Research Article

Effectiveness of Student Academic Policy Orientation of the Bachelor of Science in Economics Program, Bicol University College of Business, Economics and Management

Clea L. Bongat*

College of Business, Economics & Management Bicol University,4501, Philippines

ABSTRACT

This study examines the effectiveness of Academic Orientation Programs for incoming freshmen, shifters, and transferees in a college setting. The program is designed to familiarize students with the school environment, policies, rules, and the socio-cultural climate, helping them navigate academic life. The study assessed students' knowledge levels before and after the orientation using a pre-test and post-test, with a control group of students who did not participate in the orientation for comparison.

Results revealed that students in the experimental group (those who participated in the orientation) had an average knowledge level before the orientation, which improved significantly after the program. Post-test scores indicated a notable increase in students' understanding of academic policies, suggesting that the orientation had a positive effect on their knowledge. In contrast, students in the control group, who did not undergo the orientation, showed no significant improvement in their knowledge of academic policies. This comparison strengthens the conclusion that the orientation program effectively enhanced students' understanding of the school's academic environment. Common mistakes related to academic policies, procedures, and programs were identified in both groups, with the experimental group making fewer errors after the orientation.

The study recommends strategies to enhance the orientation program, including conducting a pre-assessment of student needs, developing relevant materials, employing a holistic delivery approach, and ensuring continuous evaluation. It also suggests that integrating orientation content consistently into classroom policies and course offerings can reinforce students' understanding.

The study concludes that regular and reinforced orientation programs are crucial for improving students' knowledge of academic policies. The inclusion of a control group reinforces the effectiveness of

the orientation program, and further research is encouraged to explore additional factors influencing the effectiveness of orientation and its impact on students' academic success.

Introduction

Orientation programs are commonly used by institutions to enhance student retention and engagement (Brawer, 1996). These programs help students adapt socially and academically, influencing their persistence and reducing withdrawal rates (Robinson, Burns, & Gaw, 1996). Hodum (2007) further emphasized the importance of orientation, stating, "Because of the difficulties new students may encounter upon starting college, an orientation program's ability to address students' needs could potentially persuade them in their decision to persist or leave".

While the College of Business, Economics, and Management (BUCBEM) has conducted informal orientation programs, no formal assessment of their effectiveness has been made. Observations show that despite these efforts, many students still struggle with basic academic requirements, such as managing absences or applying for a leave of absence. This gap in understanding of academic policies highlights the need for this study.

Previous research emphasizes the importance of academic policy knowledge in preventing academic dishonesty and promoting integrity (Jordan, 2001). Additionally, studies demonstrate that orientation programs positively affect academic performance. Busby et al. (2002) found that students who attended orientation had higher graduation rates and first-semester GPAs compared to those who did not.

According to Davis (2013), orientation programs are vital in helping students acclimate to college life and improve retention and success rates. These findings suggest that providing students with a clear understanding of academic policies, among other factors, plays a crucial role in their academic journey.

Beyond academic adaptation, orientation also supports students' career and emotional integration, contributing to their overall success (Daddona & Cooper, 2002; Kramer & Washburn, 1983; Robinson, Burns, & Gaw, 1996). Similarly, Owusu et al. (2014) found a correlation between academic orientation and higher cumulative GPAs among first-year students.

Given the significant role of orientation in student success, this study aims to fill the gap by evaluating how BUCBEM's orientation program enhances students' understanding of academic policies, ultimately supporting their academic achievement.

Methods

This study employed a pre-test, post-test quasi-experimental design using both a within-subjects and between-subjects approach. The participants were first-year students, including shifters and transferees, enrolled in the program/major. Students were selected based on pre-existing conditions, such as their availability or willingness to participate in the orientation, rather than random assignment. The participants were divided into two groups: an experimental group and a control group. The experimental group consisted of students who participated in the orientation, while the control group consisted of students who did not receive the orientation.

To assess the students' baseline knowledge of academic policies, a pre-test was administered to both groups before the orientation. Following the pre-test, the experimental group underwent the orientation program, whereas the control group did not. After the orientation, both groups completed a post-test to measure any changes in their knowledge of academic policies. Descriptive statistics, including the arithmetic mean, were used to summarize the pre-test and post-test scores of students in both groups.

To evaluate whether there was a significant difference in knowledge within each group, a paired t-test was conducted to compare the pre-test and post-test scores of both the experimental and control groups. This statistical test determined whether the orientation had a statistically significant effect on the students' understanding of academic policies.

Result and Discussion

The post-test results indicated a significant improvement in the students' knowledge of academic policies after participating in the orientation. Most students in the experimental group achieved higher scores on the post-test compared to their pre-test scores, demonstrating the effectiveness of the orientation program in enhancing their understanding of academic policies. In contrast, the control group, which did not participate in the orientation, showed minimal or no significant improvement in their post-test scores. This difference further emphasizes the positive impact of the orientation on the students' knowledge. The following tables provide a detailed overview of the pre-test and post-test scores for both the experimental and control groups, highlighting the extent of the knowledge gained through the orientation for the experimental group compared to the control group.

Table 1. Summary of the Scores for Pre-Test of the Experimental Group

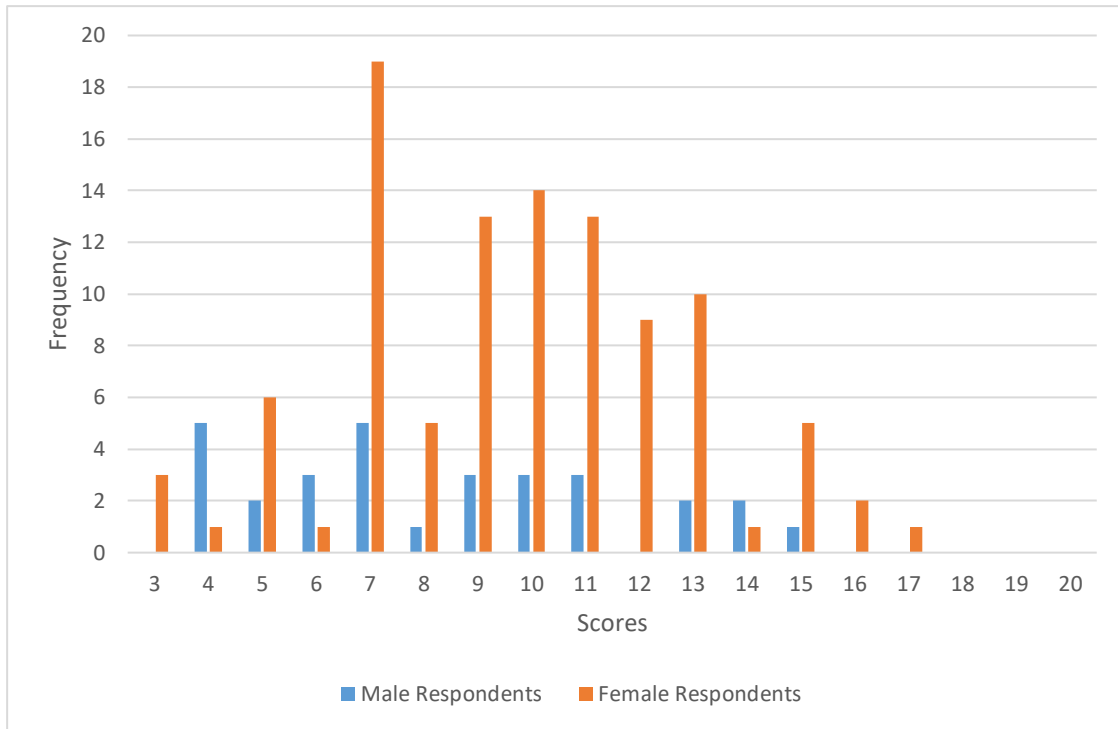| SCORE	FREQENCY OF MALE'S SCORE	FREQUENCY OF FEMALE'S SCORE
3	0	3
4	2	1
5	2	3
6	3	1
7	0	10
8	1	5
9	2	20
10	7	14
11	1	15
12	4	9
13	4	10
14	1	1
15	2	5
16	0	2
17	0	2
18	0	0
19	1	1
20	0	1

Figure 1. Distribution of Pre-Test Scores for the Experimental Group of BU CBEM Economics Freshmen

Table 2. Summary of the Scores for Post-Test of the Experimental Group

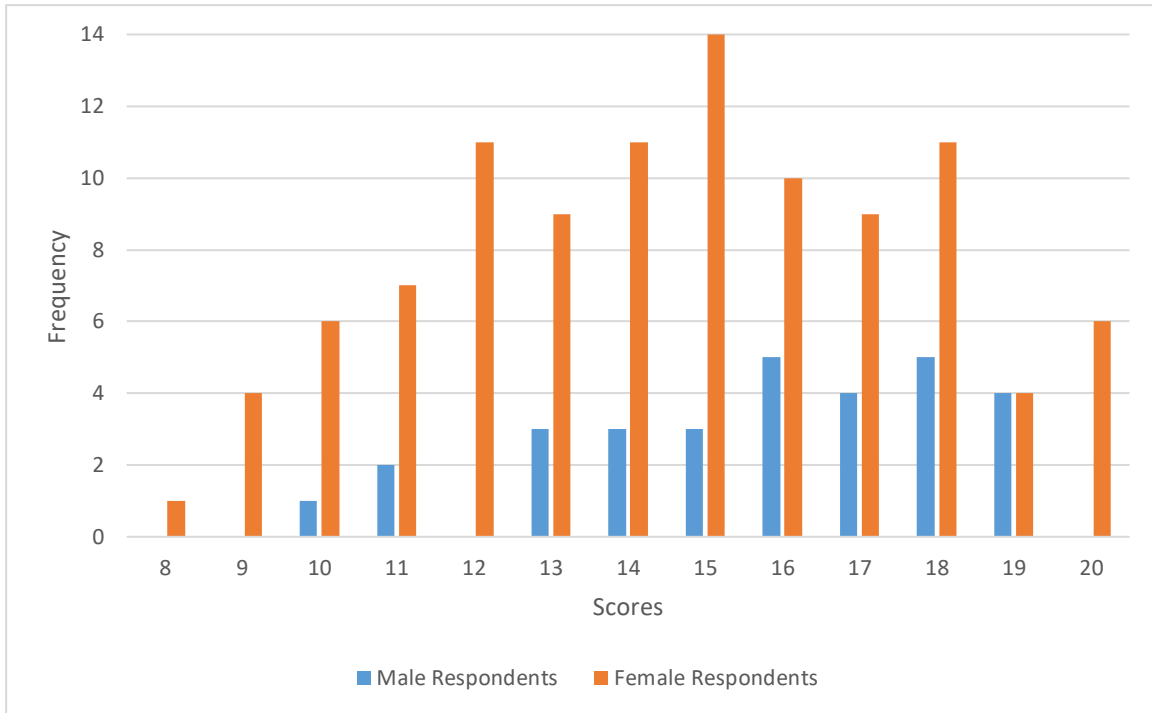| SCORE	FREQUENCY OF MALE'S SCORE	FREQUENCY OF FEMALE'S SCORE
8	0	1
9	0	4
10	1	6
11	2	7
12	0	11
13	3	9
14	3	11
15	3	14
16	5	10
17	4	9
18	5	11
19	4	4
20	0	6

Figure 2. Distribution of Post-Test Scores for the Experimental Group of BU CBEM Economics Freshmen

Table 3. Summary of the Scores for Pre-Test of the Controlled Group

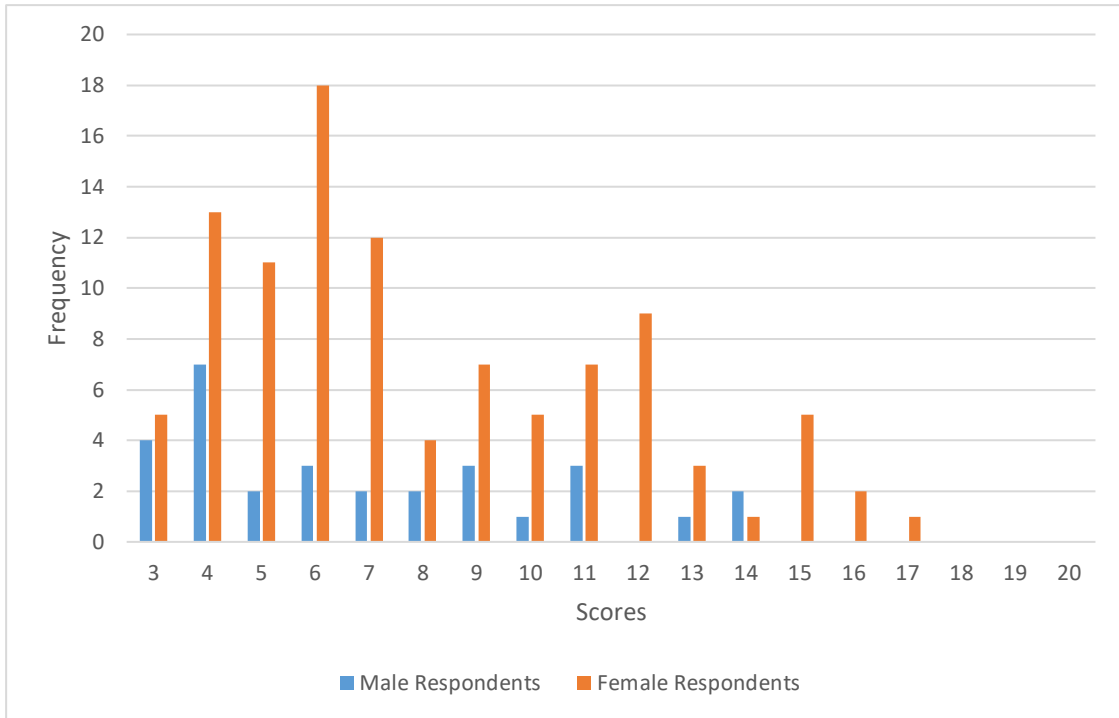| SCORE	FREQENCY OF MALE'S SCORE	FREQUENCY OF FEMALE'S SCORE
3	4	5
4	7	13
5	2	11
6	3	18
7	2	12
8	2	4
9	3	7
10	1	5
11	3	7
12	0	9
13	1	3
14	2	1
15	0	5
16	0	2
17	0	1
18	0	0
19	0	0
20	0	0

Figure 3. Distribution of Pre-Test Scores for the Controlled Group of BU CBEM Economics Freshmen

Table 4. Summary of the Scores for Post-Test of the Controlled Group

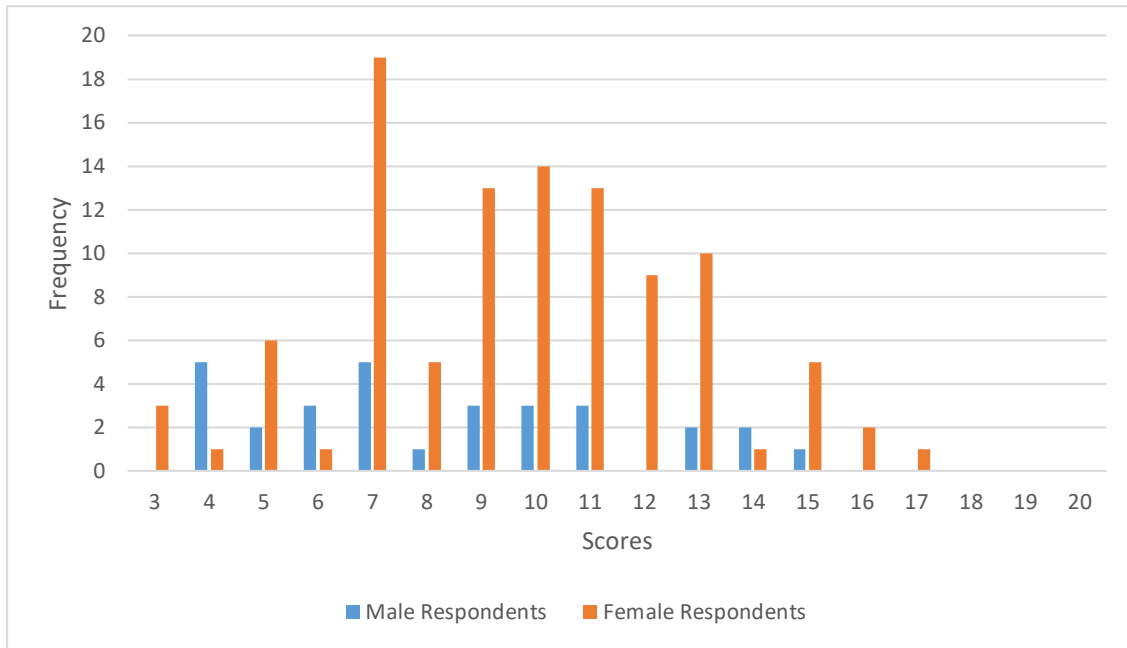| SCORE	FREQENCY OF MALE'S SCORE	FREQUENCY OF FEMALE'S SCORE
3	0	3
4	5	1
5	2	6
6	3	1
7	5	19
8	1	5
9	3	13
10	3	14
11	3	13
12	0	9
13	2	10
14	2	1
15	1	5
16	0	2
17	0	1
18	0	0
19	0	0
20	0	0

Figure 4. Distribution of Post-Test Scores for the Controlled Group of BU CBEM Economics Freshmen

The mean score for male respondents in the post-test of the experimental group was 15.93, and for female respondents, it was 14.63. In comparison, the post-test mean score for the male respondents in the control group was 8.48, and for female respondents, it was 7.48. These post-test mean scores reflect the knowledge gained after participating in the orientation program for the experimental group, while the control group did not undergo the orientation.

When compared to the pre-test mean scores, the experimental group showed a notable improvement. The pre-test scores for male respondents in the experimental group were 10.41, and for female respondents, they were 10.36. In contrast, the pre-test scores for the male control group were 5.17, and for female

control group respondents, they were 7.10. This indicates that the experimental group demonstrated a higher increase in knowledge after participating in the orientation.

To assess the statistical significance of the changes in scores, a paired t-test was conducted for both the experimental and control groups, comparing their pre-test and post-test scores. The results revealed a statistically significant increase in the post-test scores for the experimental group, suggesting that the orientation program had a positive effect on students' understanding of academic policies. However, the control group showed minimal change in their scores, indicating that the improvement in the experimental group was likely due to the orientation program rather than other factors.

Table 5. Paired t-Test Results for Female Respondents in Experimental Group

	Post-test	Pre-test
Mean	14.6372549	10.3627451
Variance	8.886915162	9.65919239
Observations	102	102
Pearson Correlation	0.957954757	
Hypothesized Mean Difference	0	
df	101	
t Stat	48.41190856	

	Post-test	Pre-test
P(T<=t) one-tail	5.24055E-72	
t Critical one-tail	1.66008063	
P(T<=t) two-tail	1.04811E-71	
t Critical two-tail	1.983731003	

Table 5 presents the paired t-test results for female respondents in the experimental group. The pre-test mean score for the female respondents was 10.36, while the post-test mean score increased significantly to 14.64. The variance in pre-test scores was 9.66, while the post-test variance decreased to 8.89, indicating a reduction in score variability following the orientation.

The paired t-test results yielded a t-statistic of 48.41, which is far greater than the critical value of 1.98 for a two-tailed test. With a p-value of 1.05E-71, which is substantially less than the significance level of 0.05, we reject the null hypothesis. This suggests that the orientation had a significant positive impact on the female respondents' knowledge of academic policies, as demonstrated by the significant increase in their post-test scores compared to pre-test scores.

Table 6. Paired t-Test Results for Male Respondents in Experimental Group

	Post-test	Pre-test
Mean	15.93103	10.41379
Variance	5.423645	11.96552
Observations	29	29
Pearson Correlation	0.947969	
Hypothesized Mean Difference	0	
df	28	
t Stat	20.42619	
P(T<=t) one-tail	1.17E-18	
t Critical one-tail	1.701131	
P(T<=t) two-tail	2.33E-18	
t Critical two-tail	2.048407	

Table 6 shows the paired t-test results for male respondents in the experimental group. The pre-test mean score for the male respondents was 10.41, and the post-test mean score increased to 15.93. The variance in pre-test scores was 11.97, while post-test variance decreased to 5.42, reflecting a reduced spread in the post-test scores.

The t-statistic for this group was 20.43, exceeding the critical value of 2.05 for a two-tailed test. The p-value of 2.33E-18 is significantly smaller than the standard significance level of 0.05, indicating that the difference between the pre-test and post-test scores is statistically significant. This demonstrates that the orientation program had a substantial effect on the male respondents, improving their understanding of academic policies.

Table 7. Paired t-Test Results for Female Respondents in Control Group

	Post-test	Pre-test
Mean	7.480769	5.173077
Variance	3.234917	1.361614

	Post-test	Pre-test
Observations	52	52
Pearson Correlation	0.931213	
Hypothesized Mean Difference	0	
df	51	
t Stat	20.06568	
P(T<=t) one-tail	3.69E-26	
t Critical one-tail	1.675285	
P(T<=t) two-tail	7.38E-26	
t Critical two-tail	2.007584	

Table 7 presents the paired t-test results for female respondents in the control group. The pre-test mean score for these respondents was 5.17, and the post-test mean score increased to 7.48. The variance in pre-test scores was 1.36, while the post-test variance was 3.23, indicating an increase in score variability following the intervention.

The t-statistic for the control group was 20.07, which is greater than the critical value of 2.01 for a two-tailed test. The p-value of 7.38E-26 is far below the significance threshold of 0.05, suggesting a statistically significant difference in the pre-test and post-test scores. However, the increase in the control group's scores, while significant, was relatively smaller compared to the experimental group. This could indicate some influence of other factors, such as exposure to study materials or general improvements over time, but the effect was still notable.

Table 8. Paired t-Test Results for Male Respondents in Control Group

	Post-test	Pre-test
Mean	8.482759	7.103448
Variance	10.90148	11.66749
Observations	29	29
Pearson Correlation	0.977099	
Hypothesized Mean Difference	0	
df	28	
t Stat	10.20716	
P(T<=t) one-tail	3.05E-11	
t Critical one-tail	1.701131	
P(T<=t) two-tail	6.11E-11	
t Critical two-tail	2.048407	

Finally, Table 8 presents the paired t-test results for male respondents in the control group. The pre-test mean score for these respondents was 7.10, and the post-test mean score increased to 8.48. The variance in pre-test scores was 11.67, while post-test variance was 10.90, reflecting a slight reduction in score variability.

The t-statistic for the male respondents in the control group was 10.21, greater than the critical value of 2.05 for a two-tailed test. The p-value of 6.11E-11 is also smaller than the 0.05 significance level, indicating that the difference between pre-test and post-test scores was statistically significant. However, as with the female control group, the increase in the male respondents' scores was smaller than that of the

experimental group, suggesting that the orientation had a more substantial effect on knowledge acquisition.

The results of this study highlight the significant impact of the orientation program on students' knowledge of academic policies, as demonstrated by the substantial increase in post-test scores for both male and female students in the experimental group. The pre-test and post-test mean scores for the experimental group showed a considerable improvement, indicating that the orientation program effectively enhanced students' understanding of academic policies. This aligns with the findings of Smith et al. (2009), who noted that orientation programs that assess learning outcomes lead to improved student understanding of essential academic policies. The improvements observed in our study mirror this conclusion, reinforcing the positive effects of orientation on academic preparedness.

Comparing the experimental group to the control group, the latter also showed statistically significant improvements in knowledge, but the increase was notably smaller. This suggests that while other factors may have contributed to the control group's improvements, the orientation program played a pivotal role in enhancing the students' comprehension of academic policies. The experimental group's larger gain underscores the value of targeted orientation interventions in boosting students' academic understanding. This is consistent with Davis (2013), who emphasized that orientation programs are vital for student success, particularly in improving retention and academic outcomes.

Interestingly, both male and female respondents in the experimental group showed significant improvements. However, male respondents exhibited slightly higher gains in their post-test scores compared to females. This finding may indicate potential gender-related differences in how students engage with the content or absorb information. It could also suggest that males, in this context, may have found the orientation more impactful, or perhaps they engaged more actively with the academic policy content. These results align with previous research, such as the study by Robinson, Burns, and Gaw (1996), which found that

orientation programs not only foster academic adaptation but also play a key role in personal and emotional integration, which may vary by individual characteristics.

The study's findings are also consistent with the work of Busby et al. (2002), which found that students who participated in orientation programs had higher graduation rates and GPAs, supporting the broader notion that orientation plays a significant role in academic success. The improvement in academic policy knowledge demonstrated in this study suggests that orientation programs are an essential tool for academic achievement, echoing the importance of providing students with clear and comprehensive information on academic policies as part of their transition into higher education.

In sum, the results of this study confirm the positive effect of orientation programs on students' understanding of academic policies. This supports the conclusions of previous research, including Smith et al. (2019), which highlighted that orientation programs that focus on student learning outcomes improve students' preparedness and retention. Given the significant improvements in students' academic policy knowledge, this study recommends that educational institutions continue to implement and evaluate orientation programs to ensure they effectively address students' needs and enhance their academic success.

Conclusion

Based on the findings of this study, it is recommended that academic policy orientations be conducted regularly as part of the program to ensure students are consistently exposed to important academic policies. To increase engagement and effectiveness, the orientation content should be updated periodically, incorporating relevant case studies, real-life scenarios, and interactive sessions such as group discussions or role-playing activities. Additionally, digital modules and quizzes could be introduced to enhance interactivity and provide students with a more flexible and accessible learning experience.

Orientation materials should be tailored to address specific needs of the students, such as those of first-year students, shifters, or

transferees, ensuring that the content is relevant to their academic journey. To reinforce the importance of academic policies, it is also recommended that these materials be consistently integrated into the classroom setting or course context, with regular reminders from faculty and staff.

Further research is needed to assess the long-term impact of academic orientation on student success. Longitudinal studies could track students' understanding of academic policies and their academic performance over time to evaluate whether the orientation's effects are sustained beyond the immediate post-orientation period. Additionally, future studies could explore the effectiveness of different types of orientations (e.g., digital vs. in-person, self-paced vs. instructor-led) to determine the most effective formats for improving student understanding of academic policies.

Acknowledgement

References

Brawer, F. B. (1996). Retention-attrition in the nineties. (Report No. EDO-JC-96-06). Los Angeles, CA: ERIC Clearinghouse for Community Colleges.

Busby, R. R., Gammel, H. L., & Jeffcoat, N. K. (2002). Grades, graduation, and orientation: A longitudinal study of how new student programs relate to GPA and graduation. *Journal of College Orientation and Transition, 10*(1), 46-50.

Davis, J. M. (2013) The impact of orientation programming on student success outcomes at a rural community college. ProQuest LLC. Retrieved from https://eric.ed.gov/?id=ED563675Daddona, M. F., & Cooper, D. L. (2002). Comparison of freshman perceived needs prior to and after participation in an orientation program. *NASPA Journal, 39*(4), 300-318.

Hodum, T. L. (2007) An investigation of how students, faculty, and administrators within a particular liberal arts college perceived a new-student orientation program's effect on students' social integration and retention. Doctoral dissertation, ProQuest Dissertations and Theses. Retrieved from ProQuest Dissertations and Theses Database. (UMI No. 3322702)

Jordan, A. (2001). College student cheating: The role of motivation, perceived norms, attitudes, and knowledge on institutional policy. *Ethics & Behavior, 11*(3), 233-247.

Korte, C., & Sylvester, A. (1982). Expectations, experience, and anticipatory socialization at a Scottish university. *Journal of Social Psychology*, 118, 187-197.

Kramer, G. L., & Washburn, R. (1983). The perceived orientation needs of new students. *Journal of College Student Personnel*, 24(4), 311-318.

Owusu, G., Taqiah, M., Sena-Speglo, C., & Onyame, J. T. (2014). Orientation impact on performance of undergraduate students in the University of Cape Coast (Ghana). *International Journal of Educational Administration and Policy Studies.*

Robinson, D. A. G., Burns, C. F., & Gaw, K. F. (1996). Orientation programs: A foundation for student learning and success. *New Directions for Student Services, 75*, 55-68.

Rugutt, J., & Chemosit, C. (n.d.). A study of factors that influence college academic achievement: A structural equation modeling approach. *University of Arkansas.*

Smith, H. G., Rodine, B., & William, A. (2009) Using student learning outcomes to evaluate orientation programs. *Journal of College Orientation, Transition, and Retention*. Retrieved from https://pubs.lib.umn.edu/index.php/jcotr/article/view/2798/2206