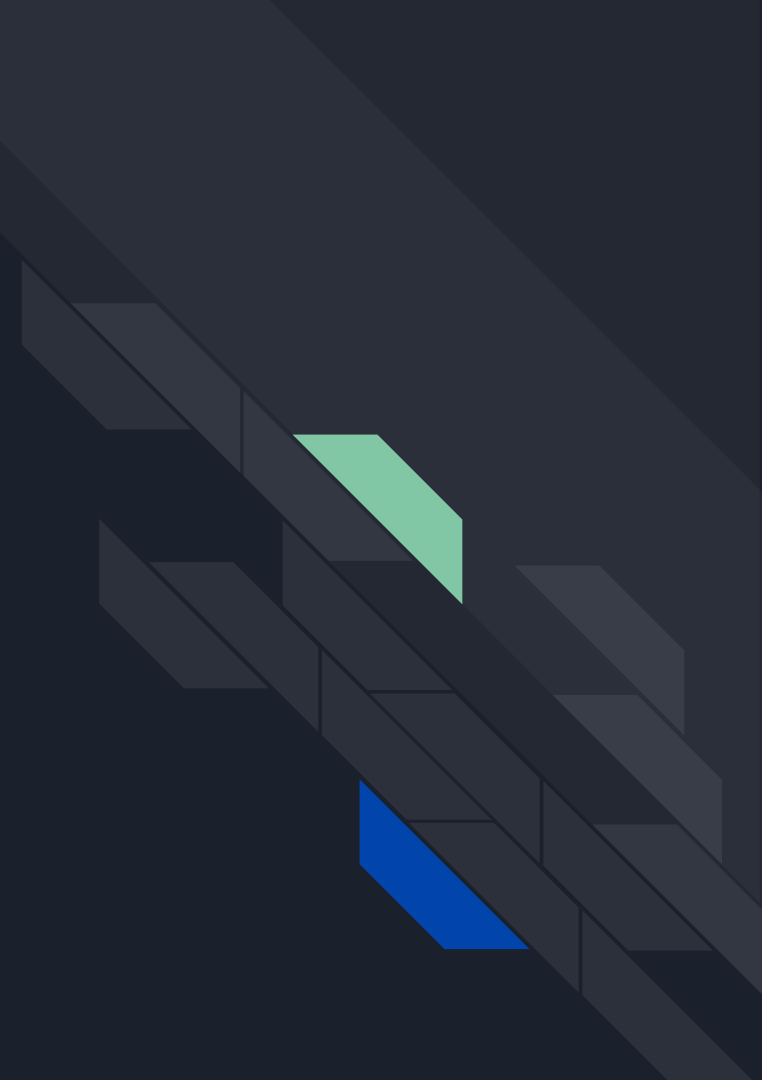




# Examining Supplemental Instruction as a Support Model for Academic Equity

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As a result of the increasing access to higher education, institutions are developing more extensive support programs, and supplemental instruction (SI) is one opportunity to develop students' learning, promote academic success, and encourage equitable education for all students.





# What is Supplemental Instruction?

- Academic support model developed in 1973 as a form of collaborative, student-centered support for historically challenging classes (Dawson et al., 2014)
- Can be adapted and adjusted based on the need of the higher education institution and the students, but there are several tenants that remain consistent:
  - Course integration
  - Peer-to-peer interaction
  - Developing metacognition and study skills
  - Proactive rather than reactive support (Arendale, 1992; Yue, 2018)
- These features of SI, when properly implemented and developed by the institutions, have the potential to empower students, expand higher education access, and even replace previously established policies such as non-credit or remedial courses that often act as barriers for students success and retention.



# Research Questions

- Is supplemental instruction a viable academic support model for educational equity?
  - Why or why not?
- How can supplemental instruction support underrepresented and underprepared students?
  - Can this be done without further alienating these populations or labeling them “at-risk” or remedial?
- What are the benefits of supplemental instruction beyond the academic support?
  - Does supplemental instruction encourage a stronger sense of academic ability, intercollegiate collaboration, self-determination within underrepresented students, progress within academic programs, overall higher education institution retention rates?
- Should supplemental instruction replace previous policies or can it work in conjunction with other models of academic support?
  - Which academic policies are supporting students and which could be harming them?
- Overall, what are the measurable takeaways from supplemental instruction?
  - Who benefits and why?



# Theoretical Constructs

## **Hierarchy of Learning Improvement Programs – Keimig (1983)**

- A system that discusses key academic support programs and ranks their effectiveness in improving student success
- Identified course integrated learning services (SI) as highly impactful learning programs due to their direct connection to the courses
- Tutoring and remedial courses are ranked lower because academic skills and concepts are often “taught in isolation from actual course content” within these models (Arendale, 1992, p. 6).

## **Self-Determination Theory – Ryan & Deci (1985)**

- A framework for understanding intrinsic motivation and factors that encourage learning and growing in education
- Academic outcomes are higher when three specific student needs are met: autonomy, competence, and relatedness
- These three needs can be met with integrated support methods (SI) which will encourage higher intrinsic motivation and therefore “more adaptive learning attitudes, academic success, and personal well-being” (Chirkov, 2009, p. 255).



## Application of Theoretical Constructs

Conventional support methods, like tutoring and remedial courses, tend to rely on traditional reactive methods of students seeking out assistance once they realize they need it. SI is a proactive support system that encourages students to “become actively involved in their own learning” (Arendale, 1992, p. 9). In this way, SI is not only a high-level support model on the Hierarchy of Learning Improvement Programs, but it is also directly encouraging students to develop their intrinsic motivation as a feature of the self-determination theory.



# Methodology

Using the self-determination theory as a guiding concept, purposive group interviews will be conducted with students, faculty, and staff to identify key areas of growth that can be applied throughout SI programs.

While ensuring representation from students who have a high level of participation and success in the courses is important, it is equally important to examine the students who have low levels of participation or are unsuccessful in the course.

The setting and sample represented in this study will reflect these varied situations while the group interview will allow for discussion among peer groups related to shared or divergent SI experiences, including those of the SI leaders, faculty, and staff members.



# Research Design

The research study would consist of various purposive group interviews, with student groups divided based on the percent of SI sessions attended over the course of the semester, as well as a group interview of SI leaders and a final group of faculty and SI coordinators.

Students would be divided into the following interview groups:

- Students who attended 50% or more SI sessions

- Students who attended 25-50% of SI sessions

- Students who attended fewer than 25% of SI sessions

This would encourage focused dialogue between group members, as they will have experienced a similar number of SI sessions, even if they have dissimilar experiences within those sessions.

Depending on the number of individuals who agree to participate in the research study, the group interviews could potentially require multiple sessions for each subgroup, as too many participants in one interview could be difficult for the researcher to manage.





## “Results”

Most SI research is quantitative and examines numerical data such as course grades, overall GPAs, and compares students based on SI attendance, **often without factoring in self-selection bias, student backgrounds, or concepts of intrinsic motivation.**

This study would examine qualitative research areas including **student motivation, academic engagement, social well-being, and the overall perception of SI** from students regardless of their grades, GPAs, or attendance rates as well as the perspective of those involved in the program, including SI leaders, faculty, and administrative staff.

Hopefully, the results would show overlap in how interview participants view the **goals, strengths, and weakness of SI that could then be utilized to improve the overall impact of SI as a form of academic equity** and allow for the implementation of a similar survey at other institutions to form a cross analysis of various SI programs.



Questions or  
Suggestions?



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