LGBTQ+ Lesbian • Gay • Bisexual • Transgender • Queer

Inclusivity in

STEM

Science • Technology • Engineering • Math

By: Micaela O. and Zoee W.

Why Do We Care? - Inclusion is Critical

We as students, have witnessed and recognized issues regarding LGBTQ+ inclusivity on campus and in STEM

"Over the last two decades the issue of inclusion and equity has been a significant topic of concern in the science, technology, engineering, and mathematics (STEM) community." (Barthelemy, R. S., et al.(2022). Physical Review Physics Education Research)

LGBT resource center on campus is currently student focused and the Center for Teaching Excellence (CTE-MBE) currently does not provide resources specific to LGBTQ+ inclusivity.

In order to promote awareness of the LGBTQ+ STEM community here on campus, we decided to conduct a survey.

Survey Details

Conducted in a 21 day period

50 respondents

Promoted via flyers, class announcements, and by word of mouth

Question themes:

- Demographic
- Openness in STEM
- Misgendering
- Discrimination

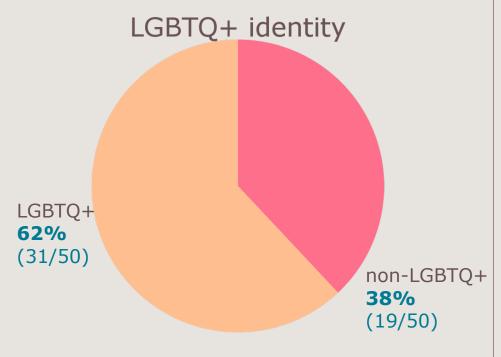
- Facilitating Inclusivity
- Need for Education/training
- Welcoming environments
- Overall experience

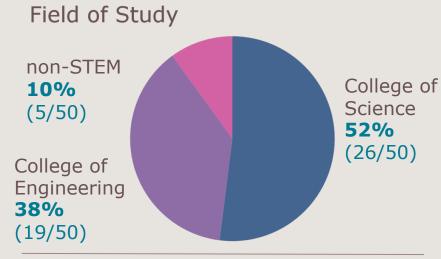
Student Stories: Confirming a Lack of Inclusivity

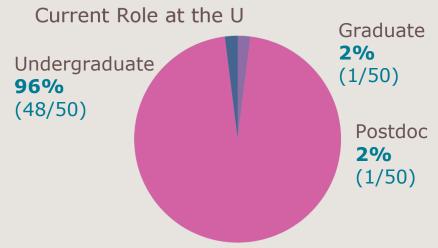
"I feel like there's a large intersection of LGBTQ+ people and STEM that no one talks about. **Our identities are hush-hush in STEM classes."**

"I have met some of the most accepting people and some of the most ignorant people here at the U. I have been fortunate enough to meet a community of people who are LGBT+ in STEM and they make me feel very welcome and happy. But a lot of faculty and people in power are not aware/[are] naive to LGBT+ issues. It's hard to speak up if from the start there is not an environment created that is welcoming."

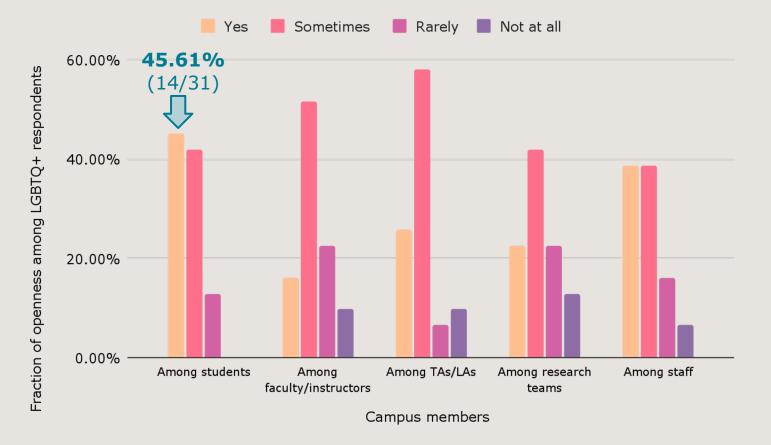
Demographics







Do LGBTQ+ identifying participants feel they can always be open about their sexual orientation and/or gender identity?



Student Stories: Openness in STEM

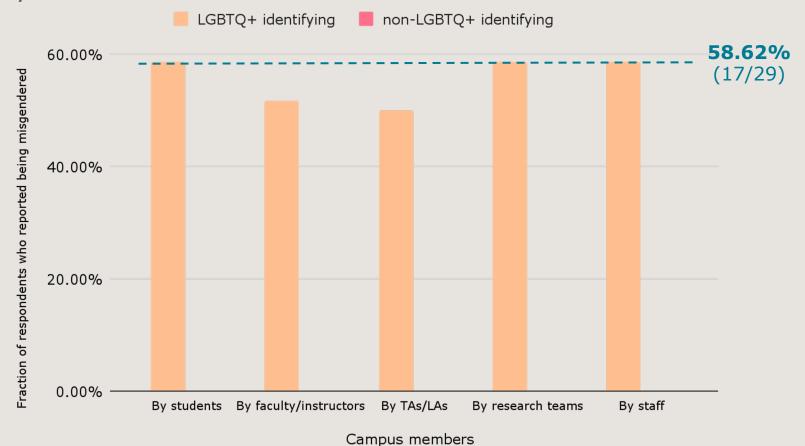
"I usually am not very out in a lot of STEM spaces because I am unaware if the spaces are welcoming."

"Whenever LGBTQ topics come up in a STEM class (mainly amongst students, rarely in class material) you can see *students rolling their eyes*."

"University's copy & paste inclusivity statements on syllabi lack any thought from professors—they are entirely performative."

Possible Solution: Professors can take time to familiarize themselves with resources provided on syllabi and provide supplemental resources. Be knowledgeable, share, and discuss resources for LGBTQ+ members to promote inclusivity.

Participants who have been misgendered in a STEM environment at the University of Utah



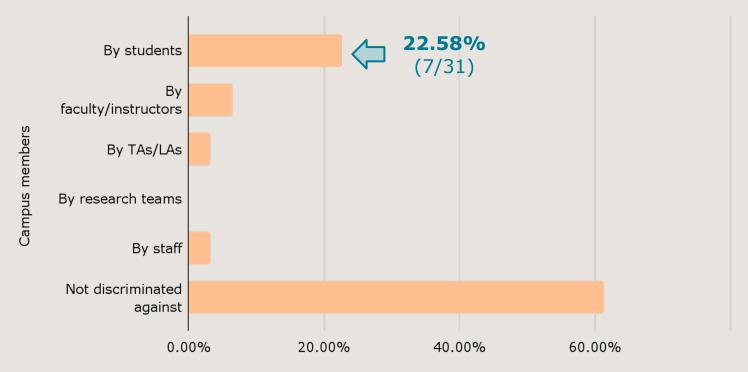
Student Stories: Misgendering Experiences

"I've seen a TA be misgendered multiple times *intentionally* by students."

"The STEM tower is generally pretty accepting of my identity. They generally didn't make a large deal of it when they did misgender me, simply accepting and fixed their mistake by saying sorry."

Possible Solution: Mistakes happen, if you misgender someone, apologize once, move on, and make an effort to not repeat your mistakes.

LGBTQ+ identifying participants' experience with discrimination



Fraction of LGBTQ+ respondents who have experienced discrimination

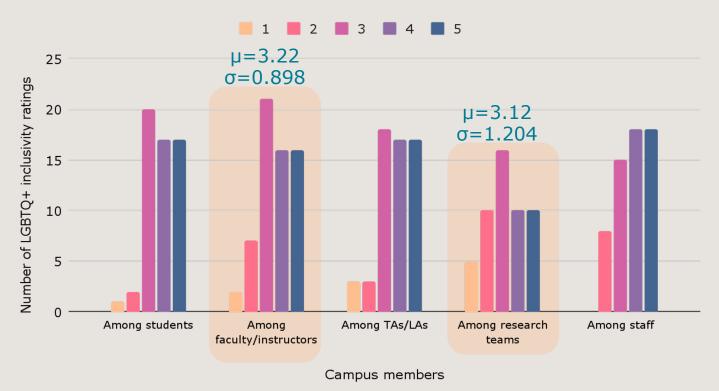
Student Stories: Discrimination in STEM

"Professor made a discriminatory joke about LGBTQ+ community"

"I was *outed* by a classmate and consequently barred from a study group. I also received a number of small microaggressions throughout the rest of the semester about my sexuality from various students in the class. It was not significant enough nor was I empowered enough to approach the professor about this due to *his own biases that were reflected in how he treated me.*"

Any acts of discrimination can be anonymously reported to the <u>University of Utah Racist and Bias Incident Response Team</u>, regardless of severity!

How participants rate LGBTQ+ inclusivity at the University of Utah (1 being not very inclusive, and 5 being very inclusive)



 μ = mean σ = standard deviation

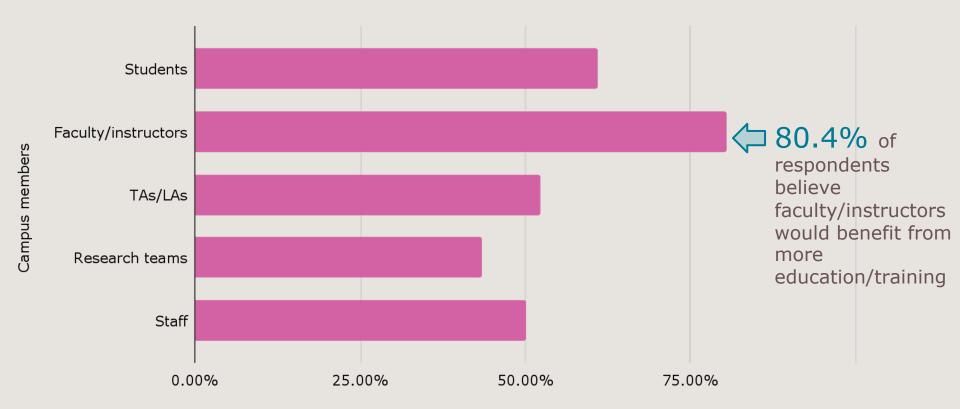
Student Stories: Inclusivity / Awareness

"I made a friend in a biology class when we started talking about chosen names. It was really fun to talk to *someone who had a similar experience* to me as a trans person in some sort of environmental studies program."

"I have seen a few students in my classes be misgendered by the majority. I think teachers try to follow pronouns if they are in Canvas with your name, otherwise, they will just assume cis pronouns."

Possible Solution: At the beginning of the semester professors can encourage and demonstrate to students how to include their preferred name and pronouns on their canvas profile.

Who would benefit from more education/training about LGBTQ+ identities? (as indicated by survey respondents)



Fraction of respondents who indicated training/education is needed for campus members

Common Themes in Student Stories

- Ambiguous safety in campus STEM environments

Students report feeling syllabi inclusivity statements are "performative", uncertainty regarding what campus environments are welcoming, and overall "stigma".

- Discrimination

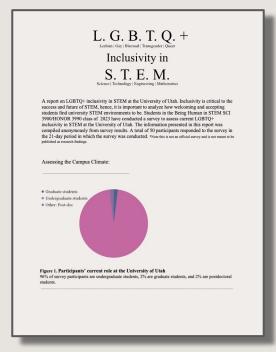
Students report discrimination through intentional misgendering and discriminatory jokes.

Finding support

Students report feeling comfortable with certain campus members and being able to find support systems within the campus community. Frequently mentioned support/safety include: OSTEM (Out In STEM), informal student friendship support, some professors, and advisors.

Find More Information on Our Report

In lieu of the understaffing being experienced by the LGBT Resource Center on campus, listed in our report are resources that can help provide support, education, and awareness on and off campus



What You Can Do

For Administrators:

Provide and seek opportunities for training/education about LGBTQ+ identities and barriers for faculty/instructors, research teams, and staff.

For Instructors:

Be knowledgeable, share, and discuss resources for LGBTQ+ members to promote inclusivity.

Encourage and demonstrate to students how to include their preferred name and pronouns on their Canvas profile.

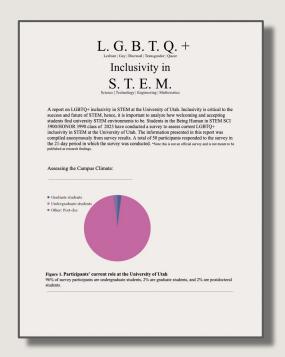
For Everyone:

If you misgender someone, apologize once, move on, and make an effort to not repeat your mistakes.

Consider introducing yourself by stating your pronouns. Seek opportunities to self-educate yourself on LGBTQ+ topics.

Acknowledgments

- Shelby Hearn (Coordinator of Education and Leadership)
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- Zane C. (graphical interface)
- Thank you to our wonderful professors
- We want to give a huge thank you to all of our survey participants. You are seen and heard.



And finally, we want to thank those of you who are taking the time to self-educate, advocating for the LGBTQ+ community, and ultimately aiming to promote more inclusivity in STEM for the LGBTQ+ community here at the University of Utah.