Gen Z Arriving at the Table: Providing Access to Argument-Based Concepts Using Moses' Framework

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As part of their general education requirements, many incoming college students are required to enroll in composition courses that explore various college-level writing practices. Some students, including those who are part of Generation Z, struggle because they may be unfamiliar with academically-dense language, lack real-world experience using argument-based concepts, or have had fewer opportunities to discuss such concepts in depth. To address these student struggles at a public university, Robert Moses' framework (Moses & Cobb, 2001) was used in two first-year composition course lessons to determine how this scaffolded, student-centered pedagogical approach would impact students' comprehension and application of several key argument concepts: ethos, pathos, logos, and synthesis. The first Moses'-based lesson established the approach's impact from pre- to post-test, while the second Moses'-based lesson was compared to a more teacher-centered lesson. The drastic gains from pre- to post-test in both of the Moses'-based lessons, which also surpassed gains from the teacher-centered lesson's post-test scores, revealed the clear impact of Moses' framework: When given real-world experience (via Steps 0, 1, and 6), a chance to discuss, draw, and represent argument concepts (via Steps 2, 3, and 5), and scaffolded explanations of academic language (via Step 4), students' test performance improved greatly. These results highlight that if Gen Z students are to blossom into confident members of the academic community, they need to be actively involved in their own learning process, and for their interests, values, and cultural knowledge to bear on lesson content, a hallmark of Moses' framework.

Introduction

In order to excel in an academic setting, strong writing skills are not only vital but expected. As a consequence, when enrolling into the California state university system, all incoming first-year students are prompted to evaluate their writing proficiencies in order to determine which course placement will best support their needs as newly admitted academic writers (California State University, n.d.). However, a number of students struggle to pass these self-selected first-year composition courses with the minimum passing grade (C- or higher) and need to repeat the course, highlighting how taking the most academically-appropriate writing class does not ensure success (Callahan & Chumney, 2009). During the past two and a half years, the COVID-19 pandemic created other barriers for many college students as this new reality has influenced how they perceive the stability of their academic futures (Clabaugh et al., 2021), their emotional and mental well beings (Clabaugh et al., 2021; Mute Browning et al., 2021), and their financial security (Ornelas et al., 2021), especially for female students and those who identify as people of color (Clabaugh et al., 2021; Mute Browning et al., 2021; Ornelas et al., 2021). Such hardships have also been felt by my own students enrolled in writing courses designed to help ease their transition from high school to college.

However, the road to remediation is not immediately clear as English lecturers, including me, will simply direct all non-passing first-year students to take the course again, and if possible, with extra outside support. A few of these non-passing first-year students will end up in my English courses from time to time. During the 2022 spring semester, though, what normally

would be a few students transformed into a completely novel situation: The large majority of my students taking the first class in a two-semester composition sequence were repeating the course after failing the previous fall. When I realized who my students were, a daunting question came to mind: How could I best support these students who have experienced such an academic setback?

Literature Review

Connecting to Students within My Classroom

Even though this particular group of students was new to me, I have been teaching Generation Z (from here on referred to as "Gen Z"), those born between 1997 and 2012, since the beginning of my teaching career. As their instructor, I have noticed how Gen Z students thrive in lively class discussions and have a strong preference for group work in which they are invited to turn to one another for academic and personal support. Gen Z students, thus, have consistently struck me as socially adept and driven learners, which seems appropriate as some of their core characteristics include, according to Prensky (2001), being skilled with "receiving information fast […]," and "enjoying complex, multilayered processing, preferring multimodally textured input, random interactions, working with others and instant gratification" (p. 3). During our class discussions, I can see how these core ways of interacting with content and each other brings a sense of comfort as they openly use familiar language while also bringing their social and cultural knowledge to bear on class lessons without much prompting. However, their joy in exchanging everyday expressions and experiences rarely transformed into finding joy in academic conversations or the work needed to become more familiar with their structures.

In fact, writing in a university setting is very difficult for multiple reasons. For instance, first-year students in college writing courses in the United States often notice how writing at this level is much different from what they have encountered at high school, and as a result, often feel underprepared (Eades, 2005; O'Brien-Moran & Soiferman, 2010). Such feelings are likely because writing in a college-level class places unfamiliar and intense demands on these first-year college students (Ruecker, 2011; Wells, 2011). On top of feeling underprepared and facing multiple challenges with writing, many students see these courses as a gateway to other courses, another check point they need to pass through in order to achieve the ultimate goal of graduation. Moreover, many of my own students do not identify themselves as writers, let alone *good* writers.

Socializing as Active Learning

To help my own composition students, it was necessary to build a bridge between what students knew, what they valued, and what the college English curriculum required them to know and value as writers within a university setting, as described by Bizzell (1986) when she first set out to understand the difficult transition borne by students matriculating from high school to college. At the start of the semester, I decided it would be best to create the bridge alone, asking my students (enrolled across the four composition sections I was teaching) to follow my lectures, answer the questions I prompted, and write within rigid parameters to meet the courses' learning outcomes (see Appendix B). However, I began to worry that building such a *bridge* through a teacher-centered, or "sage on the stage", approach would most likely create a learning environment where my voice would dominate.

Writing at the university, however, is a practice of literacy, as Olson et al. (2017) point out. Bizzell (1986) also noted how academia, not just the classroom, is more language-focused and driven by its very nature, using language as the main way to spread scholarship and knowledge. Thus, all first-year Gen Z students of various writing abilities are expected to learn the language practices of academia to be successful in college. Reynolds and Bruch (2002) argue that writing can be seen as a form of social interaction, and that learning can happen through this type of interaction. Thus, constructing dialogues in the classroom, amongst students and between students and teachers, can help move students to be actively involved in the co-construction of meaning (Fecho et al., 2012) during the learning process. If Gen Z students are to blossom into confident members of the academic community, I realized I needed to step aside and deliberately invite my students to take part in classroom dialogues so that they could use their own voices to think and reason within a new social context (Vygotsky, 1978), while also eliciting their "funds of knowledge" (Moll, Amanti, Neff, & González, 1992, p.133) as a means to bridge the world they know to the world of academia to which they now belong. If such a model of classroom dialogue was implemented, my Gen Z students would have a better chance to develop their writing in a more socially-active manner versus passively sitting for yet another one of my lectures.

As an example of the power of social interactions in a writing class, Khalsa (2015) noted that when students engaged in peer-based discussions, there was improvement in their overall academic performance. Moreover, she argued that students "prefer classrooms where they can construct knowledge, solve problems, consider perspectives, and struggle with concepts" (p. 149). But active learning preferences are not unique to writing classrooms. Examining the effect of group work within various university classrooms, Ahn and Class (2011) concluded that the social interactions built into group work and peer discussions were crucial in two ways: 1) Having students co-construct knowledge with one another led to an increase in their participation within class conversations, and 2) these interactions changed the students' learning approach since these student-centered activities became "an inclusive exercise that potentially benefits and empowers all of the actors and excludes none" (p. 270). Embedding a student-centered and socially-driven pedagogy is likely to foster a classroom environment where students see themselves as "agents of their own learning" (p. 270) who are relevant and needed members of academia.

The Parlor of Generation Z and Moses' Framework

Encouraging students to find their agency in the university aligns with the legacy of academic writing. When considering a more socially-driven pedagogy, Kenneth Burke (1941), a rhetorician known for dissecting the social context of language, and his parlor metaphor come to mind. According to Burke, a newcomer enters the parlor room and sees various tables, each filled with people engaged in lively conversations that started long before their arrival. The newcomer then moves from table to table, actively listening to each topic being discussed, and then when they feel ready, jump into the fray, adding their voice to the fabric of the ongoing discourse. Burke's parlor metaphor is an elegant way to describe the process of learning to talk, think, and reason within an academic setting. But more importantly, this metaphor underscores the importance of social interactions in relation to learning; in fact, Burke himself referred to the parlor as the "unending conversation" metaphor (p.110-111).

While powerful in its imagery, Burke's metaphor does not explicitly outline which teaching practices could foster such conversations, let alone ones Gen Z students would highly

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value (Seemiller et al., 2020). Robert Moses' framework (Moses & Cobb, 2001), though, could provide such guidance (see Figures 1 and 2 in the editorial). Instead of only learning to become part of the ongoing conversation, Moses' scaffolded framework emphasizes how novice learners can become a part of academic conversations by using their prior knowledge and cultural experiences *within* the conversation. Newcomers, or first-year college students, do not have to talk their way into acceptance; instead, within Moses' student-centered steps, new learners' experiences and language *become part of* the conversation, which will then provide a means for these students to develop a meaningful connection to academic concepts they are learning.

Purpose of the Study and Research Questions

Since choosing an effective pedagogical approach is an important factor within the influential classroom experiences curated by the instructor (Eades, 2005), I speculated that Moses' socially-driven framework (Moses & Cobb, 2001) could provide both the academic and social support Generation Z students needed to thrive at the university. To do so, I designed socially-driven lessons using Moses' framework in order to answer the following research question: What impact does Moses' framework, which includes the use of student-to-student and teacher-to-student social opportunities, have on first-year writing students' comprehension of several argument concepts?

Method

Participants

For this study, three writing classes offered during spring 2022 at a public university, a Hispanic Serving Institution located in the greater Los Angeles area, were selected. All three classes were part of the English First-Year Composition sequence and included students whose racial and ethnic makeup was representative of the broader university student population. Moreover, the vast majority of these students were between the ages of 18-19, and thus, were Gen Z. I have designated the classes as A, B, and C in order to maintain my students' privacy. Also, I have outlined several key differences among the three groups related to class size, academic hardships, and language backgrounds below.

Class A

Class A was the largest of the three classes with 23 students (10 males, 11 females, and 2 students who identified as non-binary). I selected these students as my primary participants due to the high rate of students who were repeating the course (approximately 96%).

Class B

In Class B, students were taking the second semester of the Stretch Composition sequence. The size of the class was comparatively smaller than Class A with a total of 14 students (11 males, 3 females). These students were selected as participants because their demographics were similar to Class A.

Class C

Class C was the smallest, comprising a total of 8 students (6 males, 2 females). This course was the only one designated as multilingual (Classes A and B were not), with 75% of the students speaking more than one language at home and one student identifying as an international student**.** I selected these students as participants because they were a consistently higher performing class throughout the semester when compared to Class A and B. Additionally,

in order to compare the impact of Moses' framework in Class A and B, I determined that Class C would serve as the best non-experimental group while Class A and B with serve as the experimental groups for my second Moses'-based lesson.

Study Design and Procedures

For this study, I created two lessons using Moses' framework, one to teach the rhetorical appeals, which include ethos, pathos, and logos, and another to teach the concept of synthesis used in research-based writing. These concepts were chosen because they are part of the student learning outcomes of the composition sequence (see Appendix B). In each Moses'-based lesson, I utilized all five steps of Moses' framework (Moses & Cobb, 2001), and I also included Step 0 and Step 6 designed to model the lesson's context, tone, as well as every day and academic language explored (Ahn et al., 2018).

First Lesson on Rhetorical Appeals Using Moses' Framework

For the first lesson (see Appendix A), Class A was given a pre- and post-test of ten questions about ethos, pathos, and logos, which were concepts they needed to master as part of the first half of the stretch composition sequence's student learning outcomes (see Appendix B). These questions borrowed language and structure from quizzes outlined in *From Inquiry to Academic Writing* (Greene & Lidinsky, 2015), and focused on assessing the students' conceptual understanding, as well as some application of these terms. Testing the students' conceptual understanding was crucial since Moses' framework works best when used for teaching abstract concepts instead of teaching specific strategies or skills. These students also answered two reflection questions as part of the post-test (see Appendix C).

At the start of the class period, Class A completed the pre-test within a short period (roughly 5-7 minutes). After the tests were collected, I grouped students into five groups, ranging from three to four members each (based on attendance). I then began my lesson, starting with Step 0, which is a skit to set the mood, explaining to my students that I needed their help to determine where I should eat for dinner. Once I explained my dilemma, I instructed the students to write a recommendation that would persuade me to choose their restaurant (Step 1), which unexpectedly took up the majority of the class time (30-35 minutes). During this step, I walked around the classroom, listened to their conversations, and encouraged the students to use any and all means they believed were necessary to persuade me to choose their restaurant, including words, visuals, props, and even relevant dancing and music (additions my students wanted to include). Once they were ready, each group went to the front of the and took a few minutes to share their recommendation. I encouraged the class to listen to each group and applaud once they were finished. After all groups had delivered their recommendation, I instructed each student to complete Step 2, expressing through drawings and symbols and answering the following guiding question: How did you and your peers come up with your recommendation? Afterwards, I asked them to move on to Step 3, sharing their Step 2 responses with one another. Due to the time used for Steps 0-3, I decided to complete Steps 4-6 of the lesson at the start of the following class session.

At the beginning of our next class period, I asked students to discuss what they remembered from their conversations with one another, and I used the white board to take class notes (encouraging students to use Step 2 notes to help them recall what they were discussing). I then moved on to Step 4, using the class notes--which included multiple examples of everyday language related to the appeals—to the academic concepts and terms of ethos, pathos, and logos.

During this process, I emphasized how all of their restaurant recommendations used ethos, pathos, and logos, which were rhetorical tools meant to convince an audience, to persuade me. We then moved on to Step 5, which is when students I asked the students create a symbolic representation or gesture of ethos, pathos, or logos and share their representations and/or gestures with their peers. I modeled my own gestures for ethos, logos, and pathos, using my hands and body, explaining how each gesture connected to the core meaning of the associated term. Each group was then assigned one term, and after a few minutes, one member from each group stood up and presented the gesture to the whole class, who would then repeat the gesture back to the group. Afterwards, I connected the symbolic representations and language of the appeals back to my original skit of choosing a place to eat by explaining how I will use their "appealing" suggestions to make my decision (Step 6). The students then completed the post-test (taking the same amount of time as the pre-test) (see Appendix C).

Second Lesson on Synthesis Using Moses' Framework

For the second lesson (see Appendix A), I implemented an experimental lesson model to compare the assessment results of Classes A and B, who were taught about *synthesis* using Moses' framework, to the assessment results of Class C, who were taught using a more traditional lecture in which I only used Steps 4 and 5 of the original Moses'-informed synthesis lesson.

In order to make a comparison between the experimental class and the non-experimental classes, Classes A, B, and C were each given the same pre-test before the synthesis lesson. The only difference in their post-tests was that the non-experimental group (Class C) was not asked the two reflection questions since they did not experience a Moses' informed lesson. However, Classes A and B answered the same two reflection questions (from the first lesson) as part of the post-test (see Appendix C).

At the beginning of each class, I distributed the pre-test, giving the students a short time to complete all five questions (approximately 5-7 minutes). After I collected the pre-tests in Classes A and B, I started the Moses'-based lesson with Step 0, during which I played examples of popular music and explained that I admired how the artists' pulled inspiration from multiple sources to create some of their most popular tracks. I then introduced Step 1 and passed out a worksheet the students would use to create their own verses for a new pop song, pulling ideas from several sources, just like the musical examples I shared. The students worked in groups of three to five students (depending on class attendance). Once they completed the task, they shared (but did not sing) their new verses and applauded one another's efforts. I then instructed each student to complete Step 2, expressing through drawings and symbols, their answer to the following guiding question: How did you and your peers come up with your verse? I then asked the students to complete Step 3, sharing their responses with their respective group members. We then moved on to Step 4, and I used a PowerPoint presentation to guide the students through the connection between popular examples of synthesis (such as pop music) to academic versions of the concept, such as researched and heavily sourced writing. To complete Step 5, I asked students to draw and/or create a gesture that would symbolically represent the concept of "synthesis". Once they shared their drawings and/or gestures with a partner, I connected their symbolic representations of synthesizing to my opening skit in which I explored how musicians synthesize various musical ideas to create new music (Step 6). At the end of the lesson, the students completed the post-test (taking the same amount of time as the pre-test) (see Appendix C).

Synthesis Using Traditional Lecture Format

At the beginning of the class, I distributed the pre-test and gave the class approximately five minutes to complete all five questions. Since I was using a traditional lecture approach in this class, I opened up the class with a short question and answer portion about synthesis, using PowerPoint for visual support. Then, I then transitioned to Steps 4 and 5 of my Moses'-based lesson, which explored synthesis using academic language and examples. I reviewed a few everyday examples that connected the academic language to more familiar uses of synthesis, such as popular music, biology, and cars. While I was defining, explaining, and reviewing these examples of synthesis in both academic and more familiar settings, I asked students to turn to each other and see what questions or concerns their peers had, and then I answered their questions once we came back together as a class. I then asked the students to create their own symbolic representation of synthesis, explicitly asking them to connect the concept to academic writing. Some students drew what synthesis would look like in their next essay assignment, which required the integration of multiple sources, while others created hand and body gestures to represent synthesizing multiple ideas into one. Once they shared their drawings and gestures, the students completed the post-test but did not answer the two reflection questions.

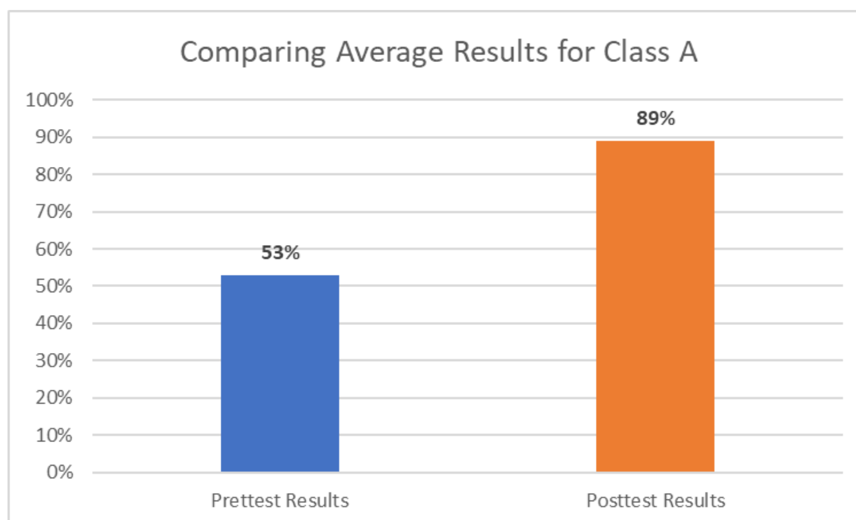
Results

Once I designed and carried out the lesson covering rhetorical appeals (ethos, pathos, and logos) and the lesson on synthesis using Moses' framework, I was able to compare the pre-test and post-test results. After comparing the pre-tests and post-tests, it became apparent how the students' scores were impacted differently by each pedagogical approach.

First Lesson on Appeals (Pathos, Logos, Ethos)

In Figure 1, the results for the pre-test and post-test related to ethos, pathos, and logos are placed side by side, revealing a stark difference in the average scores before the students experienced Moses' framework and after the completed Steps 0-6 of Moses' framework.

Figure 1.
Rhetorical Appeals Pre-test to Post-test Average Results

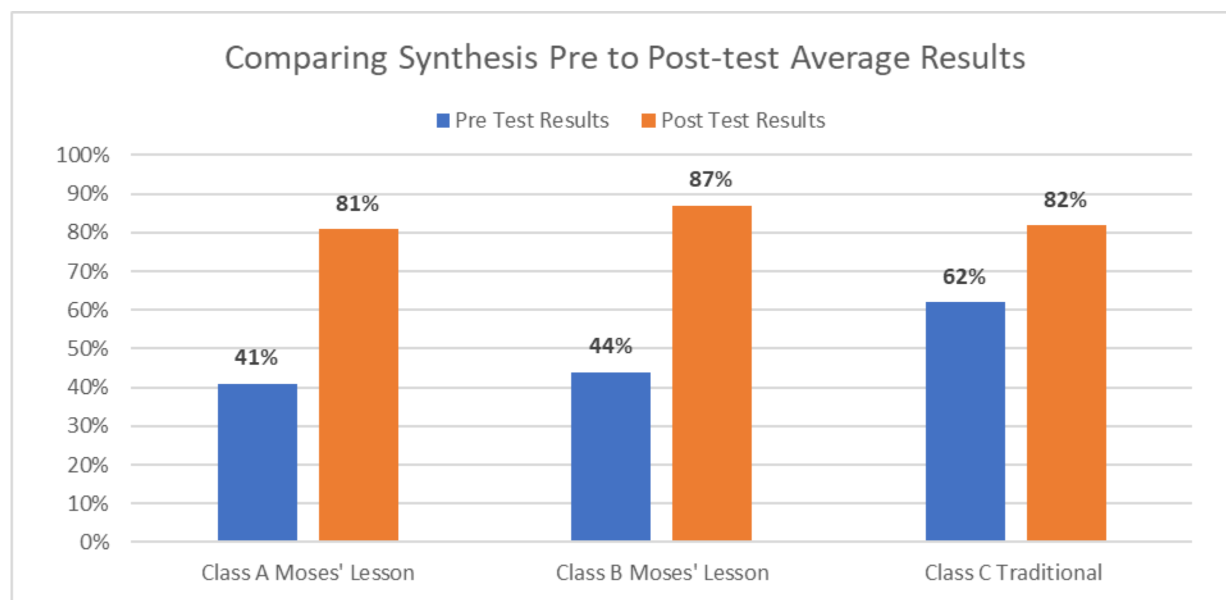


When comparing the results of each test outcome, the pre-test results showed that the students in this class came with some understanding and comprehension of ethos, pathos, and logos, with 16 students taking the pre-test and earning an average of 53%. This low score highlights how the students' conceptual understanding of these concepts was lacking since the average score was well below a passing grade. After I administered the Moses'-based lesson, there was a significant jump in the average number of questions answered correctly, with the new average score reaching 89% overall. The significant improvement in the students' scores point to the impact that the Moses'-based lesson had on the students' understanding of these concepts. In fact, these results demonstrate that after the Moses'-based lesson on the appeals, students went from answering a little over half of the questions correctly to earning an average of a score of 9/10, a 68% gain from pre-test to post-test.

Second Lesson on Synthesis

As described in Methods section, I designed and administered a synthesis lesson within Classes A and B utilizing Moses' framework. For Class C, I delivered a more traditional lecture about synthesis in order to compare the students' post-test outcomes to those of the experimental classes (Classes A and B) who were taught the same concept through the Moses'-based lesson. In the figure below, I have compared the results of the pre-tests and post-tests from each section.

Figure 2.
Synthesis Pre-test and Post-test Average Results



Based on these assessment results, there is a noticeable difference in pre-test-to-post-test gains when Class A and B learned about synthesis through Moses' framework compared to when Class C learned about the same concept via a more traditional lecture. For Classes A and B, the students earned an average pre-test score between 41%-44%. These scores reveal that these two sets of students had some understanding of synthesis, answering almost half the questions

correctly. However, once I taught synthesis using Moses' framework, there was significant boost in their post-test scores (similar to the post-test gains seen in Figure 1 for Class A).

Most notably, students in Class A saw a gain of 97% from their pre-test to post-test scores, with these students answering 81% of the questions correctly when the completed the test for a second time. Class B's results followed a similar trajectory as this group of students' post-test results showed they earned an average of 87% (the highest average score across all three classes).

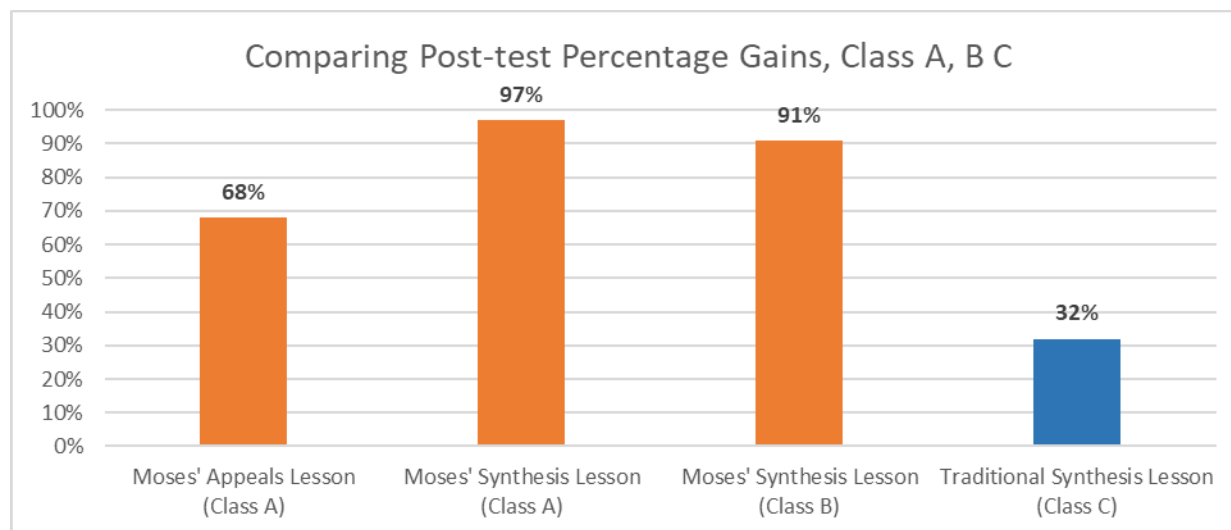
When comparing these results to the gains made by the students in Class C, which is the class I taught synthesis using a more traditional lecture approach, there are some differences worth highlighting. For example, Class C answered more questions correctly on the pre-test than Class A and B. This pre-test average score was to be expected as Class C was a higher performing class overall, as previously mentioned in the Methods section. However, this group of students still needed to review the concept of synthesis since the average pre-test score was barely above a D average. The students' average post-test score of 81%, though, reveals that the traditional lesson had an impact on their understanding of synthesis, but there was still room for improvement.

Comparing Post-test Results

Class C's post-test result mirrors that of Class A, which also earned an average of 81%, but was lower than Class B, which earned an average of 87%. In order to determine how impactful the Moses-based lesson was when compared to the traditional lecture approach, I needed to compare the percentage gains across all three classes (see Figure 3).

Figure 3.

Percentage Gains from Each Post-test Administered



In Figure 3, the percentage gains from pre-test to post-test were significantly higher when the students, from both Class A and Class B, learned a course concept, whether it was the appeals or synthesis, through a Moses-based lesson. For example, in the first lesson on rhetorical appeals (ethos, pathos, and logos), Class A saw a gain of 68% (see first bar in Figure 3). The trend of

significant gains continued in the synthesis lesson, as Class A's post-test results reveal that the students answered the questions with nearly double the accuracy, and thus, there was a 97% difference in their scores from pre-test to post-test. Class B saw a similar gain with a 91% difference in their scores from pre-test to post-test. While Class C did achieve a post-test score for the synthesis lesson that mirrored Class A and B (see Figure 2), the actual percentage difference was significantly lower at 32% gain from pre-test to post-test.

The differences in post-test gains (see Figure 3) point to the high likelihood the Moses-based lessons were more effective among those students (Classes A and B) who needed more scaffolding in order to connect their prior knowledge and understanding of the concepts to the academic language and usage commonly used in the writing classroom. In regard to Class C, the students' pre-test and post-test results underscore how their greater prior knowledge of the academic concept being taught and their propensity to be higher performers in the course prepared them to be an ideal control group.

Discussion

The purpose of this study was to determine how Moses' framework, which includes the use of student-to-student and teacher-to-student social opportunities would impact, if at all, the Gen Z students' understanding, comprehension, and application of several writing concepts. Based on the collected data from two lessons, there is strong evidence to suggest the social interactions embedded within Moses' framework did have a sizeable impact on student learning, with the post-test results showing post-test gains of least 68% to as much as 97%. These gains emphasize how the framework's application of multiple modes of learning, including several socially-based scaffolded steps, had a positive impact on student learning. Moses' framework also provided these students with an opportunity to generate and engage in academic discourse while using familiar language and build a bridge between their every literacy to college-level literacy practices, which is a key component to finding success in the university (Bizzell, 1986). The students were also given a chance to take part in a learning environment that was active and interactive, a desired aspect of classroom learning for Gen Z (Seemiller et al., 2020; Thinnukool & Kongchouy, 2017), as well as one that was multimodal, tapping into Gen Z's preference for multimodalities in the classroom (Ishak et al., 2022).

How Moses' Framework Helped Form the Bridge to Burke's Parlor

The biggest difference between the traditional lecture (which is more passive, teacher-centered) and a lesson that uses Moses' framework (one that is designed to be more active, student-centered) was the addition of more student and socially-driven components that were part of Steps 1-3. Step 1 used a common experience to start the conversation about the concept being taught. Step 2 encouraged students to reflect and express their own thinking, once again putting them at the center of the class conversation versus their instructor telling them what they were thinking. Then in Step 3, the students engaged in loud, lively, and unplanned conversations with one another in which they were exposed to multiple perspectives and shared thoughts without filtering or editing their voices or language to fit within classroom environment. My students were themselves during these social exchanges.

The heavy reliance on student conversations is an important element that connects Moses' framework to Burke's parlor. Burke imagined newcomers to academic discussions becoming part of the discussions once they stepped into academic spaces. However, it was

Moses' framework that gave these students a way to create these authentic conversations inspired by a problem or task they were familiar with (e.g., how to choose where to eat or how new music is created). Steps 2 and 3 invited the students to the table of discourse. There was no expectation for how they should or should not express themselves, what they should or should not draw, write, or say. Instead, these steps, framed with a guiding question, asked students to look within themselves for the knowledge and the language needed to carry out these tasks (Ahn & Class, 2011). These steps in Moses' framework were crucial because they rely on student-run conversations to propel the learning forward.

When reviewing Moses' framework, Steps 1-3 allowed students the space and thinking space or the opportunity to became actively engaged in their own learning processes (Vygotsky, 1978). They were not passive observers during these class sessions; instead, the students found a way to connect what they knew to what they were learning, and as a result, played an active part in the classroom (Gee, 2007). These steps were designed to elicit their prior knowledge and other relevant knowledge funds as a way to start building a bridge to the harder, more academically rigorous concepts (which are explored more explicitly in Steps 4 and 5). Because the students played an active role during Steps 1-3, I was able to guide their thinking and conversations so that they could cross this bridge and encounter the academic discourse with more confidence and familiarity.

Limitations and Opportunities for Future Research

The study did have some limitations due to the small sample size and the specificity of the academic concepts covered, which may or may not be applicable to other college courses. In terms of data collection, sufficient data were not collected to compare the first lesson to the second lesson using a second control group, making it difficult to determine if a traditional lecture would consistently yield lower test results. These gaps in knowledge, though, point to the need for further research in which more writing concepts could be taught using the same socially-driven Moses' framework or taught using the full extended framework that includes Steps 0 and 6 (Ahn et al., 2018). Applying different assessment questions and types could also test different gains in student knowledge. Since the reflection questions were not fully analyzed and coded for potential thematic responses in this study, there is also an opportunity for future qualitative research to incorporate students' reflections as a means to better understand the thinking and learning processes of Gen Z students.

Implications

There are two main strengths Moses' framework offered when teaching the Gen Z students in this study. First, the framework fosters a space where students could use their own voices, ideas, and expressions while learning academic concepts. Through the framework's heavy emphasis on social interactions, the students followed scaffolded steps that helped them work together to build a bridge between what they knew and what they needed to learn during the lesson. And because a bridge was indeed forged (as seen in the change in assessment scores in the Results section), there is a second strength worth highlighting: Moses' framework can be applied to classrooms other than math or STEM and have a meaningful impact on student learning. The learning outcomes of a writing classroom, for example, align well with the scaffolded steps of the framework since these steps encourage discussion and critical engagement with language. When students are interacting with one another in a writing class, such as the ones I taught as part of this study, they are invited to use the academic discourse and

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language of the university. In order to do so, though, it is vital that they are able to use their own linguistic and cultural knowledge as the very tools that will help them become successful contributors within the discourse.

Concluding Remarks

Deep and critical conversations happen within all university disciplines. Any college class serving active and socially-driven Gen Z students could apply Moses' framework as a means to invite their students' voices into those conversations. By doing so, Gen Z will be able to find their own place at the table.

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Appendix A

Lesson Plan on "Ethos, Pathos, and Logos"

Lesson taught in April 2022

Things to bring (for students): Paper and writing utensils (pens, markers, colored pencils)

Things to bring (for lesson): Wireless computer remote, boombox, glasses, money, and expo markers for white board

Prior to the meeting: Finalize visuals and directions with lesson ppt, print pre- and post-tests for lesson

Before lesson begins: Distribute pre-test and give students 5-7 minutes to complete, making sure to collect the tests before starting the Moses' lesson.

Step 0: 30 second skit with car noises and traffic playing, driver seat background, and glasses and money to convey the search for the best restaurant near campus, a place that is "appealing"

> Teacher: I'm so glad the day is over! But I need to figure out where my friend and I can get dinner after work. I only have ($) in my pocket, and I know I only have one tank of gas in my car. I need to go somewhere where I can afford to take my friend out, that has food we can eat, and that's close by. I wonder where I can go to eat that is appealing to us? Can you help me decide where I should go to eat?

Step 1:

> **Part 1**: Common physical activity (small groups) – Teacher will give instructions for writing and presenting a food recommendation, which includes getting students into groups of 3-4 students each (depending on class size). Each student group will decide where the teacher should go eat, using their knowledge of the surrounding area/cities near campus, and just in case they live far, they are allowed to use their phones to help them with their research (5 min). Then, each student group will be reminded to start pulling together notes they can refer to when presenting their recommendation to the teacher and to the class as a whole (additional 5 min). The teacher can walk around and monitor group discussion/work, answering any questions that they may have as they prepare their recommendation. The teacher may also ask students to stop working after the first 5 min, surveying the class for unanswered questions or concerns they may have about the activity.
>
> **Part: 2:** Come back together as a big group - each group shares their recommendation with the class, as well as the teacher, who will be the main audience for their presentation. Here, we will make comments such as "Wow! You really considered all of my needs and wants!" "What else can you tell me about the place you selected?" "Why did you choose that place for me?" (5-7 min, depending on the number of groups)

Step 2: Teacher will prepare a slide on the ppt with the guiding question on and show it before they start expressing or drawing. Make sure to show the question before Step 2, 3, & 4. In small groups, draw/express on the question: "What was your goal in putting or creating your food/restaurant recommendation? What were you trying to do and include in your suggestion and why?" They will share what they drew with their partners (3-4 min)

Step 3: In small groups, discuss the same guiding question verbally. Show the guiding question, making sure to illicit "appeal, popular, tasty/good, like, trust" etc. Monitor and listen to their responses, which are words and phrases that can connect to Step 4 (3 min)

Step 4: Teacher will facilitate this portion. Come back together as a big group. Teacher will show the guiding question. Have each group show their drawing & what they discussed on the guiding question. Connect what the groups said to the feature talk "ethos, pathos, and logos," writing notes on the board by arranging their notes and responses into categories that represent each appeal. Show the vocabulary words on ppt by breaking each word/term down, connecting to students' prior knowledge of the appeals to their academic definitions and their usage within rhetoric and academic writing (8-10 min with examples)

Step 5: Teacher will facilitate this portion. In small groups, come up with a gesture to symbolize "ethos" "pathos" or "logos", having each group concentrate on one term. Come together in big groups to share and do the motions together, making sure to differentiate between each appeal gesture (3-4 min)

Step 6 exit skit: Teacher says, "Wow, I have so many appealing choices to choose from! Now I know what places near campus are popular, have credibility because now I have heard some convincing and persuasive reviews, places that serve really tasty, affordable, and diverse food choices, and places that can fit my budget and near where I need to go! So, all these choices make sense!!" Teacher can choose to announce top choice or leave students in suspense, sharing their decision during the next class meeting.

After Moses' Lesson: Distribute post-test and give students 5-7 minutes to complete, making sure to collect the tests before students leave. If time runs out, have students take post-test at the beginning of the next class.

Total: 45-50 minutes

Lesson Plan on "Synthesis"

Lesson taught in May 2022

Things to bring (for students): Paper, writing utensils (pens, markers, colored pencils), handouts with lyrics for activity

Things to bring (for lesson): Wireless computer remote, boombox, glasses, money, and expo markers for white board

Prior to the meeting: Finalize visuals and directions with lesson ppt, print pre- and post-tests for lesson (depending on the class)

Before lesson begins: Distribute pre-test and give students 5-7 minutes to complete, making sure to collect the tests before starting the Moses' lesson.

Step 0: 30 second skit with popular song playing (one that uses samples or borrows from other artists, such as hip-hop), and visual from ppt as needed

> Teacher: Does everyone know this song? How do you know this song? I notice that I don't even have to hear the music to know what song this is and who this artist is! I love how this artist/band combined really interesting visuals with dance and a catchy melody and lyrics. They really knew how to pick and choose really great parts of older songs and art forms and blend them with their own original ideas. Now we can listen to a song and see a video that borrows and combines old and new to make something original.
>
> *Alternative Skit: Teacher plays a record executive looking for the next big hit to promote and specifies that they would like to find a group/artist/band that can combine lyrical moments from the past with new, original ideas, blending styles and musical approaches, in order to attract listeners that know what they already like but enjoy new approaches to a beloved genre or style.*

Step 1:

> **Part 1**: Common physical activity (small groups) – Teacher will give instructions for writing and presenting a new "hook" or chorus for an original song, which includes getting students into groups of 3-4 students each (depending on class size). Each student group will decide which two lyrical lines from previous popular songs they want to use in their new "hook" (5 min). Then, each student group will be reminded to start pulling together notes they can refer to when presenting their new "hook", which will have two old lines and two original lines, for a total of four, to the whole class (additional 5 min). The teacher can walk around and monitor group discussion/work, answering any questions that they may have as they prepare their new "hooks." The teacher may also ask students to stop working after the first 5 min, surveying the class for unanswered questions or concerns they may have about the activity.

Part: 2: Come back together as a big group - each group shares their new "hook" (by speaking or singing) with the class, as well as the teacher, who will be the main audience for their new "hook." Here, we will make comments such as "Wow! You selected some great lyrics from older songs and added your own twist! I can hear your original ideas blend well with the older lyrics!" "Which lyrics did you want to use, which words or phrases?" "Why did you choose these lines, words, or phrases?" (5-7 min, depending on the number of groups)

Step 2: Teacher will prepare a slide on the ppt with the guiding question on and show it before they start expressing or drawing. Make sure to show the question before Step 2, 3, & 4. In small groups, draw/express on the question(s): "How did you come up with your new "hook" with your group? Why did you choose these lyrics and not the other lyrics?" They will share what they drew with their partners (3-4 min)

Step 3: In small groups, discuss the same guiding question verbally. Show the guiding question, making sure to illicit "combine, blend, mix, merge" etc. Monitor and listen to their responses, which are words and phrases that can connect to Step 4 (3 min)

Step 4: Teacher will facilitate this portion. Come back together as a big group. Teacher will show the guiding question. Have each group show their drawing & what they discussed on the guiding question. Connect what the groups said to the feature talk "synthesis," writing notes on the board that represent the groups' responses to the guiding question. Show a vocabulary word (synthesis) on ppt by breaking the word/term down, connecting to students' prior knowledge of synthesis or types of synthesis used in everyday life to the academic definition and usage of the concept within academic writing (8-10 min with examples)

Step 5: Teacher will facilitate this portion. In small groups, come up with a gesture (that could be accompanied by a drawing) to symbolize "synthesis." Come together in big groups to share and do the motions together and share any drawn expressions that can further solidify the meaning for the students (3-4 min)

Step 6 exit skit: Teacher says, "Wow, I am really impressed by the original "hooks" that I heard today! I could really hear how you synthesized the older ideas from songs of the past with your own original ideas. The synthesis of the older and newer lyrics really came together to create something I never thought I would hear, and now I will have your "hooks" stuck in my head!"

After Moses' Lesson: Distribute post-test and give students 5-7 minutes to complete, making sure to collect the tests before students leave. If time runs out, have students take post-test at the beginning of the next class.

Total: 45-50 minutes

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Appendix B

Composition Learning Outcomes for First Year Composition Stretch Program, ENG 1100

A. Develop fluency in quickly externalizing ideas on paper and computer screens, and in moving from such notes to rough drafts of possible essays.
B. Explain in clearly written English the rhetoric of others.
C. Develop written arguments in response to others' arguments.
D. Write reasonably lucid, well-organized essays that address purpose, audience, and situation—in response to timed-exam prompts.
E. Reconstruct and revise the connections between claims, reasons, and evidence in their own writing, their peers', and published authors'.
F. Discern how the style of their own writing, their peers', and published authors' creates an appeal that pulls the audience closer to the material in question.
G. Analyze texts to apprehend more fully the relations among language use, power, and social hierarchies.
H. Create texts that respond to the language, discourse, and power dynamics in given contexts.
O. Proofread for correctness and clarity.

Composition Learning Outcomes for First Year Composition Stretch Program, ENG 1101

A. Develop fluency in quickly externalizing ideas on paper and computer screens, and in moving from such notes to rough drafts of possible essays.
B. Explain in clearly written English the rhetoric of others.
C. Develop written arguments in response to others' arguments.
D. Write reasonably lucid, well-organized essays that address purpose, audience, and situation—in response to timed-exam prompts.
E. Reconstruct and revise the connections between claims, reasons, and evidence in their own writing, their peers', and published authors'.
F. Discern how the style of their own writing, their peers', and published authors' creates an appeal that pulls the audience closer to the material in question.
G. Analyze texts to apprehend more fully the relations among language use, power, and social hierarchies.
H. Create texts that respond to the language, discourse, and power dynamics in given contexts.
I. Discern the various ways that generic strategies and formal, stylistic, tonal language, and discursive conventions can be manipulated to contribute to meaning-making in particular contexts.
J. Generate their own texts by making use of various generic strategies and particular language conventions for particular contexts.
K. Read difficult, research-based texts with critical understanding.

L. Design their own academic inquiries and develop strategies for finding, evaluating, and integrating information purposefully in a given context.
M. Critique their own ideas, form, and style in light of the contexts for which they are writing and with awareness of the generic choices they are making, and revise their own writing to improve form, style, and generic/institutional strategies to intervene more effectively in a given rhetorical situation.
N. Develop rhetorical strategies for effectively handling writing-related problems in discourse communities throughout the university.
O. Proofread for correctness and clarity.

Appendix C

Testing for the Appeals: Ethos, Pathos, and Logos

1) Of the forms of rhetoric, which primarily uses logic to persuade?
    a. Logos
    b. Ethos
    c. Pathos

2) Of the forms of rhetoric, which primarily uses emotion to persuade?
    a. Ethos
    b. Pathos
    c. Logos

3) Of the forms of rhetoric, which relies solely on the reputation of the speaker?
    a. Pathos
    b. Logos
    c. Ethos

4) Which is an example of ethos?
    a. Send us money or you're killing children in Africa!
    b. We've been doing business for 200 years.
    c. Our planes are designed with speed in mind; they can travel the speed of light!

5) Which is most likely an example of pathos?
    a. A beer commercial that has nothing to do with beer
    b. A company document
    c. A research paper

6) Which is most likely an example of logos?
    a. A beer commercial that has nothing to do with beer.
    b. We've been doing business for 200 years.
    c. This new technology is the best because of its versatility, usability, etc.

7) When an advertisement appeals to your feelings, and not to your logic, it is an example of
    a. stupidity.
    b. pathos.
    c. ethos.

8) Which is the best rhetoric?
    a. Ethos
    b. Pathos
    c. Logos
    d. None of the above

9) When a piece of literature appeals to your mind and explains things to you logically, it is using its...
    a. Ethos
    b. Pathos
    c. Mind
    d. Logos

10) What is the rhetorical triangle? Please draw and write your response below.

Reflection Questions

Compared to a dry lecture or a standard/traditional lecture, what was different about last Monday's activity on logos, pathos, ethos?

Name one way that you thought the lesson helped you or did not help you learn these three concepts of appeals. Be as detailed as needed.

Synthesis Assessment

1) What is Synthesis?
   a) Breaking down a quote and building it back up with your own ideas
   b) Using your opinion and forming an assessment of a quote or source
   c) Combining ideas to form a new idea

2) What is an example of Synthesis?
   a) Judging by that author's quote, the topic of English is more than just words, it can be many different things
   b) This quote mentions English is cool, I feel it is cool and helpful
   c) English is like a tool, you can use it to create something new

3) Synthesis is great for a Research Paper because…
   a) It proves you understand the quote/source
   b) It proves you can give an opinion about the quote/source
   c) It proves you can use the quote/source and your own opinion

4) What is NOT an example of Synthesis
   a) Creating a Works Cited page for an essay
   b) Mixing chemicals to create man-made oil
   c) Adding an effect to a piano to give it a new sound

5) What is an example of Synthesis in relation to song lyrics?
   a) rhyming
   b) the pitch, or melody, of the artists voice
   c) quoting a famous song lyric and adding your own lyrics to create your verse

Reflection Questions

Compared to a dry lecture or standard/traditional lecture what was the difference about Monday's activity on Synthesis?

Name one way you thought the lesson helped you (or did not help you) learn the concept of Synthesis. Be as detailed as needed.