



From High School to Sacramento City College: Using URE to recruit underrepresented STEM students

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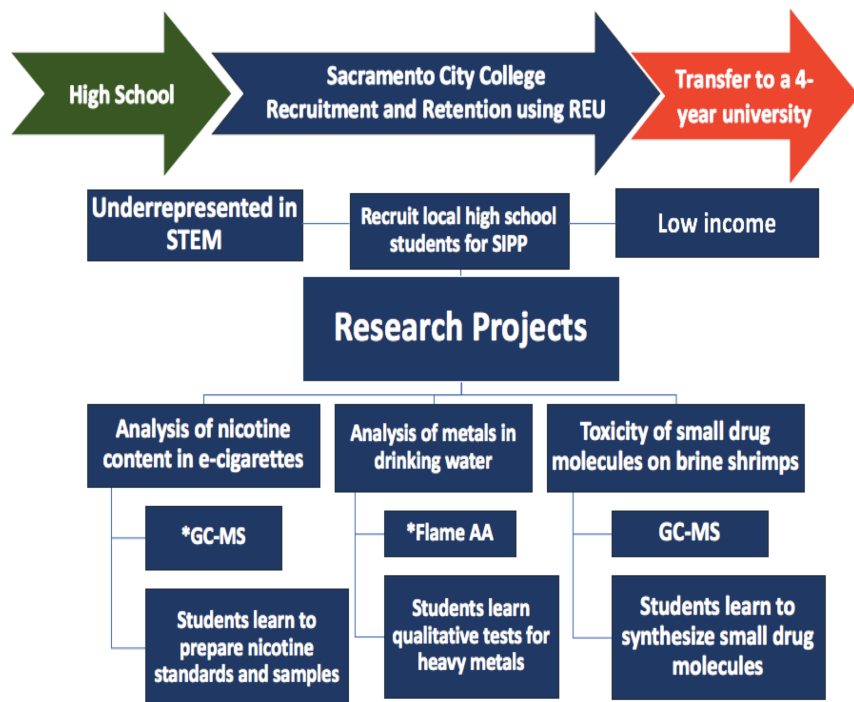


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Summary of REU

- The Science Innovation Pipeline Program (SIPP) is a mentoring and summer research program that is aimed at providing underrepresented and low income high school students with early hands-on science research experience.
- The goal is to use this program as a direct pipeline to help to improve the recruitment and retention rates of minority students in the sciences at Sacramento City College by keeping them actively involved in scientific research from high school until they transfer to a 4-year institution.
- In summer 2019, we selected 11 students from different local high schools in the Sacramento area to work on chemistry research projects.
- The surveys collected from the program showed that the students expressed a greater interest in pursuing a science degree.

SIPP Approach



*GC-MS: Gas chromatography–mass spectrometry, *Flame AA: Flame Atomic Absorption

SIPP Outcomes



Assessment of SIPP

- The students stated on post-surveys that the practical research experience was an important tool to enhance their interest to pursue a STEM degree and consider science careers.
- The results from post-surveys showed that the hands-on research and mentoring experience was essential to boost the students' confidence and motivation to continue learning science.
- The students stated that having the opportunity to conduct science research during college would help them to be more motivated to complete a STEM degree because of the practical applications.

Challenges of SIPP and lesson learned

- It is challenging to get financial support for the program.
- Due to the limited financial support, we could only run the program for one week.
- Lesson learned: Work with local teachers to identify students for the program.

URE Impact

- SIPP helps to improve students' confidence to pursue a STEM degree and consider a science career.
- SIPP helps to recruit underrepresented and low income students for science programs through hands-on research and mentorship.
- SIPP creates a pathway that help students to be actively engaged in research at Sacramento City College until they transfer to a 4-year university.