

# Annual Diversity Plan Accountability Report

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Reporting Unit College of Science  
Report Contact Name Sherry J Yennello

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Contact email [yennello@science.tamu.edu](mailto:yennello@science.tamu.edu)

- Students
- Undergraduate
- Masters
- Doctoral
- Faculty, Lecturers, and Instructors
- Administrators (applicable to all units)
- Budgeted Staff (applicable to all units)

**There are five departments in the College of Science. Each of the Departments has a representative on the College of Science Diversity Committee, which meets monthly. The Diversity Committee includes both tenured and non-tenure track faculty as well as a staff member from Multicultural Services. These individuals work with their Department Head to make sure issues of diversity and climate are considered in the everyday workings of the department. The monthly meetings of the college committee allow us all to share ideas and successful strategies. While there are efforts at the college level to promote diversity, improve climate and assure equity throughout the college, the largest impact on the experiences of an individual come from within her or his own unit. Therefore the college has been advocating discussions of these issues at the departmental level. This year each of the five departments prepared their own Diversity Plan Accountability Report. What follows here is derived from those reports and reflects the grass roots efforts going on in all of the departments within our college.**

## 1) Engaging the Data

During this time of constrained hiring we have still been able to make moderate progress. In terms of hiring, Biology was searching for 1 position, but was able to take advantage of a dual career opportunity to hire a pair of faculty, thus recruiting a female TT faculty. Math made a pair of offers to a dual career couple and they will be joining us next fall. Chemistry made an offer to a female assistant professor candidate, who was also part of a dual career couple, but was unsuccessful in its recruiting attempt. This underscores the importance of dual career hiring to be able to recruit female faculty. Additionally we have added three Black NTT faculty and 1 Hispanic NTT faculty member in the college. We have also seen the promotion and tenure of three female faculty in Biology and an Hispanic male in Physics. Both a female associate professor in Statistics and a Black associate professor in Biology were promoted to the rank of full professor. Additionally a female lecturer was promoted to senior lecturer.

Although the staff overall has slightly more men than women, when you look at the executive, technical or skilled categories there are few women. (Many of the women are in the clerical titles.) So this is an area for the college to work on. This year we saw the first Hispanic female added to the executive/administrative level and three Hispanic men have been added to professional titles.

Across all of our student populations we have had slight increases in the representation of minority students. At the undergraduate level our percentage increases are larger than the percentage increases for the university as a whole.

Efforts are taking place at the departmental level. For example:

Although the percentage of female graduate students (around 30%) and the percentage of minority students (around 10%) in the Mathematics department are similar to the national average, the department convened a Diversity Recruitment Study Group. It was observed that the department did not receive a number of applications from female, domestic, and minority candidates commensurate with the size of the program. As a result Math is working to improve its recruitment techniques, with an emphasis on working aggressively to identify candidates in these categories and make them aware of their program.

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In Chemistry there were, 270 graduate students enrolled in the graduate program In Spring 2012. This reflects a 35% increase in enrollment from 2000. Currently, 37% of the graduate students enrolled in our program are female. This compares favorably to the national average of 27.4%. Of the 136 domestic students enrolled in our program, 86% identify themselves as being Caucasian, 6% Hispanic, 5% Asian/pacific islanders, and 2% African American. As a means of comparison, the 2008 national average for underrepresented minorities is 5.2%. Members of the chemistry department's executive staff (including the Department Head, graduate advisor, undergraduate advisor, graduate office staff, and the department's representative on the University's diversity committee) meet several times a year to strategize and discuss diversity related issues.

## 2) Recruitment and Retention

### Retention:

The college has many prongs of effort to help retain our faculty. In multiple departments raises were used for proactive retention. The college has facilitated multiple dual career situations in order to retain faculty. The implementation of Instructional Professor titles in multiple departments should help to show appreciation for our long-term non-tenure track faculty (many of whom are female), thus helping to retain them. Additionally Biology successfully nominated two women faculty members for prestigious awards.

In order to increase retention and increase the success rate of our students, we have considerably increased the size of our advising teams throughout the college. In Chemistry, the undergraduate advisor [REDACTED] met monthly with Regents scholars (1<sup>st</sup> generation students, mostly Hispanic) to provide them with additional support and advising. Additionally URM undergraduates have been given opportunities to attend minority student conferences where they have given oral and poster presentations as well as manned exhibition booths to support departmental recruiting efforts. Both undergraduate and graduate students serve as officers in NoBCChE (National Organization for the Professional Advancement of Black Chemists and Chemical Engineers), where we have established a local chapter. Students serve as officers and are directly engaged in the overall mission of the organization. The department of Mathematics has developed an in-house online Advising Management System to support advisers and students and streamline the advising process. This was motivated by the findings of the Exit Surveys from our graduating seniors and feedback provided by the first--year students during the Freshmen Advising Process. We realize that our program needs to establish a reputation of supporting minorities and underrepresented students through careful and individualized advising and mentoring in order to improve recruiting and retention. Our undergraduate Society of Physics Students have been very active at improving the climate for undergraduate by involving upper division students with lower division students for tutoring. The upper division students have taken over the PHYS-101 class and turned it into a workshop for improving retention.

### Recruitment:

The College and its Departments have a long and distinguished history of outreach programs including math fairs, Math Circles, Chemistry Open House, Chemistry Road Show, Physics Festival, Saturday Morning Physics, Expanding your Horizons, science bowls, etc. Past Diversity Accountability funds have enabled us to leverage these ongoing efforts to specifically target underrepresented students, such as the busses that are hired to bring students from predominately minority schools to campus for the Physics Festival.

The newest effort has been launched by Biology, which is partnering with Bryan Collegiate High School (BCHS), an Early College High School that serves a student population that is ~70% minority/economically disadvantaged/first-generation college. Biology faculty travel to BCHS once or twice each month to give presentations, including research topics as well as careers in science talks. Approximately 100-150 students attend each event.

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Departments within the College host four NSF funded Research Experiences for Undergraduate programs (chemistry, mathematics, astronomy, nuclear science) that enable undergraduate students from outside programs to carry out summer research with PI's in our departments. The REU programs have been quite successful in recruiting outstanding students to our graduate programs. Approximately 1/3 of the REU participants students are minorities.

All departments recruit aggressively at national and local section meetings as well as meeting specifically targeted at minority students. (While the general conferences are not specific to minorities, minority students certainly attend.) There was a College presence at SACNAS (Devoted to Advancing Hispanics, Chicanos and Native Americans in Science) meeting, while individual departments also attend and recruit at other venues such as NOBCCHE (National Organization for the Professional Advancement of Black Chemists and Chemical Engineers), and ABRCMS (Annual Biomedical Conference for Minority Students). New recruiting materials, which reflect our commitment to diversity, are disseminated at these events.

Additionally, faculty give lectures at minority institutions annually (e.g. Hampton University, University of Puerto Rico, Texas A&M Kingsville, Texas Pan American University). We implemented use of the GRE search service, which identifies minority student applicants. We follow-up on these applicants and make direct contact with them, encouraging them to apply for graduate school

The College has been aggressive (and successful) about nominating graduate student recruits for diversity fellowships. In order to make even better use of Texas A&M University's merit and diversity fellowships, some units moved their application deadlines to ensure more time to identify and nominate such students.

We have been proactive in faculty searches. All our advertisements are posted on various sites for minorities. Departments are proactive and accountable for maintaining a diverse pool all the way through the search process.

The College is in the midst of identifying three new Department Heads. The search committees have been approximately 1/3 female. A woman chaired one of the committees, and all of the committees reached out to potential female candidates.

### **3) Advisory and/or Developmental Council Groups**

The Chair of the College of Science External Advisory and Development Council is a female. The overall number of women on the EADC has grown significantly in the past few years, now numbering 11 (out of 54 total members).

Two new Associate Deans have joined the college executive team. One is female, and an ADVANCE Administrative Fellow, and the other is an URM.

Each department has numerous advisory committees (e.g., Executive and P&T) and care is taken to ensure appropriate representation of both women and URM are on the committees.

### **4) Unit Climate**

Departments in the College are engaging with the ADVANCE program in multiple ways to help promote women faculty. Four departments are participating in the ADVANCE Faculty Staff Interaction Teams (FASIT) program to improve the climate in the department by promoting mutual understanding and appreciation for the various roles everyone plays in a successful department. The College of Science, WISE (Women in Science and Engineering) and the Department of Mathematics partnered with ADVANCE, the College of Engineering and the 50 year Celebration of Inclusion Committee to bring "Truth Values" to campus. Two departments have successfully applied for mini-grant funding from ADVANCE to address department specific issues. Additionally, multiple departments have partnered with the ADVANCE program to

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bring in National Academy and other noteworthy women speakers to present on both their science and issues of increasing participation of underrepresented groups in Science.

The College did a climate survey of all faculty, staff and graduate students as well as a survey of selected undergraduate students. The results of these surveys were discussed at the college executive committee. These discussions have now been brought to the departmental level and have been discussed at departmental faculty meetings.

For example, in Biology the college climate survey was discussed at a faculty meeting in Spring 2013. Feedback was solicited from faculty, staff, postdoctoral associates and graduate students on how to improve the climate of the department. In response to the requests, the department implemented the several initiatives; including creating and furnishing a staff break room and increasing emphasis on diverse seminar speakers. Through these seminar visits and interactions, we are providing our students with underrepresented role models who are successfully navigating the academy. These new initiatives are in addition to the ongoing Biology activities reported previously: grad student/postdoc "Shop Talks", Faculty Chalk Talks, Biology Undergraduate poster session, Student/postdoc research retreat, Faculty Coffee Hour, invited Biology graduate student talks in the departmental seminar series (2 per semester)

Many departments regularly survey their students (current, graduating and alumni) to determine satisfaction with the program. The results of these surveys as reported by the departments were quite positive. For example, while the overall response from Chemistry students was positive, areas of dissatisfaction included the current stipend level, the health insurance plan, the lack of gathering spaces within the department, the amount of teaching that constitutes full support (GAT3) and better professional development. The department will invite speakers from industry, small colleges, national laboratories, etc. to provide students with more career options following graduation. In this regard the alumni professional development advisory committee is currently being formed.

The morale among Mathematics graduate students, including domestic, female, and minority is quite good, as evidenced by our internal surveys for graduating students (administered the semester of graduation) and alumni (administered five years after graduation), and by external surveys such as the one recently conducted by GraduatePrograms.com. In this latter survey, graduate students were asked to rate their programs in 15 categories, including academic competitiveness, career support, financial aid, and quality of network. The mathematics department at Texas A&M was ranked 7th overall, above such schools as the University of California-Berkeley, Yale, and most importantly the University of Texas, Austin. This is consistent with the recent survey of graduate students conducted by OGAPS in which it was found that there are relatively few complaints about the diversity climate in the College of Science.

Multiple departments have recently surveyed staff and non-tenure track faculty. These surveys revealed areas for improvement (pay, status, workload) and the departments are working on the issues raised by these surveys.

For example a recent staff survey in Chemistry revealed that the staff workload has dramatically increased in the last several years. This work overload has led to the general feeling that the staff are not valued by the department. One of the department's FASIT initiative/goals is to have one annual joint faculty/staff departmental meeting per year. At this meeting they plan to make 5 staff appreciation awards (\$200 gift cards). The faculty will make the nominations.

In addition to the above, Statistics Department Head, Simon Sheather, with the help of Sherry Yennello, Associate Dean for Diversity, established a Faculty Code of Conduct. Prior to the Faculty Code of Conduct, Dr. Sheather created and implemented an Email Code of Conduct. These codes ensure that everyone is treated with the dignity, respect and professionalism that is expected in the workplace. The College diversity committee has drafted a Code of Conduct for the college and is working on appropriate buy-in and adoption by the college executive committee.

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## 5) Equity

In multiple departments raises were assigned partially to correct salary imbalances at both faculty and staff levels. In some instances this has benefitted members of underrepresented groups.

Departments encourage staff to take courses offered by the University to facilitate their training and career development.

Departments encourage student leadership development through a variety of student organizations. Some departments also provide student hosted seminar speakers.

## 6) Future Efforts

We will continue our efforts to retain and increase the diversity in our student body, collaborating closely with student associations such as SACNAS and various other minority groups, engaging them in our outreach efforts and related educational activities. We will implement further efforts to reach out prospective diverse students, but this effort must be done in tandem with our global efforts to improve our diversity profile. Additionally the executive team of the college and the administration of the departments will continue to ensure that diverse backgrounds are respected, sought and mentored in commitment to the University's diversity plan.

Examples of some department specific plans include:

The Chemistry Department will establish a student diversity group that will include undergraduates, graduate students, and postdoctoral fellows. The organization will have lunch meetings several times a semester and will additionally host diversity departmental seminar speakers or professional development speakers, as well as have several planned activities per year including community service, scientific outreach, participation in scientific conferences. Chemistry will develop a CBI (chemistry biology interface) program that will be comprised of minority graduate students.

The department of Mathematics plans to assess the effectiveness of their enhanced approach to minority recruitment. The Department's graduate committee will carry out this assessment. In addition, we will continue to ensure that diverse backgrounds are respected in our department, and we will proactively provide mentoring for any students who appear to be struggling with issues related either to academics or diversity climate. They are in the process of determining an appropriate administrative structure for ongoing oversight of the graduate diversity.

The department of biology plans to organize opportunities for BCHS students to visit our department for lab tours, etc. Our ultimate goal is to set up a paid summer research internship for a small number of BCHS students each summer, depending on funding availability.

Lastly, the College of science prides itself on striving to be a leader when it comes to department climate and diversity. We will continue these efforts by upholding our current codes of conduct and recruiting for diversity. In addition, as with what we done in the past, we hope to be able to continue to provide training for staff development, as well as financial support for lecturers, postdocs and graduate students to attend conferences to aid in their professional development.