

ASSOCIATION OF AMERICAN COLLEGES & UNIVERSITIES

AAC&U STRATEGIC GOALS

- Champion faculty-engaged, evidence-based sustainable models and strategies for promoting **quality** in undergraduate education.
- Advance **equity** across higher education in service to academic excellence and social justice.
- Lead institutions and communities in articulating and demonstrating the value of liberal education for work, life, global citizenship, and democracy.
- Catalyze reform in higher education to emphasize discovery and innovation as fundamental aspects of a liberal education.



*Association
of American
Colleges and
Universities*

WHO THEY ARE

AAC&U is the leading national association dedicated to advancing the vitality and public standing of liberal education by making quality and equity the foundations for excellence in undergraduate education in service to democracy. Its members—as institutions and as individuals—are committed to extending the advantages of a liberal education to all students, regardless of academic specialization or intended career. The 1400 institutional members of AAC&U include accredited public and private colleges, community colleges, research universities, and comprehensive universities of every type and size.

WHAT THEY DO

AN AAC&U SIGNATURE INITIATIVE: MAKING EXCELLENCE INCLUSIVE

This initiative is designed to help colleges and universities integrate diversity, equity, and educational quality into their missions and institutional operations. AAC&U endeavors to develop “equity-minded practitioners” willing to engage in the necessary, and sometimes difficult, conversations and decision-making that can lead to transformational change for student learning and achievement.

Diversity: Individual differences (e.g., personality, prior knowledge, and life experiences) and group/social differences (e.g. race/ethnicity, class, gender, sexual orientation, country of origin, and ability as well cultural, political, religious, or other affiliations).

Inclusion: The active, intentional, and ongoing engagement with diversity...in ways that increase awareness, content knowledge, cognitive sophistication, and empathic understanding of the complex ways individuals interact within systems and institutions.

Equity: The creation of opportunities for historically underrepresented populations to have equal access to and participate in educational programs that are capable of closing the achievement gaps in student success and completion.



RESEARCH & RESOURCES

- <https://www.aacu.org/>
- <https://www.aacu.org/making-excellence-inclusive>



COALITION FOR NETWORKED INFORMATION

CNI & LEARNING SPACES

Libraries for the 21st century are transforming their spaces in synergy with developments in technology and pedagogy. While print and quiet spaces continue to have their place, the rapid developments of digital content resources, the ability to access global information resources from anywhere, and the new emphases on active learning and undergraduate research are fueling the re-envisioning of library programs and spaces.

The information or learning commons was the earliest manifestation of this trend, transforming large, quiet reference rooms into collaborative, active technology-enhanced spaces for learning.

Libraries are recognized for becoming:

- A prime venue for all students beyond traditional classrooms and labs.
- Inclusive spaces, serving a diversity of students, student needs, and approaches to learning—active, collaborative and social, as well as for solo, reflective learning.
- Community spaces, showcasing the arts, hosting cultural events, and serving as iconic spaces on a campus.
- Spaces in which all users have the means—including technologies and expert staff—to become content creators, not merely content consumers.



Coalition for Networked Information



The Edge
Duke University

WHO THEY ARE

The Coalition for Networked Information is dedicated to supporting the transformative promise of digital information technology for the advancement of scholarly communication and the enrichment of intellectual productivity.

WHAT THEY DO

CNI helps member organizations in their strategic planning efforts, identifying key developments, signaling critical trends and providing environmental scans.

Through annual meetings and publications, the organization provides opportunities for members to learn about the latest technologies, fostering collaborations across the wide diversity of sectors within the CNI membership.

Through publications and reports, CNI alerts members to the most current information of import to its community.



Marc Hall of University Communications
North Carolina State University

RESEARCH & RESOURCES

- <https://www.cni.org/>
- <http://pkallsc.org/partners/coalition-networked-information-cni>



THE COUNCIL OF INDEPENDENT COLLEGES

CIC

- Strengthens leadership of current presidents and their spouses through carefully structured opportunities for reflection and dialogue on mission and vocation.
- Prepares emerging leaders with the knowledge, skills, and experiences germane to the portfolio of responsibilities central to the work of a president.
- Offers an annual Institute for Senior Administrators (CAOs, CFOs, and CEOs) for learning how to intentionally collaborate in leading teams of colleagues in pursuit of institutional goals.
- Focuses on national priorities through institutes on diversity, civility, and the liberal arts in which participants develop realistic plans to enable their home campuses to strengthen diversity and civility on campus—inside and outside the classroom.
- Focuses on national priorities for student learning through a new initiative on active-learning in introductory courses in biology, chemistry, and physics.



THE COUNCIL OF
INDEPENDENT COLLEGES

WHO THEY ARE

The Council of Independent Colleges (CIC) is an association of nonprofit independent colleges and universities that has worked since 1956 to support college and university leadership; advance institutional excellence; and enhance public understanding of private higher education's contributions to society.

WHAT THEY DO

CIC is the major national organization that focuses on providing services to leaders of independent colleges and universities as well as conferences, seminars, and other programs that help institutions to improve the quality of education, administrative and financial performance, and institutional visibility. CIC also provides support to state fundraising associations that organize programs and generate contributions for private colleges and universities.

CIC is the major national organization that focuses on providing services to leaders of member institutions through a comprehensive set of conferences, seminars, research initiatives, and special programs designed to enhance the quality of education on their campus, promote high quality administrative and financial performance, and enhance institutional visibility.

CIC focuses its efforts on supporting college and university presidents and provosts in their efforts to advance their institutions through the annual Presidents Institute and the Institute for Chief Academic Officers. Programs for other campus leaders, including faculty members, department and division chairs, and mid-level staff aspiring to fill cabinet-level positions also are offered.



The creation and transformation of learning spaces on campus, including library spaces, laboratories, studios, and classrooms and the technologies that enhance them are of interest to CIC and its member institutions. Sessions on these ideas are offered at both Institutes periodically.

RESEARCH & RESOURCES

- www.cic.edu
- www.cic.edu/resources-research/research-studies-reports
- www.cic.edu/resources-research/charts-data



COUNCIL ON UNDERGRADUATE RESEARCH

CUR & LEARNING SPACES

The Council on Undergraduate Research (CUR) is an affiliation of academic institutions serving undergraduate students, their faculty and others committed to providing robust research opportunities in all disciplines for undergraduates throughout their career as learners. Started in 1978 by ten chemists from predominantly undergraduate institutions,

CUR was among the earliest STEM reform communities in our nation. It was sparked by informal discussions among like-minded faculty about what promoted student interest and success in science and mathematics: mentoring, learning by doing, becoming socialized into a community of practice. Undergraduate research is an exemplar of today's active-learning movement.

With 13,000 members from more than 900 institutions, CUR is a truly multi-disciplinary organization, with 11 disciplinary divisions embracing arts and humanities, all STEM disciplines, and two administrative divisions. CUR's Strategic Pillars are:

- Integrating and Building Undergraduate Research into Curriculum and Coursework
- Assessing the Impact of Undergraduate Research
- Diversity and Inclusivity
- Internationalization
- Innovation and Collaboration.



WHO THEY ARE

CUR's mission is to support and promote high-quality undergraduate student-faculty collaborative research and scholarship.

WHAT THEY DO

CUR provides a variety of programs, services, and advocacy to its members, including professional development institutes for faculty, a peer-reviewed journal, online communities of practice, a *Posters on the Hill* showcase of undergraduate researchers, and a National Conference that draws more than 4,000 participants per year.

QUESTIONS THEY ASK

- How can CUR engage stakeholders in promoting the value of undergraduate research for students in all disciplines throughout their undergraduate career?
- How can we use CUR's robust undergraduate research community, and its models of best practice, to communicate the value of undergraduate research in colleges and universities?
- How can CUR support efforts to assess the impact of undergraduate research on the individual learner, on faculty, and on the institution?
- How can CUR advance collaborations between higher education and community partners that highlight the diversity and impact of undergraduate research communities of practice?
- How can CUR nurture leaders in undergraduate research, and support them in shaping the future of CUR and transforming lives of 21st century students?

RESEARCH & RESOURCES

- <https://www.cur.org/>



INTERNATIONAL COUNCIL OF FINE ARTS DEANS (ICFAD)

QUESTIONS THEY EXPLORE

- Can a more effective integration of educational experiences in all disciplines—particularly in the arts, humanities, sciences, and engineering benefit all our nation's citizens? (2018 Conference Program)
- How can diversity and inclusion efforts within our academic areas of responsibility contribute to a healthier professional and educational environment? What can we collectively do with the resources we have to ensure our students, faculty and staff feel safe, respected, embraced, and supported? (2018 Conference Program)
- How do we best equip faculty and students to confront challenges with creative confidence? How can institutions support mutually beneficial interdisciplinary approaches that spur new, high impact-and innovative solutions to problems facing our world? (2017 Conference Program)



RESEARCH & RESOURCES

- <https://www.icfad.org/>
- <https://www.pkallsc.org/the-international-council-of-fine-arts-deans-icfad/>



ICFAD

THE INTERNATIONAL COUNCIL OF FINE ARTS DEANS
A MULTI-NATIONAL ALLIANCE
OF EXECUTIVE ARTS ADMINISTRATORS

WHO THEY ARE

Founded on a shared passion and advocacy for the arts in education and a commitment to excellence in leadership, the International Council of Fine Arts Deans (ICFAD) is a multi-national alliance of executive arts administrators representing institutions of higher education. ICFAD provides professional development opportunities and facilitates forums for the exchange of ideas, information and issues of common concern, striving to strategically advance the importance of the arts in higher education on campuses around the world.

WHAT THEY DO

Based on their motto of deans helping deans, ICFAD

- unites and serves executive arts administrators who are committed to providing undergraduate and graduate learners an environment for learning in which art is a vital, integrated part, an environment in which all learners—no matter their major—have the opportunity to be engaged and inspired by that experience
- strives to provide a foundation that allows arts administrators to do their jobs better and to expand their circle of contacts with people from diverse backgrounds, sharing new ideas and innovations developed by colleagues, through a deep sense of commitment to building community
- focuses increasingly on innovative international programs.

"In the STEM world we inhabit, research and innovation are seen as the domain of the sciences and technology, even as the values of art—creativity, collaboration and imaginative engagement with the unknown—are prized," states Todd London, one of the original principal investigators on the grant. "This culture is both our challenge and opportunity, and we see these research-directed creative residencies as a way forward, both to serve our fields and to champion the values of art in the culture at large."

— Conference Program: The 55th Annual Conference of the International Council of Fine Arts Deans



NATIONAL ASSOCIATION OF COLLEGE AND UNIVERSITY BUSINESS OFFICERS

STRATEGIC PRIORITIES

- Engage higher education institutions in undertaking necessary transformations to strategically position themselves in the dynamic higher education environment
- Increase proactive advocacy
- Drive effective solutions in higher education
- Strengthen the strategic leadership role of the CBO
- Lead higher education's integration of analytics to achieve institutional strategic goals.



WHO THEY ARE

The National Association of College and University Business Officers (NACUBO), founded in 1962, is a nonprofit professional organization representing chief administrative and financial officers at more than 1,990 colleges and universities across the country. Last year, our member institutions in the United States had over 10.9 million full time equivalent students and had more than a \$459 billion impact on the economy. NACUBO convenes those influencing and advancing higher education, is a catalyst of unmatched knowledge, and is a leading advocate for colleges and universities.

WHAT THEY DO

Lead higher education's integration of analytics to achieve institutional strategic goals. Success indicators:

- NACUBO, in collaboration with key association and business partners, has disseminated a comprehensive body of knowledge, foundational concepts, and best practices methodologies for effective analytics in higher education.
- Institutions have increasingly adopted NACUBO's frameworks and definitions to enhance the quality, reliability, and consistency of data and to improve comparability across higher education.
- Institutional leadership teams use NACUBO's model organizational and governance structures to improve data management and analytics operations and to foster a culture in which they are trusted resources in the institutional decision making process.



RESEARCH & RESOURCES

- Finance, Planning & Budget, Student Financial Services, Tax and Other Business Areas) Research, Publications, Advocacy, Leadership Initiatives, Membership
www.nacubo.org
- <https://www.nacubo.org/who-we-are/strategic-blueprint>
- <https://www.businessofficermagazine.org/>



PROJECT KALEIDOSCOPE

PKAL VALUES

As the center for the reform of undergraduate STEM education within AAC&U, PKAL values:

- Core undergraduate teaching and learning that is deeply rooted in the traditions in the traditions of a liberal education.
- Evidence-based approaches to professional development for STEM faculty that honor, and are appropriately grounded within, the complex relationships that exist between and among institutional contexts, professional aspirations, and personal perspectives
- Excellence in undergraduate STEM teaching that is evidence-based, interactive, inclusive, and culturally sensitive and responsive.
- Courageous leadership that embraces diverse perspectives with authenticity and legitimacy.
- Effectiveness in leadership development for STEM faculty that is intentionally introspective, reflective, and holistic in approach.
- Communities of practice that support and energize the development of a national platform for expanding the STEM higher education reform knowledge base.



**PROJECT
KALEIDOSCOPE**

Teach. Lead. Know. *Differently.*

WHO THEY ARE

Project Kaleidoscope (PKAL) is AAC&U's STEM higher education reform center dedicated to empowering STEM faculty, including those from underrepresented groups, to graduate more students in STEM fields who are competitively trained and liberally educated. PKAL also works to develop a scientifically literate citizenry as part of its commitment to principles and practices central to AAC&U's Liberal Education and America's Promise (LEAP) initiative.

Since its founding in 1989, PKAL has been one of the leading advocates in the U.S. for transforming undergraduate STEM teaching and learning. To date it has empowered an extensive network of over 70,000 STEM faculty and administrators committed to the principles, practices, and partnerships that advance cutting-edge, integrative STEM higher education for all students. To that end, all PKAL undertakings are uniquely designed to foster quality, diversity, and social responsibility.

WHAT THEY DO

Strategies:

- Develop and disseminate new resources, tools and evidence-based practices for quality undergraduate STEM teaching
- Build the infrastructure for leading and sustaining a national network of regional communities and meetings that provide opportunities for STEM faculty to be exposed to cutting-edge advances in undergraduate STEM teaching
- Foster and support the short- and long-term leadership development of STEM faculty.

RESEARCH & RESOURCES

- <https://www.aacu.org/pkal>
- <https://www.aacu.org/pkal/publications>



SCIENCE EDUCATION FOR NEW CIVIC ENGAGEMENTS AND RESPONSIBILITIES

SENCER

- Connects science and civic engagement by teaching through complex problems.
- Invites students to put scientific knowledge and the scientific method to use on matters of immediate interest to students.
- Locates the responsibilities, challenges, and pleasures of discovery as the work of the student.
- Fosters both STEM learning and 21st century civic skills:
 - Ethical reasoning,
 - Critical thinking,
 - Evidence-based, unscripted, problem-solving,
 - Technological and quantitative literacy, and
 - Teamwork and effective communication.
- Approaches regard the learning environment as both conceptual and physical “civic space” that conveys and establishes the “pathways” for learning and for producing knowledge.
- Approaches reflect an understanding of how the physical environment shapes the relationships, hierarchies, roles, and responsibilities of the learner.
- Fosters embodied learning for all.



WHO THEY ARE

SENCER is the signature initiative of the National Center for Science & Civic Engagement at Stony Brook University. Established in 2001, SENCER is a national STEM reform initiative funded by NSF to promote teaching science through pressing civic challenges of immediate interest to students.

Over 4000 participants from 500 institutions are part of the SENCER community. These individuals and campuses are working to make STEM learning real, relevant, rigorous, and responsible; their mission is to empower citizens as responsible lifelong learners who can apply the knowledge, values, and methods of science to the complex civic challenges facing our democracy.

WHAT THEY DO

SENCER offers workshops on faculty development and course design. SENCER prepares and disseminates curricular models, assessment tools, teaching guides, and research reports. SENCER models provide examples of field-tested courses that teach science content in the real-world contexts of policy, ethics, history, economics, psychology, culture, and law.

QUESTIONS THEY ASK

- How can learning spaces facilitate connections between academic and civic life?
- How can the built environment empower, rather than inhibit, all USERS (students, faculty, community members) as they learn and co-create new knowledge and solutions for our complex civic challenges?
- How does SENCER disrupt or transform the “normalized” approach to STEM teaching?

RESEARCH & RESOURCES

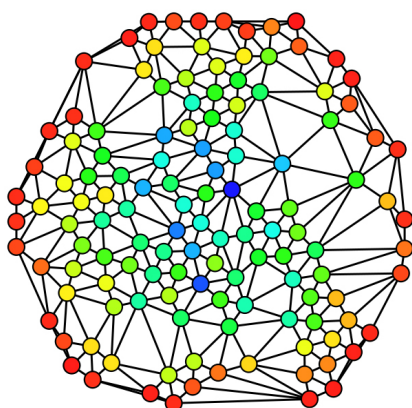
- <https://sencer.net>
- <http://serc.carleton.edu/>
- <http://www.pkallsc.org/partners/sencer>



SCIENCE EDUCATION RESOURCE CENTER (SERC)

SERC

- Supports educators with transformative websites, workshops, and webinars, conducting research to develop effective pedagogy, and testing the most effective ways of implementing change in the classroom.
- Collects and hosts community-developed teaching resources, many vetted through a peer-review system, that utilize effective pedagogies.
- Works with professional societies and educational organizations to improve education through collective action.
- Supports interactions within and across communities as diverse as economics faculty, numeracy advocates, climate educators in all venues, geoscience department chairs, leaders of STEM education centers and leaders of STEM education efforts within disciplinary professional societies.



Inter-institutional Networks

RESEARCH & RESOURCES

- <https://serc.carleton.edu>
- <https://serc.carleton.edu/highered/>
- <https://serc.carleton.edu/sp/>

SERC the Science Education Resource Center at Carleton College



WHO THEY ARE

The Science Education Resource Center is a grant-funded office at Carleton College. Founded in 2002, SERC has partnered with leaders in higher education across the country on over 100 education projects across the STEM disciplines and allied fields. Engaging participants from more than 1,000 institutions of higher education, as well as K-12 curriculum developers and teachers, SERC is home to a wide array of award winning education websites that make it one of the world's largest online collections of pedagogic resources.

WHAT THEY DO

SERC programs address barriers to pedagogical and organizational change, a goal established in recognition of systemic barriers to meaningful and sustainable change on college and university campuses across the country. As noted by leaders in the QUIRK (Quantitative Inquiry, Reasoning, and Knowledge) initiative at Carleton College:

- [The fundamental barrier] is inertia, the tendency to keep doing what has been done in the way it has always been done. It takes energy to change and the key to engaging people is to help them become part of a larger cohort of allies who work toward a common vision and, thus, have a collective stake in making something new happens.
- Even when open to change, potential early adapters are not clear about resources needed to explore or adapt new practices, about the process by which to do so, or the politics of making substantive change.

SERC & PLANNING SPACES FOR LEARNING

- SERC offers a rich array of online resources, face-to-face, and virtual opportunities for faculty to learn about developing, implementing, and assessing new pedagogical practices that will be embraced by new or repurposed spaces.
- These SERC opportunities are an example of the growing depth and breadth of on-site and virtual opportunities within higher education that inform and inspire undergraduate faculty to move beyond current practice in shaping the experience of learning for undergraduates.



VENTUREWELL

VENTUREWELL

Brings a tradition of asking audacious questions about what students should be and be able to do upon graduation to the discussion of how spaces matter. Initially grounded in engineering disciplines, their programs reflect visions set forth in *The Engineer of 2020* about the characteristics and qualities of graduates in the future including the following:

Creativity (invention, innovation, thinking outside-the-box, art) is an indispensable quality for engineering, and given the growing scope of the challenges ahead and the complexity and diversity of the technologies of the 21st century, creativity will grow in importance.

That vision of what learners are to become has been translated by the VentureWell community into spaces for making, loosely described as spaces where students can hash out ideas and bring inventions to life.

Makerspaces are identified by a creative diversity of titles:

- *The Alley*
Michigan Technological College
- *Starting Point*
University of Puerto Rico
- *Spark Innovation Studio*
Kent State University
- *The Innovation Studio*
Ohio State University

RESEARCH & RESOURCES

- <https://venturewell.org/>
- <http://pkallsc.org/partners/venturewell>
- Report on Places of Invention: The First Lemelson Institute - <http://invention.smithsonian.org/downloads/lemelson-inst-report.pdf>
- <https://venturewell.org/makerspace-masters/>
- <https://www.nap.edu/catalog/10999/the-engineer-of-2020-visions-of-engineering-in-the-new>



WHO THEY ARE

VentureWell, formerly known as the National Collegiate Inventors and Innovators Alliance (NCIIA), is a private 501(c)(3) organization that funds and trains faculty and student innovators to create successful, socially beneficial businesses. The organization's mission is to create experiential learning opportunities for students and to catalyze student-led ventures that create positive social and environmental impact.

VentureWell is a community that envisions a world in which science and technology innovators have the support, training, and access to networks and resources essential to solving the world's most difficult problems.

For over 20 years, VentureWell has worked to support, train, and foster networks to ensure that the next generation of science and technology innovators realize—and maximize—their potential in bringing their innovative ideas to impact.

Through generous grants and groundbreaking conferences, faculty change agents are empowered to develop programs that cultivate and support a national pipeline of inventors, innovators, and entrepreneurs. VentureWell initiatives promote institutional change at the campus level and strengthen the innovation and entrepreneurship ecosystem nationwide.

WHAT THEY DO

Foster collaboration among the best minds from research labs, classrooms and beyond to advance innovation and entrepreneurship education and to provide unique opportunities for STEM students and researchers to fully realize their potential to improve the world.

Support and work directly with a variety of early stage innovators to help them bring their ideas to market through workshops, teaching, coaching, and mentoring.

Enable powerful approaches to stimulating science and technology invention, innovation, and entrepreneurship on university and college campuses, and move the strongest ideas rapidly forward to commercialization.

