Brown University  
Academic Departmental Diversity and Inclusion Action Plan (DDIAP)  
2018-2019 Update Report Summary

Please respond to the following questions below and submit the document via email to the Office of Institutional Equity and Diversity at ddiap@brown.edu by July 1, 2019.

Name of Department/Unit: DEEPS (Earth, Environmental, and Planetary Sciences)

Name/Title of Person Submitting Update Report: Greg Hirth

1. What Departmental DIAP goals and priorities have you focused on during the 2018-2019 period related to each of the major DIAP themes stated below.

   a. People:

   **FACULTY**
   We made strides to diversify our faculty in the last decade, and although much work remains to be done we have one of the most diverse faculty in the physical sciences at Brown. Two of our last four offers have been made to URM candidates, one of whom (Alex Evans) accepted and started with us in 2018-2019. In the last year, we made two new faculty appointments (Victor Tsai, a target of opportunity hire started July 2019; Daniel Ibarra, in a joint-hire with IBES who will start in January 2021). While neither qualifies as a URM, they both bring an ethos commensurate with our goals to the Department. Daniel has been exceptionally proactive; his multicultural background affords him a unique perspective on how to promote a diverse and inclusive research environment. He has a proven track record of working to foster diversity in STEM through his mentorship and engagement in University and community programs.

   **GRADUATE STUDENTS**
   While our graduate student recruitment has been excellent for gender parity, our applicant pool rarely exceeds 10% in terms of historically underrepresented groups, reflecting the demographics of the field. For example, only 1.2% of doctorates in the “geosciences, atmospheric, and ocean sciences” were awarded to Blacks or African Americans in 2016, 5.2% to Hispanics or Latinos, and 0.5% to American Indians or Alaska Natives (National Science Foundation, 2018). Of DEEPS students who earned undergraduate degrees since 2013, 14% are from URM groups, and national estimates are 8% to 11% (Wilson, 2016).
This year we continued to have low numbers of HUG applicants (~5%). We are making efforts to improve this for our program and in our field through recruiting efforts at targeted STEM conferences (e.g., SACNAS) and disciplinary conferences (e.g., American Geophysical Union meetings). We also re-designed a pamphlet to help communicate why geosciences is an interesting and lucrative career choice, what backgrounds students need to succeed in our program, and then details of our program.

In an effort to improve the pipeline of underrepresented students in the geosciences, in 2016 DEEPS initiated a partnership with the Leadership Alliance. The Leadership Alliance is a national consortium comprised of 36 PhD-granting Institutions, Minority-Serving Institutions and private industry dedicated to training and mentoring students from diverse cultural and academic backgrounds for competitive graduate programs and professional research-based careers. Our program brings undergraduates to DEEPS for nine-week summer research internships, plus networking and mentorship activities throughout the summer, culminating with the Leadership Alliance National Symposium. One student participated in 2016, six in 2017, and five in 2018; 58% of these students are from URM groups, 58% are women, and 67% are first generation college students.

As a highlight for this year, we were awarded an NSF Earth Sciences REU Site award to expand the program to eight students for the next three summers. We have successfully recruited an excellent group of eight students for the summer of 2019; 88% of these students are from URM groups, 75% are women, and 50% are first generation college students. Thirteen DEEPS faculty have participated as student mentors, indicating broad participation across the department.

Our graduate students also contribute enormously to efforts to make our department more diverse and inclusive. Our graduate students initiated (and lead) a Diversity Working Group (DWG) to (1) increase the visibility of the research and graduate program in DEEPS at Brown University; (2) help recruit more diverse talent to the applicant pool of the Ph.D. program; and (3) support and facilitate goals outlined in the department’s Diversity and Inclusion Action Plan by promoting a more inclusive and representative graduate student body. This self-organized group has already been proactive in creating activities within the department and also participating in recruitment via national scientific conferences (AGU, LPSC, SACNAS and in the future NABG, AISES, and McNair).

**Undergraduate Students**

Through discussions with the undergraduate representatives to our Departmental DIAP, this year’s efforts with undergraduate students focused on mental health and inclusivity. In both cases, student representatives first presented ideas and survey results to our DIAP Committee, then following feedback and discussion with the DIAP, these students
led productive discussions with our entire faculty during our regularly scheduled faculty meetings.

b. **Curriculum:** What curricular offerings have been enhanced or have been developed? Note any changes that have been made to the concentration requirements. To what extent is inclusive pedagogy utilized and encouraged?

For curriculum, our primary focus has been on providing a more inclusive experience for our undergraduate students – with significant input and feedback developed through meetings with the students and our DIAP committee.

c. **Department Climate:** What efforts, if any, have been directed at understanding departmental climate? Comment on any new initiatives related to improving departmental cultural climate that has been implemented.

We have been active collecting work climate data for our Department in the previous four years; this year we focused on making progress on issues raised during 2017-2018. Improving work climate was a major focus for the Planetary Group in our Department, where a group of faculty and students proactively created a task force to address issues related to that sector of the Department. We are now in the process of incorporating many of the suggestions from the task force (compiled over the last several months) into a revised version of our Department’s graduate student handbook. The most important issues deal with communication between graduate students and advisors, and a more straightforward process of how to address and communicate grievances. In conjunction with the report from our external review, we are developing more detailed narratives for graduate student mentorship to foster better understanding of expectations for graduate students.

Our graduate students are strongly community oriented, participating in a number of activities on and off campus. This is an important component of our success as it contributes to graduate students’ experience at Brown and also contributes to their professional development and advancement in their careers. The graduate students lead a self-organized **GeoClub** that operates under the leadership of elected officers. The GeoClub meets as a group once per semester, and organizes activities year round. Highlights of this year’s **social activities include:** a field trip for first year students; department orientation activities and welcome party; International potluck; Fall and Spring picnics; a hiking trip; a department wide softball game; and professional development seminars that include topics such as preparing fellowship applications. The students also elect 4 graduate student representatives who attend, contribute to, and summarize faculty meetings (when confidential information is not discussed) to the larger department student body. GeoClub officers also organize a **1st year mentoring**
program, matching incoming first year students with senior graduate students who participate in a mentoring relationship throughout the first year. Graduate students also actively engaged and provided feedback in 4 recent faculty searches in DEEPS and in collaboration with IBES.

2. Please describe the process by which you have continued to engage your department’s faculty, students and staff in discussions of the implementation of your Departmental DIAP.

   a. Who takes a leadership role in the ongoing DDIAP work in your unit? Please discuss ways in which the work is or can be more equitably distributed.

   Our DDIAP committee is comprised of the Department Chair (Greg Hirth), Chair of Curriculum Committee (Ralph Milliken), Director of Graduate Studies (Meredith Hastings), Director of Undergraduate studies (Jan Tullis), Concentration advisors (James Russell and Karen Fischer), Graduate representatives to the faculty (four students, who attend our faculty meetings), a staff member (David Blair), Chairs of the graduate student’s DWG, and two undergraduate appointees (one senior and one junior). The committee meets approximately once a semester (we met twice in 2018-2019) to discuss current climate-related topics and brainstorm for new ways to engage people across the Department, as well as assess goals and priorities for the Departmental DIAP. Beyond these meetings, the DIAP committee members separately and together have engaged the students and faculty in several ways via one on one discussions, group discussions and Department wide discussions.

   The philosophy of our DDIAP Committee is to engage the faculty, students and staff in leadership positions across the wide spectrum of the Department. We will make a change for 2019-2020, bringing on a Chair of the committee; to date, the Department Chair has served as the Chair of the DDIAP.

   b. If you have a DIAP Committee, please list the members of the committee and describe the role of the committee and how often they meet?

   See above

3. Please share example(s) of positive outcome(s) generated by the DIAP implementation work you have done to date.

   Several examples are highlighted above; our engagement with the Leadership Alliance (bolstered by our recent REU award) is definitely a highlight. As Department Chair, I have noticed a greater appreciation of the importance of
diversity and inclusivity in the collected ethos of our faculty and students. The Diversity and Inclusivity workshops we have also been quite productive.

4. What are the **challenges** you have faced in your DIAP implementation to date?

This is a good question – reflecting on the process that we worked through over the last several years, I would say that appreciating the importance to our students of achieving a more diverse student body and faculty was somewhat underestimated. We are all open-minded and welcomed the opportunity to discuss these issues together with the students. In the process, we learned a lot more about our students and ourselves. In our discussions, the “current reality” of a limited pipeline was often brought up – and our more senior colleagues sometimes related this to gender issues of the 70’s and 80’s. It was educational to discuss ways in which increasing the number of URM students and faculty is more challenging – and heartening to see the dedication that our students put into the issue.

5. Please list any **DIAP related trainings** that your department has participated in during the 2018-2019 academic year.

This year the DWG, in coordination with the DGS, organized our **second annual Diversity and Inclusion Workshop**. This year’s workshop was facilitated by the LGBTQ+ Center's Kelly Garrett and included discussion of terminology, awareness, and risks and challenges faced by the LGBTQ community.

6. **Reflecting on the past three years** since the development of your DDIAP, what if any, priorities or goals have changed?

   a. What emerging themes would you like to address in the next 1-3 years?

Our goals and priorities remain the same – but every year brings a new challenge and opportunity. At the beginning of the DDIAP, the role of diversity in the Department was clearly the number one priority. Over the last year, factors involved with mental health and inclusivity became more of a focus.