URSA
UNDERGRADUATE RESEARCH & SCHOLARLY ACTIVITY

Undergraduate research is a high impact practice that enhances student engagement, retention, completion and success

URSA Activities

- **URSA Student Project Awards** — Funding for original research and creative scholarly projects pairing undergraduates with faculty mentors at all UAF campuses.

- **URSA Student Travel Awards** — Funding for travel by undergraduates to support or present their original research.

- **URSA Mentoring Awards** — Funding for mentors (faculty, postdoctoral researchers, graduate students) to enhance or develop opportunities for undergraduate research, especially recurring opportunities.

- **URSA Innovative Technology & Education Awards** Funding to enhance the educational experience of students through the innovative application of technology.

- **Curriculum Support and Development** — Development of curricular opportunities for undergraduate research through creation of URSA courses and assistance developing departmental courses such as the Museum Research Apprenticeship Program (MRAP).

- **UAF Research Showcase** — A monthly seminar featuring current projects at UAF, making students aware of opportunities for research engagement and promoting active research across UAF and the greater Fairbanks community.

- **UAF Research Day** — An annual celebration and presentation of research by undergraduate students at UAF.

URSA Impact

- Presentations by undergraduates of their research at national and international meetings.

- Publications co-authored by undergraduates in peer-reviewed professional journals.

- Acceptance of UAF baccalaureate graduates to top graduate programs, professional schools and employment locally and nationally.

Selected Performance Indicators

URSA Student Awards

AY2012	32 awards $93,491
AY2013	45 awards $107,967
AY2014	60 awards $147,931
AY2015	67 awards $176,076

URSA Mentoring Awards

AY2012	5 awards $16,391
AY2013	8 awards $31,938
AY2014	10 awards $35,203
AY2015	15 awards $78,016

All URSA student and mentoring awards derive from UAF's reinvestment of 1% ICR into student research

URSA Innovative Technology and Education Awards

| 11 awards $65,687 |

ITE awards derive from 20% of the student technology fee

UAF undergraduates enrolled in 1 or more research courses

	Fall	Spring	Summer	Total
AY2012	137	210	15	362
AY2013	148	186	31	365
AY2014	134	205	31	370
AY2015	127	226	55	408

UAF
UNIVERSITY OF ALASKA FAIRBANKS

University of Alaska Fairbanks
Undergraduate Research and Scholarly Activity (URSA)
Annual Report AY 2014-15

The mission of the University of Alaska Fairbanks (UAF) office of Undergraduate Research and Scholarly Activity (URSA), which was established in 2011, is to support, develop, and institutionalize UAF's diverse and robust undergraduate research and scholarly activity programs. This activity refers to student-faculty collaboration in the creation of discipline-specific and interdisciplinary knowledge. The primary means by which URSA fulfills its mission are as follows:

1. Provide funding for undergraduate students and faculty who collaborate on research and creative projects;

2. Serve as a clearinghouse for projects that offer undergraduate students and faculty opportunities to collaborate in research or creative projects;

3. Assist UAF faculty and staff who strive to create or maintain undergraduate research and creative scholarly programs;

4. Create regular events that serve as venues for students to present their research and creative projects;

5. Catalog and archive UAF undergraduate student participation in research and creative projects, as well as the outcomes and products of those projects; and

6. Facilitate undergraduate student recruitment and retention initiatives through program-specific initiatives.

Through the aforementioned programs and initiatives, URSA aims to improve skills in critical thinking, creative problem solving, and communication and to engender a culture of life-long learning among all students, as well as enhance preparation and education of undergraduate students who will fill the needs of Alaska's 21st century workforce and society. URSA is UAF's resource for the development and promotion of experiential learning activities that engage undergraduate students, which supports UAF's goal to become a leading student-oriented research university. In this age of ever-increasing information and access to that information, research literacy is a required competence for the entire populace, not just UAF students. Thus, offering opportunities for undergraduate students to participate in research and creative scholarship is a noted best practice in higher education. Building on existing efforts and capacities, URSA attracts, retains, and enables UAF students to pursue varying levels of research and scholarly exhibits, performances, or creative endeavors.

University of Alaska Fairbanks
Undergraduate Research and Scholarly Activity (URSA)
Major Accomplishments

1. URSA Administration
   a. Barbara Taylor, UAF Department of Biology and Wildlife, changed from a half-time URSA Director to quarter-time URSA Co-Director; Trent Sutton, UAF Fisheries Division, became a quarter-time URSA Co-Director effective 01 January 2015.
   b. Kate Pendleton replaced Elizabeth Belknap as the full-time URSA Coordinator effective 01 January 2015.
   c. The URSA Advisory Board was expanded to include the following UAF faculty: Cam Carlson, Wendy Croskey, Cheng-fu Chen, Nicole Cundiff, Patrick Druckenmiller, Greg Finstad, Alexandra Fitts, Alex Hirsch, Kara Hoover, Ute Kaden, Sunwoo Kim, Mike Nakoneczny, Sarah Stanley, and Xiangdong Zhang.
   d. The URSA Innovative Technology and Equipment (ITE) Review Panel was created and consisted of the following individuals: Alexandra Fitts (Vice-Provost), Mary Kreta (staff), Andrew Seitz and Sarah Stanley (faculty), Stacy Vega and Todd Jacobus (graduate students), and Lachlan Gillispie (undergraduate student).

2. Funding Awards
   a. The total funds awarded through URSA in AY2014-15 were $319,779 (96 awards total).
   b. A total of $254,092 was allocated during AY2014-15 for undergraduate research (projects and SUgR), undergraduate travel, Research Day awards and mentoring awards. Funding was allocated as follows:
      i. Fall and Spring Undergraduate Student Project Awards (27 awards [77 applicants] totaling $84,372)
      ii. Fall and Spring Undergraduate Student Travel Awards (17 awards [51 applicants] totaling $28,928)
      iii. Summer Undergraduate Research Awards (14 awards [26 applicants] totaling $57,276)
      iv. Mentoring Awards (15 awards [27 applicants] totaling $78,016)
   c. Innovative Technology and Equipment (ITE) Awards (11 awards [33 applicants] totaling $65,687). The ITE Awards represented a new funding line (former UAF Technology Advisory Board [TAB] funds) through URSA, which was used to support equipment and associated software in support of undergraduate and graduate education and research at UAF.

3. Clearinghouse for Undergraduate Student Opportunities
   a. URSA continues to serve as UAF's clearinghouse for undergraduate student opportunities to engage in unique projects conducting research or creative scholarly activities. However, the process is informal (reliant on passive communication) because URSA is not an academic program; it does not enroll students or have affiliated faculty. Thus, it is difficult to quantify URSA's clearinghouse success rate.
   b. Seventy UAF students enrolled in FYE, URSA, and MRAP courses during AY2014-15 (see 5. Curriculum Development below).
   c. Forty UAF students received URSA funding in support of research or creative projects during the fall, spring, and summer of AY2014-15, and another 61 students applied but did not receive funding. Some of these students may have been matched with their project either directly by URSA or indirectly through URSA's request for proposals. In addition, walk-in

students seeking advice with respect to identifying research opportunities and/or mentors are frequent in the URSA office (weekly at a minimum and daily in the weeks at the beginning of a semester and around an URSA application deadline date). URSA has not tracked or followed up with these ad hoc advisees because they do not all apply for funding and, as a result, are not entered into the database.

4. Student Tracking and Project Cataloging
    a. The URSA database currently has 1,352 UAF undergraduates that have been involved in research since the URSA database was created in 2012.
    b. The 2013-2014 UAF accreditation report stated that 41% of UAF undergraduate students have participated in an academic research experience over the course of their baccalaureate studies. Further, the 1,352 students in the URSA database support that quantification of undergraduate student participation in research. Not included in the accreditation documents and not yet included in the URSA database are undergraduate students who are employed as research assistants. URSA has been working with UAF Human Resources and the UAF Office of Planning, Analysis, and Institutional Research (PAIR) to identify a means to include such students in the database.
    c. An online version of Research Day has been created within the Institutional Repository, which is a joint effort of URSA and Library Sciences Staff. https://scholarworks.alaska.edu/.
    d. Gary Hagestead in the Office of PAIR continues to work on streamlining the process of populating the URSA database to allow for more detailed and comprehensive tracking and reporting of undergraduate student research and creative scholarly activities.

5. Curriculum Development
    a. URSA (Undergraduate Research and Scholarly Activity) courses offered in AY2014-15
        i. URSA 192 Introduction to Research and Scholarly Activity at UAF (Instructor: Barbara Taylor; Enrollment: 7 students)
        ii. URSA 195 RAHI Research (Instructor: Lawrence Duffy; Enrollment: 8 students)
        iii. URSA 388 Undergraduate Research and Creative Scholarship I (Instructor: Barbara Taylor; Enrollment: 1 student)
        iv. URSA 488 Undergraduate Research and Creative Scholarship II (Instructor: Barbara Taylor; Enrollment: 3 students)
        v. URSA 492 Undergraduate Research and Scholarly Activity Seminar (Instructor: Barbara Taylor; Enrollment: 2 students)
    b. MRAP (Museum Research Apprentice Program) courses offered in AY2014-15
        i. MRAP 288 Museum Research Apprenticeship I (Instructors: Kevin Winker, Andres Lopez, Patrick Druckenmiller, and Derek Sikes; Enrollment: 11 students)
        ii. MRAP 488 Museum Research Apprenticeship II (Instructor: Andres Lopez; Enrollment: 3 students)
    c. FYE (First-Year Experience) courses offered in AY2014-15
        i. Banned! Challenges to Intellectual Freedom (Instructor: Karen Jensen; Enrollment: 15 students)
        ii. Whodunit: Detectives on Stage (Instructor: Brian Cook; Enrollment: 11 students)
        iii. Introduction to Undergraduate Research and Scholarly Activity (Instructor: Barbara Taylor; Enrollment: 23 students)

8. UAF Research Events
   a. UAF Research Showcase
      i. During the Fall 2014 and Spring 2015 semesters, URSA sponsored the UAF Research Showcase with weekly seminars from UAF researchers at Schaible Hall. This seminar series was available not only to UAF students, staff, and faculty, but to the greater Fairbanks community as well. Presentations are also available on the URSA website.
      ii. Fall 2014 Semester Presenters and Presentations

Date	Presenter	Presentation Title
10 September	Kris Hundertmark	Caribou, Moose & Climate Change: Who Wins? Who Loses?
17 September	R. Eric Collins	Life on Ice: Microbial Evolution in the Cryosphere
24 September	Pat Pitney	Olympic Torch to the North Pole
01 October	Amy Vinlove	Building a Better Teacher for Alaska
09 October	Joshua Reuther	Prehistoric Landscapes and Humans in Alaska
15 October	Hajo Eicken	Alaska Sea Ice: Hazards and Uses
22 October	Jim Brashear	Wood Ash to Glass: The History, The Science and The Aesthetic
29 October	Mike Harris, Andrea Ferrante, & Andrej Podlutsky	Biology of Vampires
05 November	Billy Connor	Reducing Fugitive Dust from Roadways in Alaska
12 November	Alice Rogoff	The Importance of the Arctic and the Media's Role in Communicating its Value
03 December	Lara Horstmann-Dehn	Tooth Walkers & Swimming Cows: Marine Mammal Research in Alaska

      iii. Spring 2015 Semester Presenters and Presentations

Date	Presenter	Presentation Title
21 January	Mike Castellini	To the Ends of the Earth: Three Decades of Antarctic Expeditions
28 January	Eyal Saiet	Using Unmanned Aerial Systems to Study Alaska's Environment
04 February	Taryn Lopez	Volcanic Gases: Insight into a Volcano's Plumbing
11 February	Trent Sutton	Lamprey Life History and Ecology: An Unexpected Journey
18 February	Nicole Misarti	Historical Marine Ecology: Planning For a Sustainable Future
25 February	Katrina Counihan	Disease Links Between the Environment, Sea Otters and Humans
04 March	Terry Reilly	"The First Thing We Do, Let's Kill All the Lawyers": Shakespeare and Early Modern Family Law
11 March	Arny Blanchard	Hidden Animals of Alaska's Seas
25 March	Robin Bullock	Oil Spill Response in the Arctic: Planning, Response and Mitigation
01 April	Laura Prugh	Understanding Species Interactions: Improved Wildlife

		Conservation and Management
08 April	Pat Holloway	UAF Peony Research: A New Horticultural Industry for Alaska
15 April	Cam Carlson	Arctic Security
22 April	John Smelter	The Art of Observation: Linking Science and Art

    b. Research Day
       i. Research Day was held on 28 April 2015; a total of 81 posters were presented by UAF undergraduate students at the event.
      ii. Dean's Choice Awards ($250 per school/college) were given for each college or school; the awardees and their poster title for each college/school were as follows:
          a. College of Engineering and Mines (CEM) – James Colles and Robert Colles (Dynamic Vehicle Lights)
          b. College of Liberal Arts (CLA) – Leah Hill (Performances of Gender & Identity: Using the Early Photographic Works of Claude Cahun and Cindy Sherman to Demonstrate the Performative Nature of Gender and Identity)
          c. College of Natural Science and Mathematics (CNSM) – Angela Patterson and Krysta Yancey (Hibernation and DNA Repair: The Arctic Ground Squirrel's Perspective)
          d. School of Education (SOE) – Jennifer Paniati (Engineering Education Professional Development)
          e. School of Fisheries and Ocean Sciences (SFOS) – Genevieve Johnson (Monitoring Harmful Algal Blooms in Southeast Alaska)
          f. School of Natural Resources and Extension (SNRE) – Nicole Warner (Eagle River, Alaska Watershed Survey: Socio-Ecological Interactions in an Urbanizing Area)
      iii. Three awards were given for the top three posters of the day; the awardees, their college/school, poster title, and dollar amount for their respective award were as follows:
          a. First place - Leah Hill (CLA; Performances of Gender & Identity: Using the Early Photographic Works of Claude Cahun and Cindy Sherman to Demonstrate the Performative Nature of Gender and Identity; $2,000)
          b. Second place - Angela Patterson and Krysta Yancey (CNSM; Hibernation and DNA Repair: The Arctic Ground Squirrel's Perspective; $750 for each student, $1,500 total for the award)
          c. Third place - Genevieve Johnson (SFOS; Monitoring Harmful Algal Blooms in Southeast Alaska; $500)

9. Student Highlights
    a. Matt Vanagel's (CNSM - Chemistry) research on the brain was featured in the Fairbanks Daily News-Miner on 19 May 15 2015. http://www.newsminer.com/science_and_technology/uaf-researchers-adapt-stanford-method-to-make-transparent-brains/article_3ad152d2-fdfe-11e4-a8c2-17e079ebd0b1.html
    b. Logan Graves (CEM- Electrical Engineering and Computer Science) had a summer research experience at the Naval Research Laboratory in Washington, D.C. Logan has worked on unmanned aerial vehicles at UAF since he was a freshman engineering student and started graduate work this fall.
    c. Uyanga (Angie) Mendbayar (CEM - Mining and Geological Engineering) won the Outstanding Undergraduate Poster Award at the 2015 Student Water Conference in Stillwater, Oklahoma, for her project *Investigation and quantification of water track networks in boreal regions using remote sensing and geophysical data*.

d. Tiffany Green (CNSM - Geosciences) presented her work at the 2014 West Antarctic Ice Sheet (WIS) Divide Core Meeting in San Diego, California.

e. Dakota Emery (INDS - Department of General Studies) studied geographic variability in the drug "spice." He wrote an article about this topic for the Fairbanks Daily News-Miner that was published on 15 June 2015.
http://www.newsminer.com/science_and_technology/uaf-researcher-takes-forensic-look-at-spice/article_6cb0c526-13fc-11e5-88df-13f6b401a1b7.html

f. Julia Taylor (CLA - Journalism and Broadcasting) traveled to Nenana and Anchorage. Alaska, and Pendleton, Oregon, gathering court documents for research involving the Hartman Justice Project (also known as the Fairbanks 4 court case).

g. Ashley Swedberg (SOE) is measuring the level of preparedness for assisting human trafficking victims in Alaska.

h. Alta East (CLA - Anthropology) is conducting interviews at Ft. Richardson and Ft. Wainwright to study foraging practices among Alaskan military families.

i. Annyssa Interrante (CNSM- Biology and Wildlife) is examining the diet contents of Arctic lamprey collected in the Bering Sea. Her research took an interesting twist this summer in Fairbanks and was highlighted by the Museum of the North.
http://www.alaskamuseum.tumblr.com/

10. Mentor Highlights:
   a. Carrie Green (SOE) is exploring methodologies for engaging young children as active researchers including use of GoProTM cameras. Her research was published in Environmental Education Research in August 2015.

   b. Chris Maio (CNSM) is using ground penetrating radar (GPR) for student research projects applying sedimentary methods to decipher the coastal response to climate change, human modifications, and natural hazards over multiple spatial and temporal time scales.

   c. Cheng-fu Chen (CEM) Established a UAF student chapter of Biomedical Engineering Society and mentored biomedical engineering students.

   d. Todd Radenbaugh and Rose Meier (UAF Bristol Bay Campus) secured travel funding for five rural students to attend the Western Alaska Interdisciplinary Science Conference (WAISC) in Bethel, Alaska.

University of Alaska Fairbanks
Undergraduate Research and Scholarly Activity (URSA)
AY 2015-16 Challenges and Goals

1. **Raise the profile of undergraduate research and scholarly activity** at UAF. A fundamental aspect of URSA's mission is to ensure that UAF students, faculty, and staff are aware of the opportunities available for undergraduate research and creative scholarly activities. To accomplish this important goal, there will be increased efforts to promote URSA funding opportunities via email (e.g., directed emails to each college/school, UAF-sponsored communications such as The Cornerstone), strategically placed announcements on campus, presence and participation in UAF events (e.g., Inside Out, New Student Orientation, We Are CLA, UA Scholars night, etc.), periodic, directed communications with the Deans of the various colleges/schools, revision to the URSA website, attendance and participation in UA and UAF administrative meetings (e.g., Board of Regents, Provost Council, etc.), and completion of an annual report each year.

2. **Improve student tracking and project cataloging** of URSA-sponsored and non-URSA-sponsored research. URSA must obtain and make available accurate numbers of students and mentors engaged in undergraduate research and creative scholarship. Obtaining comprehensive data is a challenge, especially for those students who are engaged in research and creative scholarship by virtue of holding a position as a student research assistant. The URSA Coordinator is working with Ian Olson and Gary Hagestead with the Office of PAIR to develop a student research participation management tool to facilitate the collection of these data. It is also important to track those projects that are funded by URSA, funded by other units, or not funded at all, and to provide this information to the UAF Chancellor, administrators in the UAF Provost's Office, and the Deans of the various UAF colleges/schools for informational purposes. Further, student projects in research and creative scholarship are diverse in discipline, which translates to diversity in mode and medium. URSA will work with the Library Sciences faculty to meet the challenge of archiving all projects in undergraduate research and scholarly activity, as well as making these archived documents available to be used as tools in recruitment, marketing, and development. The URSA staff will work with staff members in the Office of Admissions, Communications and Marketing, and Development to act as a resource for sharing exciting stories that can be used for promotional purposes.

3. **Reorganize the URSA Advisory Board** to create one group of faculty to assist with general planning (the URSA Advisory Board) and a separate group of faculty to review student and faculty mentor applications (the URSA Review Panel). The URSA Advisory Board will consist of two faculty members from each academic college/school at UAF and will meet once each semester to discuss policy initiatives and opportunities related to URSA. The URSA Review Panel will meet in accordance with the various due dates of the undergraduate student projects, undergraduate student travel, mentor, and ITE requests for proposals. This group will be responsible for reviewing the submitted proposals. This group is an *ad hoc* pool and as such becomes a means to spread understanding of URSA funding processes open to all interested faculty (i.e., there is no limit to the number of faculty that can participate to review submitted proposals nor will there be an effort to ensure that each college/school is equally represented in membership for the review panel).

4. **Continue to work with PAIR and HR to improve tracking of student participation in undergraduate research and scholarly activity.**

5. **Increase the national profile of undergraduate research** at UAF. To accomplish this goal, send 1-2 students to represent UAF at Posters on the Hill in Washington, D.C., held annually in April. Sam Herreid represented URSA in 2015.

6. Create a **Handbook for Mentoring Undergraduate Research** that is UAF-specific and a true resource for faculty mentors.

7. **Enhance and streamline Research Day**, which will be held on 26 April 2016. Based on feedback from the 2015 event, Research Day should be shortened in duration and the awards ceremony speeded up to maintain engagement of all participants and attendees. The UAF administration, as well as local members of the UA Board of Regents, should be notified early during the fall 2015 semester to save the date for the 2016 Research Day so that they can attend the event.

8. Continue to **expand the comprehensive Archive of Undergraduate Research and Creative Scholarship** within the Institutional Repository.

9. Decide whether the **First-Year Experience (FYE) courses** should continue to be offered despite their low annual enrollment. If the FYE courses are to be offered during the Fall 2016 Semester, then there is a need to increase the number of interesting course offerings and improve FYE program marketing to increase undergraduate student enrollment. If the FYE program is to be discontinued, then there will be a need to figure out a mechanism to continue to deliver the Student Success Curriculum, either as a stand-alone course or as an incorporation into a new or existing course.

10. Explore opportunities to **expand URSA funding initiatives** to the rural UAF campuses and/or through the development of an URSA-supported internship program.

Table 1. The number of URSA applications (student project, student travel, mentoring, and ITE combined), awards, and awarded dollar amounts for each college/school for AY2014-15. The dollar amount awarded also includes awards to students for Research Day poster presentations.

College/School	Number of Applications	Number of Awards	Dollar Amount Awarded
CEM	33	12	$33,942
CLA	99	21	$44,881
CNSM	129	44	$176,175
SFOS	13	8	$31,218
CRCD	7	4	$15,088
SOE	5	4	$18,224
SNRE	7	1	$250
Total	293	94	$319,779

Table 2. The number of URSA applications (Apps), awards, total dollar amount awarded (Dollar Amt.) for all awards, and dollar amount awarded by award type for each college/school and department/unit within each college/school for AY2014-15.

College/ School	Department/ Unit	Apps	Awards	Dollar Amt.	Project	Travel	Mentor	ITE	Research Day
CEM	Civil & Env.	9	7	$16,989	$9,699	$4,000	$0	$3,040	$250
	Comp Sci.	2	0	$0	$0	$0	$0	$0	$0
	Elec. & Comp.	1	0	$0	$0	$0	$0	$0	$0
	Mechanical	1	1	$5,000	$0	$0	$5,000	$0	$0
	Mining & Geo.	4	3	$11,953	$7,295	$4,658	$0	$0	$0
CLA	Anthropology	9	6	$10,119	$7,400	$1,749	$0	$970	$0
	Art	8	1	$1,500	$0	$0.00	$1,500	$0	$0
	C-C Studies	2	0	$0	$0	$0	$0	$0	$0
	English	7	4	$7,195	$0	$805	$2,500	$3,889	$0
	Journalism	4	2	$7,502	$7,502	$0	$0	$0	$0
	Justice	1	0	$0	$0	$0	$0	$0	$0
	Linguistics	5	1	$1,450	$0	$1,405	$0	$0	$0
	Music	3	0	$0	$0	$0	$0	$0	$0
	Political Sci.	7	3	$6,142	$5,000	$1,142	$0	$0	$0
	Psychology	3	0	$0	$0	$0	$0	$0	$0
	Social Work	2	1	$0	$0	$0	$0	$0	$0
	Sociology	14	5	$10,639	$1,687		$1,314	$5,388	$2,250
	Theater & Film	4	0	$0	$0	$0	$0	$0	$0
CNSM	Bio. & Wildl.	56	25	$81,569	$59,708	$6,333	$10,000	$3,778	$1,750
	Chem. & Bioch.	16	9	$32,531	$17,646	$0	$4,932	$9,953	$0
	Geosciences	22	9	$52,075	$9,980	$3,973	$10,000	$28,122	
	Math & Stats.	1	1	$10,000	$0	$0	$10,000	$0	$0

CRCD	Int. Al. Campus	1	1	$2,962	$0	$0	$0	$2,962	$0
	Rural Coll. Sci.	4	3	$9,650	$4,650	$0	$5,000	$0	$0
e-learning	-----	1	0	$0	$0	$0	$0	$0	$0
SFOS	Fisheries	9	6	$18,498	$5,000	$2,818	$9,930	$0	$750
	MSL	2	2	$12,720	$2,400	$0	$10,320	$0	$0
SNRE	NRM	2	1	$250.00	$0	$0	$0	$0	$250
SOE	Education	8	6	$18,224	$871	$2,000	$7,520	$7,583	$250

Table 3. The number of URSA applications (AP), awards (Aw), and dollar amount awarded (DA) for each college/school by award type for AY2014-15.

	Student Project			Student Travel			Mentoring			ITE			Research Day		
	Ap	Aw	DA	Ap	Aw	DA	Ap	Aw	DA	Ap	Aw	DA	Ap	Aw	DA
CEM	13	4	$7,199	6	4	$8,658	3	1	$5,000	2	1	$3,040	8	2	$250
CLA	23	8	$21,923	21	4	$8,842	9	4	$27	5	3	$10,248	30	2	$2,250
CNSM	52	25	$88,186	17	6	$10,306	9	5	$34,932	17	5	$41,853	34	2	$1,750
SFOS	4	2	$7,400	3	2	$2,818	3	2	$20,250	2	0	$0	1	1	$750
SNRE	1	0	$0	1	0	$0	0	0	$0	1	0	$0	1	1	$250
CRCD	2	2	$7,126	1	0	$0	0	0	$0	3	1	$2,962	0	0	$0
SOE	0	0	$0	3	1	$2,000	2	2	$7,520	2	1	$7,583	1	1	$250
DGS	0	0	$0	0	0	$0	0	0	$0	0	0	$0	1	0	$0