Dear Dean Bandas,

My name is Melinda Staub, a graduating senior at Vanderbilt University in the College of Arts and Science. I am writing to share with you the results of my Honors thesis, which examined the perception of Vanderbilt University’s research and advising programs by STEM undergraduate students.

I apologize because this is a long email. I conducted this study because I want to give back to Vanderbilt, which has afforded me such amazing opportunities and paved the way to my success in medical school. I hope that my suggestions could provide additional support to Vanderbilt’s STEM women/minority students and contribute to Vanderbilt’s dedication to excellence in STEM education.

During my four years as a Latina pre-medical student I have seen a need for more support for STEM undergraduate students and especially those with an underrepresented gender and/or race/ethnicity. After being accepted into Washington University in St. Louis School of Medicine, I reflected on what aspects of my undergraduate experience contributed to my ability to successfully move forward in my STEM career path. I realized that mentorship I found with a student of a higher year, undergraduate research, and mentorship I found through an organization were the most significant experiences. While Vanderbilt offers many resources for STEM undergraduates – both generally and specifically for minority students – I felt that these resources lack organization and accessibility. This prompted me to create a study to evaluate the perception of fellow STEM undergraduates on guidance resources available on campus to see if changes should be made at Vanderbilt to improve the retention of minority undergraduate STEM students.

My investigation focused on how mentorship and research might especially help students who face a combined disadvantage of being a gender minority and a person of color interested in STEM at Vanderbilt. From the data it can be concluded that both research and mentorship can increase confidence in science/learning skills, belonging in the scientific community, and interest in a STEM career – all of which are proven to increase resilience. This investigation also shed light on aspects of Vanderbilt that can be improved to best support their students:

**1)**    **Integrating research into the undergraduate curriculum for STEM students so they have more structured time to pursue research for the duration of their undergraduate education.**

**2)**    **Paying student researchers to promote equitable opportunity for all students regardless of financial background.**

**3)**    **Advertising a wide variety of research projects to demonstrate the applicability of science research to all cultural backgrounds.**

**4)**    **Investigate what about disciplinary advising is ineffective to gather data to improve Vanderbilt’s advising program and more specifically shape it towards the needs of the students.**

**5)**    **Increase gender and racial/ethnic diversity of Vanderbilt faculty to improve the effectiveness of mentorship.**

**6)**    **Create more opportunity and time for students to meet students of a higher year, since this form of mentorship has the greatest positive impact on persistence skills.**

My full Honors thesis is attached to this email. Thank you so much for taking the time to read this. If I can offer any additional information, please let me know.

Many thanks,

Melinda Staub

Vanderbilt University, Class of 2020

MHS & WGS Major