best instructional practices for working with children outdoors and gain valuable experience. At the same time, they will build their own love and appreciation for the natural world and be inspired to live more lightly and sustainably as a part of it. They will share this newly kindled love and responsibility with their fellow University students through a combination of planned and informal activities.

Project Description

Please provide a thorough description and explanation of your project. Be explicit in what your team is proposing. What will your project's outcomes be and how will you achieve them? Outcomes should be specific, measurable, achievable, realistic, and timely.

Response:

For UA to realize a campus culture that prioritizes sustainability and actions that live more lightly on our planet, students, faculty, and staff need to better understand their relationship with the Earth and the impact they have on the natural systems. This can only be achieved through rich, firsthand contact with the natural world that fosters a love and appreciation for all living things and the knowledge that everything on our planet is connected in the web of life. Every action that a person

takes can have a positive or negative impact on the rest of that web, and the choices that we make determine those impacts.

Cooper Center seeks to engage UA undergraduate students in ways that will inspire them to act more sustainably and to share their personal knowledge and experience with the children of Southern Arizona. Experiential learning opportunities related to environmental learning, sustainability, and climate change at UA are not currently plentiful enough to adequately meet the goals of the newly proposed Sustainability and Climate Action Plan, and we are strategically placed to offer opportunities in this area.

With support from CSF, Cooper Center will continue to offer two student worker positions for undergraduates . Opportunities and associated funding were lost during the pandemic and reinstated in 2024. These students will work closely with Cooper Center's full-time educators to learn our field trip programs and engage with children from local schools. As they gain experience and confidence, the student workers will take on leadership roles with our activities, with assistance from our full-time staff. Cooper Center's PreK-12 programs combine key ecological understandings with immersive experiences that foster a love of the Sonoran Desert for each child. They are age-appropriate and student-centered.

Throughout the 30 weeks of their position, each student worker will share their experiences at Camp Cooper in ways that highlight their work on campus with students, faculty, staff, and in the broader community. Sharing will take place through a variety of channels, including social media, news outlets, events, newsletters, email networks, and more.

Our goal is for Cooper Center to have student workers at Camp Cooper on an annual basis. During the current 2024-2025 Academic Year, we have hosted two students with support from CSF, and overall, the experience has been successful, providing us with guidance on best practices for next year and beyond. We have reduced our projections to 15 hours per student per week in this proposal, as they are generally unable to work more with full class loads. We're making improvements to our onboarding and support process for student workers, given feedback by this year's students. One of our students did leave their position in November for personal and academic reasons, and after a new hiring process, we were able to add a new student in February.

Timeline

Please provide a timeline breakdown for the key steps in your project. The timeline can be basic, but please include anticipated timeframes for each major step, including any key dates for when certain elements must start or be completed. The timeline can be in list format.

Response:

This proposed timeline is based on the outcomes of our pilot 2024-2025 year and would be instituted for all future years of the undergraduate student worker positions. It will be flexible based on the needs of the positions and changes with Cooper Center programs.

June – August: Student Worker Position Posting, Advertisement, Candidate Review, Interviews, Hiring
September: Student Workers will begin employment and complete orientation with Cooper Center full-time staff, reviewing educational program materials and assisting with early season field trips.
October – December: Student workers will assist with educational programs at Camp Cooper and as they become comfortable in working with children, take on more leadership of activities with assistance from Cooper Center staff. They will also work with Cooper Center staff in planning engagement activities for UA students, faculty, and staff on/near campus and at Camp Cooper. These activities will take place during the spring semester.
January – April: Student workers will continue as part of the educational program team while planning and facilitating engagement activities, culminating with experiences at Camp Cooper and on campus during Earth Week in April.
May: – Completion of student worker positions with debriefing, reflection, and planning for future student worker experiences.

Budget Narrative

Use this section to provide supplemental justification for the items you are requesting on your budget sheet. Please break down your justifications into the budget categories: Personnel or operating budget. Do not list out each expense or repeat notes made in the budget template, but instead address why the line items are being requested and the purpose they will serve, providing elaboration when necessary.
If you are requesting funding for personnel, use this section to elaborate on the position you are creating and how the budget and timeline was established for it. If you plan to hire students, describe in what capacity. Describe relevant details thoroughly (wages, responsibilities, duration of job, extent of involvement, how you will solicit/ market these opportunities etc.).
Ensure the descriptions match the line items in the budget sheet.
If matching or supporting funds are secured for the project, identify the source and amount in this section, and detail the impact of the matching funds on your overall budget.

Response:

Cooper Center is requesting Personnel funding for two undergraduate student worker positions, including hourly wages and ERE, for the 2025-2026 and 2026-2027 Academic Years. These positions will begin in September and end in late April/early May, approximately thirty weeks of employment when considering exam weeks and breaks. We anticipate funding two undergraduate students at $18/hour for 15 hours per week but will consider breaking up the total hours differently depending on student interest and availability.

Cooper Center will provide in-kind support in the form of student worker supervision, as well as funding for participation in special events and other marketing and promotional opportunities associated with sharing the students' work and experiences with the campus community.

Students will be hired to work with full-time Cooper Center staff in the facilitation of field trip programs for local elementary school children at Camp Cooper, located 20 minutes west of the main UA campus in the Tucson Mountains. Students will begin by assisting full-time staff with programs and gradually progress to activity leadership. With support from Cooper Center's Marketing

Coordinator, students will share their experiences to promote campus engagement around sustainability and environmental learning, using a variety of platforms. Students will also work with Cooper Center full-time staff to coordinate and facilitate events on campus and at Camp Cooper, and they will attend other community events as ambassadors of our programs. Students will also assist with behind-the-scenes tasks at Camp Cooper, including curriculum and activity development, prop creation and maintenance, creation of materials for programs and marketing, and community relations and collaboration.

These positions will be advertised using cross-campus networks to promote beyond the traditional sustainability and environment communities. We will coordinate with campus marketing and communications and work through our partners in the College of Education to reach all departments and programs in the Tucson metropolitan area. We will also work with partners in other campus areas, including Housing and Residence Life and Greek Life.

Project Feasibility and Logistics

The Campus Sustainability Fund will only fund projects that have completed the necessary work to ensure they can succeed, be completed in the grant's timeline, or have an accurate budget.
Please provide a description of the work that has been completed so far to make this project feasible. Please provide a description of the work that has been completed so far to make this project feasible. If relevant partners have been contacted/coordinated with, please identify them in your response.
For example, have you received consent or authorization to complete your project (such as from Housing and Residence Life, Facilities Management, Parking and Transportation, etc.)? If you are making modifications to campus, do you have written authorization or official quotes from Facilities Management to accurately identify the cost of labor and supplies?

Response:

Cooper Center has over 15 years of experience in working with undergraduate students in paid positions, internships, course and practicum work, and volunteer opportunities. Our organization strongly values a relationship with University students that is mutually beneficial and prioritizes the student experience. Cooper Center Director Colin Waite has worked with UA students since 2008, and Program Coordinator Mariah Kuehl since 2019. As an outreach program of the College of Education and the Department of Teaching, Learning, and Sociocultural Studies, Cooper Center has systems in place for hiring students and managing them during employment, as well as access to dedicated finance managers for the management and use of funds.

When funding is allocated, Director Waite will meet with department human resources and finance managers to begin the process and set up the student worker positions. A job description will be created, and the positions will be created and advertised. Advertising the open positions will be supported by Cooper Center's Marketing Specialist, Rowan Cassarly, to ensure that we reach the broadest audience of UA students possible, including traditional promotion through Handshake, cross-campus networks and email lists, social media, and tabling at events. Director Waite and Program Coordinator Kuehl will facilitate the candidate review and interview process with support from Cooper Center's other full-time staff members.

Environmental Sustainability Outcomes

Please provide a description of how you expect your project to advance environmental sustainability on campus. A definition of environmental sustainability is provided on our Guides and Tips page.

Response:

The first step to achieving environmental sustainability on campus is to educate the constituents involved, including students, faculty, staff, and campus visitors. Each member of our community needs to be personally and professionally invested in living more lightly on our planet, and immersive learning experiences for students is an effective method of education.

The student workers will work with Cooper Center's full-time educators to facilitate field trip programs using detailed lesson plans and prepared materials. They will lead group discussions and hands-on explorations of our desert classroom that focus on interrelationships between living and nonliving things, adaptations for survival, cycling of air, water, and soil, short-term and long-term change, and energy flow through natural systems. All of Cooper Center programs build on the new understandings and experiences that children acquire to inspire them to live more sustainably. Children are encouraged to make small changes to their lifestyles, including using energy and natural resources more wisely, spending more time in nature, and sharing what they've learned with others. The student workers will experience these programs for themselves as well, gaining their own new understandings, experiences, and inspiration.

As campus understanding of and investment in environmental sustainability increases, we the UA community will create a culture of sustainable action and living that will serve as a model for our local, regional, state, national, and global communities.

Social Sustainability Outcomes

Please provide a description of how you expect your project to advance social sustainability on campus. A definition of social sustainability is provided on our Guides and Tips page.

Response:

Cooper Center's educational programs focus on Title I schools, which serve impoverished students and families. More than 90% of the students we serve qualify for Free and Reduced Lunches and other social services. By working with these schools, Cooper Center is able to provide access to experiences in nature for children in families that might not otherwise have the opportunity. During the past four years, our programs have been redesigned to be more culturally responsive and inclusive, with support from the TUSD Culturally Responsive Pedagogy and Instruction Department. This has centered our programs around the lived experiences of our students and their families, making each activity more engaging. We use a Universal Design for Learning (UDL) approach that has recently become a very successful advancement in the field of environmental education. Our full-

time staff members have participated in professional development focused on best instructional practices and content related to social justice and the environment. Cooper Center also designs its programs to facilitate physical, mental, and emotional wellbeing for its participants and staff.

UA students working with Cooper Center will experience the sense of community that comes with working with children and sharing the wonders of our Sonoran Desert with them. By participating in the education of these children, they will be inspiring our next generation of environmentally responsible citizens and leaders. Our goal is to have support from the Campus Sustainability Fund restart paid student engagement at Cooper Center, and once we have proof of the program's success and impact, we will be able to obtain a more permanent source of funding. This would establish student opportunities at Cooper Center as a reliable component of building campus culture and engagement around sustainability.

Student Leadership & Involvement

Please provide a description of how your project will benefit students on campus regarding the creation of leadership opportunities or student engagement. What leadership opportunities exist within your proposal? If you plan to seek student involvement, include relevant details thoroughly and how you will solicit/ market these opportunities.

Response:

Students who work at Cooper Center will share their experiences in ways that establish them as ambassadors for sustainability on campus and in the communities we engage with. Regular marketing and promotion of each student's experience will be a key component of their work with us, utilizing social media and other channels that are widely used by our campus audiences – students, faculty, staff, and community members. During our work with this year's student workers, Cooper Center has collaborated with CSF and the Office of Sustainability on social media related to the project, highlighting its success, the opportunities that it provides in experiential learning, and the impact it is having on our community.

As each student worker gains experience in working with Cooper Center programs and the children we serve, they will in turn lead activities and share their knowledge and passion for the environment. The student workers will directly engage with groups of 5 – 60 PreK-12 students during each field trip, managing hands-on experiences that connect each learner with our desert classroom. This leadership will vary by age and program. For example, when working with preschool-aged children, the students will bring small groups of kids into Camp Cooper's nature play space. They will help the kids "play" with desert objects and use simple tools like magnifying lenses and paint brushes to engage with the environment and express themselves. In one of our upper elementary programs, student workers will lead children in their adventures as desert detectives, identifying clues and evidence that explains how plants and animals are adapted to their desert environment.

With all field trip groups, the students will model sustainable behaviors and lead our visitors in making lifestyle choices that are more in harmony with the natural world. At Camp Cooper, they will help the kids with composting, energy and water conservation, and wise use of materials. The student workers will also lead the kids in discussions about sustainable choices at home, school, and

in their neighborhood.

Education, Outreach, and Behavior Change

What opportunities does this project provide for members of the campus/community to learn about sustainability? How will your project educate the campus community and/or incorporate outreach and behavior change, particularly those who are not currently engaged with sustainability or environmental work? Please provide a description of how you expect your project will communicate its impacts to the campus community.

Response:

Environmental educators around the world influence widespread behavior change in individuals, families, communities, governments, corporations, and societies. By inspiring each of our program participants to live more lightly on the earth through immersive learning experiences that foster a love for the environment, Cooper Center is growing the next generation of environmentally responsible citizens and leaders for Southern Arizona and beyond. By extending our presence throughout the UA community, we are able to reach an even larger audience and have a greater impact on the world.

In research and program evaluation that has been ongoing since 2008, Cooper Center programs have been shown to increase ecological understandings and positively influence environmentally related behaviors and attitudes in statistically significant ways. This research, conducted by Professor of Environmental Learning and former Dean of the College of Education Bruce Johnson, has been published worldwide and recognized for its lasting impact on the world of environmental education. UA students working at Cooper Center will be a part of this work, ensuring a more sustainable future for our program participants. As these UA students experience the programs, they will also be impacted, and we will be to have them share what they learn and experience throughout the campus community.

The jobs themselves will target students beyond the “sustainability choir,” hiring individuals who have not previously had opportunities to experience environmental learning in action. We will use cross-campus networks to advertise our job openings and utilize a hiring rubric with these goals in mind. As previously mentioned, reaching all audiences at UA is critical if the goals of the Sustainability and Climate Action Plan are to be realized.

Cooper Center will also collaborate with other campus units, including CSF, to tell the stories of our student workers as they participate in the project. Current student Maria is a double major in French and Sustainable Built Environments. When asked about her favorite parts of the experience so far, she shared “I love engaging with the kids and learning with them. It is amazing seeing kids excited about nature and falling in love with it. I learn something new every day!” Maria has shared with our team that she is actively searching for positions in environmental education after her graduation in May. In her first three months on the Cooper Center team, she engaged with 620 PreK-12 students during field trips and helped to facilitate a very successful Family Nature Day, where 25 students from the UA Early Childhood Education program led activities with young kids and their families. Our goal is to use experiences like Maria’s to inspire other UA students, faculty, and staff, to pursue their

own opportunities to enjoy and learn about the wonders of our Sonoran Desert and to think more critically about their environmental impacts.