# Engaging Diversity: An Inclusive Approach to Undergraduate Mentorship in Mobilization and Political Economy

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The political science discipline faces significant disparities in the representation and participation of underrepresented minorities in graduate education. This lack of diversity among political scientists results in a narrower range of questions being explored within the field. Furthermore, the underrepresentation is particularly pronounced in the political methodology subfield, limiting the scope of tools and perspectives to those predominantly shaped by white scholars. This article proposes a template for teaching and mentoring undergraduate students from underrepresented backgrounds to enhance their opportunities in graduate programs. We examine the Mobilization and Political Economy program, a summer research initiative aimed at minority-serving institutions and underrepresented minorities, designed to equip participants with the tools to study social movements, political mobilization, and structural inequality.

**Keywords**: Graduate pipeline program, undergraduate, underrepresented minorities, mobilization, political economy.

## INTRODUCTION

Scholars from different fields have consistently shown that students from underrepresented groups, such as first-generation college students, students of color, and women, often do not participate in research and professional development programs early in their college careers (Schultz et al. 2011). For over forty years, national data have consistently highlighted significant educational disparities among racial and ethnic groups in the United States, with Latinx, African Americans, American Indians, and Pacific Islanders being underrepresented in higher education (Schultz et al. 2011). Furthermore, even when these students access higher education, they are more likely to drop out (Monforti and Michelson 2008). Common hurdles such as financial difficulties, lack of information, and inadequate institutional support and networks contribute to this trend. These trends in the pipeline, in turn, affect the composition of faculty bodies at U.S. universities, which are disproportionately filled by faculty from privileged socio-economic backgrounds (Morgan et al. 2022; Matias, Lewis, and Hope 2022).

The Mobilization and Political Economy (MPE) Summer Program–an 8-week, in-residence program– seeks to provide a template to addressing these disparities. More specifically, the program supports undergraduate

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research experiences for underrepresented minorities with the end of bolstering their academic and professional careers. This article outlines the goals and principles of the MPE program. This type of targeted initiatives, including graduate pipeline programs, are crucial in that they help to diversify the scholarly community and other labor markets, thus potentially having a noteworthy social impacts. In the case of academia, scientists from underrepresented groups can serve as role models and inspire underrepresented students to pursue academic careers across multiple disciplines (O'Donnell et al. 2015).

The MPE Summer Research Program aims to provide students from underrepresented minority groups with training in research methods and substantive knowledge in the fields of social movements and political economy. Hosted by the University of Pittsburgh, this 8-week, in-residence summer program offers one-on-one mentorship opportunities and professional development workshops with the goal of making valuable resources accessible to aspiring researchers in the social sciences. MPE is built upon existing programs, including the Research Experiences for Undergraduates (REU) sites (funded by the National Science Foundation) and the Minority Graduate Placement Program (MIGAP), a pilot program created by two of the MPE co-directors to support undergraduate political science students at the University of Puerto Rico in gaining admission to graduate schools (Tormos-Aponte and Velez-Serrano 2020).

Establishing connections that extend beyond solely research-oriented interactions is essential for effectively mentoring students from underrepresented backgrounds (Chemers et al. 2011; Ishiyama 2007). Our program fosters this goal through personalized mentoring, multiple layers of support, community-building opportunities, and networking initiatives. Accordingly, the following sections detail the core principles of our mentorship approach in the MPE program, along with specific examples of its implementation.

#### **RECRUITMENT STRATEGIES**

The field of political science faces significant challenges regarding diversity and inclusion. Data from from American Political Science Association (APSA) reveal a stark representation gap among ethnic/racial groups– Black and Latinx scholars constitute a mere 8.7% of Political Methodology scholars, 12.4% in comparative politics, and 11.6% in American politics (American Political Science Association, 2023).<sup>1</sup> These gaps highlight a critical issue: minority students are less likely to participate in these higher education spaces, find peers, faculty, or mentors with shared experiences, and see their interests and experiences reflected in their syllabi. Previous research has also shown that stereotype threat, along with other barriers,

deters even highly qualified students from underrepresented groups from pursuing competitive opportunities (Steele and Aronson 1995).

In this vein, REUs have been identified as crucial spaces to address the pipeline issue within and beyond the field of political science (Mueller 2023; Russell, Hancock, and McCullough 2007). To diversify the applicant pool, our outreach efforts concentrated on Minority Serving and non-R1 institutions, ultimately recruiting two cohorts of students with representation from over 50% of Minority Serving Institutions (MSIs)– in fact, more than fifty percent of the first two cohorts (2023 and 2024) of MPE fellows came from MSIs. This effort seeks to create a more inclusive and supportive environment for minority students, encouraging their success in the social sciences.

To accomplish these goals, the MPE team used the NASA MSI List developed by the NASA Office of STEM Engagement Minority University Research and Education Project (MUREP) as our main point of reference. We then created a database of approximately 1,000 contacts by manually scraping MSI websites to collect emails addresses of administrators who are positioned to share the MPE application call with undergraduate students. Additionally, we leveraged platforms such as APSA, Twitter, LinkedIn and other social media channels to tap into our professional networks. The application process was designed with accessibility in mind, thus featuring short answer questions rather than lengthy essays. Additionally, in alignment with research that suggests such requirements can introduce bias, we did not require letters of recommendation (Posselt 2018); instead, applicants were asked to provide the names and contact information of two professors. Finally, we organized Zoom information sessions with the directors of the program, which included a Q&A portion. This inclusive and multi-dimensional approach proved effective, resulting in over 60 applications in the first year, with 8 candidates ultimately being selected by a diverse committee comprised of faculty from various institutions.

## **BENEFITS & PRINCIPLES OF THE PROGRAM**

Our program followed many of the best practices that previous scholars have identified for addressing the unique needs of underrepresented students (e.g, Shanahan et al. 2015; Becker 2020). Below, we describe these points.

# **Rigorous Methods Training**

The MPE program is designed to provide rigorous training on both qualitative and quantitative methods. Recognizing the importance of quantitative methods in the social sciences, and the ways that quantitative skills gaps have historically disadvantaged minority students (Smith, Gillooly, and Hardt 2022; Shames and Wise 2017; Perry, Zuhlke, and Tormos-Aponte 2023). Our program focuses on teaching these methods using hands-on labs rather than lectures. This approach ensures a low student-to-instructor ratio (3:1) to allow for more personalized attention. Participants also learned to code and received training in open-source software for quantitative and qualitative analysis. We structured our methods training so that the participants had access to multiple layers of mentorship– peers, graduate teaching assistants, and faculty instructors. This structure facilitated a supportive and personalized experience for each participant.

### Multiple Layers of Mentorship

Beyond the aforementioned scenarios, students developed relationships with multiple layers of mentors who were encouraged to offer constructive feedback and guidance. During the recruitment and early stages of the program, we emphasized these features, as previous research has highlighted the importance of personal support for successful mentorship of minority students (Ishiyama 2007; Becker, Graham, and Zvobgo 2021).

This multi-layered mentorship strategy includes different types of actors including graduate students, faculty, undergraduate research assistants, program-associated faculty, and one-on-one meetings with guest speakers. These diverse interactions provided students with a comprehensive understanding of Ph.D. programs, encompassing both peer and near-peer mentorship experiences. Additionally, for their final research projects, students worked closely with both a graduate student and a faculty member who were aligned with their research area.

The program structure ensured that mentors were approachable and available, thus fostering an environment where students felt supported. Additionally, as suggested by Ishiyama (2007) and Mekolichick and Gibbs (2012), our program provided first-generation students with guidance beyond research, addressing pragmatic concerns such as career and graduate school planning. We hosted professionalization talks that offered clear guidance on graduate program applications and highlighted available resources. The goal of this component is for students to complete the MPE program with a comprehensive and competitive Ph.D. application package, as well as long-lasting mentoring relationships. Beyond these steps, the mentors supported students when they applied to graduate programs during the fall term.

### Building Community among Members of the Team

A key principle of our program is fostering a sense of community among the team members. We aimed to build a cohesive cohort of MPE team members and students by promoting appropriate social-emotional ties. Previous work demonstrates that mentors who work with more than one student at a time often help build trusting interpersonal relationships among the team members (e.g, Behar-Horenstein, Roberts, and Dix 2010; Ishiyama 2007; Mekolichick and Gibbs 2012; Chemers et al. 2011). We took several steps to encourage these strategies. The program was residential, ensuring that students had guaranteed housing and access to university facilities as if they were regular students. This arrangement allowed them to live together and build strong emotional ties over the eight weeks of the program. Additionally, lunch was provided almost every day, with faculty, mentors, and program coordinators often participating in these meals. This setup was crucial for building relationships outside the classroom. Graduate student mentors also worked with more than one student at a time, fostering group work and encouraging students to support each other by discussing their progress and challenges.

These measures not only enhanced the learning experience but also helped create a supportive and collaborative environment. By living, dining, and working closely together, students formed a tightly-knit community, which was essential for their academic and personal growth. This communal approach ensured that students felt supported both academically and emotionally, which is vital for their success in the program and beyond.

### Professionalization and Students' Networking

Our program includes several tools for professional development beyond the typical classroom and lab training. Students received practical guidance on various research-related skills, including reference management, citation mapping, time management, and presentation skills.

We also offered students valuable networking opportunities by introducing them to various speakers in the fields of mobilization and political economy, as well as colleagues on campus. Previous work has highlighted the importance of these networking opportunities for students' success (Mabrouk 2009; Mabrouk and Peters 2000; Shore 2024). These interactions allowed students to have one-on-one meetings with leading experts, providing them with insights and guidance from key references in their areas of interest. Additionally, these meetings helped students enhance their presentation skills and professional demeanor, further preparing them for their future academic and professional endeavors.

# Substantive Focus and Applied Research in Mobilization and Political Economy

Substantively, our program focuses on the interrelated fields of political economy and minority mobilization. In doing so, we address the fundamental question: what are the pathways by which people come together to challenge socio-economic and political structures? To that end, our program's primary intervention concerns the intellectual advancement that stems from increased diversity in higher education. While diversity is often referenced as the key or conduit for the revitalization of democracy, little is known about the drivers and consequences of minority mobilization outside of electoral forms of political participation. Despite its importance, minority mobilization faces numerous obstacles and challenges that threaten its recognition, political engagement, and their impact on the overall health of global democracy. Social movement scholars identify varying political economies as important mediators of the emergence, trajectories, and political outcomes of minority mobilization. This program enables further research into the drivers and political consequences of the mobilization for marginalized groups' right. Equipping students from underrepresented backgrounds in the methods and theories associated with the study of mobilization and political economy is one critical pathway for increasing representation among the academic community that engages with these topics.

## Material Conditions

Many students from underrepresented backgrounds face financial pressures and often need to work while studying. The summer period, in particular, can be a critical time for students to earn extra money to alleviate the financial burdens of the academic year. Supported by the National Science Foundation, the MPE program prioritizes this aspect by providing students with a salary for eight weeks, covering lodging and transportation, and taking care of all their meals. This comprehensive support allows students to focus on the program without concerns about financial strain. By alleviating financial pressures, we hope students can actively engage with their research projects and take full advantage of the learning opportunities provided. By addressing both financial and academic needs, our program seeks to empower underrepresented students to achieve their full potential.

### INSTITUTIONAL SUPPORT

The vast majority of NSF REU Site Program funds are meant to support student participants. This means that the costs to coordinate the program must be kept to a minimum if a proposal is to be successful. These constraints have implications for the program's feasibility and the impact they have on program leaders and coordinators. Institutional support is necessary to cope with these challenges.

The University of Pittsburgh provided ample support for the Mobilization and Political Economy program. Securing this support required multi-level advocacy for the program and mobilizing faculty and administrators as advocates with other colleagues. A widely shared deep and far-reaching commitment to the program's aims motivated successful advocacy, resulting in the program receiving in-kind support. This consisted of additional salary for faculty leaders, a dedicated graduate assistant for the duration of the award period, support for hiring undergraduate student workers, funding for social events, faculty mentoring for program participants, and senior faculty mentoring for junior program faculty leaders. Further, our home academic unit adopted faculty tenure and promotion guidelines that credited junior faculty for their contributions to diversity.

Strong institutional support was a condition for achieving this program's goals. To be clear, we do not claim that programs cannot survive without institutional support. However, as we implemented our program design, we constantly questioned whether we could accomplish our stated goals without institutional support. Without institutional support, this program would have relied on significant uncompensated labor, had negative professional and personal consequences, and led to faculty burnout and resentment. Running a program under these conditions would make its survival beyond its initial period of performance and renewal unlikely. Similarly, we do not argue that colleagues at unsupportive institutions should not be funded through NSF REU Sites programs. Rather, funding agencies should avoid making institutional support a criteria for selection while accounting for variation of institutional support when allocating funds. Grant-making agencies and foundations must fund these programs accordingly if these programs are to avoid one-way bridges that extract MSI talent and hamper the far-reaching societal impacts of MSIs.

#### CONCLUSION

Demographic diversity among research professionals is essential for advancing knowledge and understanding across the social and behavioral sciences. This project provides a template for pathways to bolster undergraduate research participation among underrepresented minorities and minority-serving institutions. Furthermore, this model promotes demographic and methodological diversity in the social sciences through evidence-based strategies that combine practical research experience with research skills training. Replicating our MPE program template will produce scholarship in teaching and learning, guiding faculty in their efforts to enhance inclusive teaching excellence and advising.

The MPE Summer Program has oncentrated on recruiting, training, and mentoring diverse undergraduates to feed the graduate pipeline and foster successful careers in the social sciences. Our model provides a general framework for mentored research that can be adapted to various contexts, which seeks to address more factors than just financial limitations. By combining practical and rigorous training, one-on-one interactions,

multiple layers of mentorship, and ensuring material support, we can offer solid opportunities for professional and personal development to undergraduate students from vulnerable backgrounds.

Additionally, the MPE program has the potential to be an effective recruitment strategy for R1 institutions committed to reducing bias in Ph.D. admissions, which often rely heavily on letters of recommendation and the prestige of applicants' alma maters. By investing in this approach, institutions can democratize and diversify access to and retention in PhD programs, promoting a more diverse and inclusive academic environment. This holistic mentorship model not only enhances students' academic and professional development but also contributes to broader efforts to diversify the pipeline of future scholars in social science.

#### References

- Becker, Megan. 2020. "Importing the Laboratory Model to the Social Sciences: Prospects for Improving Mentoring of Undergraduate Researchers." *Journal of Political Science Education* 16 (2): 212–224.
- Becker, Megan, Benjamin A. T. Graham, and Kelebogile Zvobgo. 2021. "The Stewardship Model: An Inclusive Approach to Undergraduate Research." *PS: Political Science & Politics* 54 (1): 158–162.
- Behar-Horenstein, Linda S., Kellie W. Roberts, and Alice C. Dix. 2010. "Mentoring Undergraduate Researchers: An Exploratory Study of Students' and Professors' Perceptions." *Mentoring & Tutoring: Partnership in Learning* 18 (3): 269–291.
- Chemers, Martin M., Eileen L. Zurbriggen, Moin Syed, Barbara K. Goza, and Steve Bearman. 2011. "The Role of Efficacy and Identity in Science Career Commitment Among Underrepresented Minority Students: Efficacy and Identity in Science Career Commitment." *Journal of Social Issues* 67 (3): 469–491.
- Ishiyama, John. 2007. "Expectations and perceptions of undergraduate research mentoring: Comparing first generation, low income white/Caucasian and African American students." *College Student Journal* 41 (3): 540.
- Mabrouk, Patricia Ann. 2009. "Survey Study Investigating the Significance of Conference Participation to Undergraduate Research Students." *Journal of Chemical Education* 86 (11): 1335.
- Mabrouk, Patricia Ann, and Kristen Peters. 2000. "Student Perspectives on Undergraduate Research (UR) Experiences in Chemistry and Biology."

- Matias, J. Nathan, Neil A. Lewis, and Elan C. Hope. 2022. "US universities are not succeeding in diversifying faculty." *Nature Human Behaviour* 6 (12): 1606–1608.
- Mekolichick, Jeanne, and Michael King Gibbs. 2012. "Understanding college generational status in the undergraduate research mentored relationship." *Council on Undergraduate Research Quarterly* 33 (2): 40–47.
- Monforti, Jessica Lavariega, and Melissa R. Michelson. 2008. "Diagnosing the leaky pipeline: Continuing barriers to the retention of Latinas and Latinos in political science." *PS: Political Science & Politics* 41 (1): 161–166.
- Morgan, Allison C., Nicholas LaBerge, Daniel B. Larremore, Mirta Galesic, Jennie E. Brand, and Aaron Clauset. 2022. "Socioeconomic roots of academic faculty." *Nature Human Behaviour* 6 (12): 1625– 1633.
- Mueller, Lisa. 2023. "Accidental Scientists: How Undergraduate Research in Political Science Can Help to Patch the "Leaky Pipeline" in STEM Education." *PS: Political Science & Politics* 56 (4): 506–511.
- O'Donnell, Ken, Judy Botelho, Jessica Brown, Gerardo M. González, and William Head. 2015. "Undergraduate Research and Its Impact on Student Success for Underrepresented Students." *New Directions for Higher Education* 2015 (169): 27–38.
- Perry, Brittany N., Samantha Zuhlke, and Fernando Tormos-Aponte. 2023. "Building Infrastructure to Enhance Diversity in Political Methodology." *PS: Political Science & Politics* 56 (1): 178–182.
- Russell, Susan H., Mary P. Hancock, and James McCullough. 2007. "Benefits of Undergraduate Research Experiences." *Science* 316 (5824): 548–549.
- Schultz, P. Wesley, Paul R. Hernandez, Anna Woodcock, Mica Estrada, Randie C. Chance, Maria Aguilar, and Richard T. Serpe. 2011. "Patching the Pipeline: Reducing Educational Disparities in the Sciences Through Minority Training Programs." *Educational Evaluation and Policy Analysis* 33 (1): 95–114.
- Shames, Shauna L., and Tess Wise. 2017. "Gender, Diversity, and Methods in Political Science: A Theory of Selection and Survival Biases." *PS: Political Science & Politics* 50 (03): 811–823.
- Shanahan, Jenny Olin, Elizabeth Ackley-Holbrook, Eric Hall, Kearsley Stewart, and Helen Walkington. 2015. "Ten Salient Practices of Undergraduate Research Mentors: A Review of the Literature." *Mentoring & Tutoring: Partnership in Learning* 23 (5): 359–376.

Shore, Cecilia. 2024. "Toward recognizing high-quality faculty mentoring of undergraduate scholars."

- Smith, Amy Erica, Shauna N. Gillooly, and Heidi Hardt. 2022. "Assessing Racial/Ethnic and Gender Gaps in Political Science PhD Students' Methodological Self-Efficacy." *PS: Political Science & Politics* 55 (1): 165–170.
- Steele, Claude M., and Joshua Aronson. 1995. "Stereotype threat and the intellectual test performance of African Americans." *Journal of personality and social psychology* 69 (5): 797.
- Tormos-Aponte, Fernando, and Mayra Velez-Serrano. 2020. "BROADENING THE PATHWAY FOR GRADU-ATE STUDIES IN POLITICAL SCIENCE." *PS: Political Science & Politics* 53 (1): 145–146.