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Influence Self-Regulated Learning and Self-Efficacy to Academic Performance Economic Olympiad Participants ECOLY 2025

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Abstract. This study examines the influence of Self-Regulated Learning and Self-Efficacy on the Academic Performance of participants in the ECOLY 2025 Economics Olympiad. Preliminary observations indicated that several participants experienced difficulties in managing learning strategies, time allocation, and confidence when facing competition tasks. A quantitative approach was employed using an online questionnaire distributed to 44 ECOLY 2025 participants. The collected data were analyzed through multiple linear regression. The findings revealed that Self-Regulated Learning had no significant effect on Academic Performance (t = 0.909; Sig. = 0.369), while Self-Efficacy also showed no significant effect (t = 0.158; Sig. = 0.875). Simultaneously, both variables did not significantly influence Academic Performance (F = 1.261; Sig. = 0.294), with an Adjusted R Square value of 0.012. These results indicate that Self-Regulated Learning and Self-Efficacy explain only 1.2% of the variation in Academic Performance, whereas the remaining 98.8% is influenced by other factors. The findings suggest that improving students' performance in academic competitions requires greater attention to subject mastery, competition experience, analytical thinking skills, training intensity, and learning environment support.

Keywords: *Academic Achievement, ECOLY 2025, Economics Olympiad, Self-Efficacy, Self-Directed Learning.*

A. INTRODUCTION

Education plays a fundamental role in improving the quality of human resources and preparing individuals to face increasingly complex global challenges. Academic achievement has become one of the main indicators used to evaluate student learning outcomes and educational quality. In addition to reflecting students' mastery of subject knowledge, academic achievement also represents their ability to manage the learning process, solve problems, and achieve academic goals effectively (Lamas, 2015; Uzma et al., 2024).

According to Social Cognitive Theory As stated by Bandura (1986), academic achievement is influenced by the reciprocal interaction between personal, behavioral, and environmental factors. Among these factors Self-Regulated Learning (SRL) And Self-Efficacy are considered important personal characteristics that contribute to students' academic achievement. Self-regulated Learning refers to an individual's ability to plan, monitor, control, and evaluate learning activities independently, while Self-Efficacy describes an individual's belief in their ability to successfully perform tasks and overcome academic challenges (Zimmerman, 1990; Bandura, 1997).

In a highly competitive academic environment, such as the economics olympiad, students are required not only to master theoretical knowledge but also to apply effective learning strategies, manage time efficiently, and maintain self-confidence under pressure. Therefore, both Self-Regulated Learning and Self-Efficacy are expected to support better academic performance. However, previous research has reported inconsistent findings regarding the relationship between these variables and academic achievement. Some studies found significant positive effects, while others reported insignificant relationships, suggesting

that academic performance may also be influenced by additional factors beyond learning organization and self-efficacy.

ECOLY 2025 (Annual Economic Competition Activity) is a national economics olympiad organized by the Economic Education Department Student Association, Faculty of Economics and Business, Surabaya State University. Initial observations and interviews with the organizing committee revealed that many participants experienced difficulties in managing learning strategies, time allocation, and self-confidence when solving high-level competition problems. In contrast, some participants with strong content mastery and competition experience achieved satisfactory performance despite having relatively low levels of learning regulation and self-confidence. These findings suggest that the relationship between Self-Regulated Learning, Self-Efficacy, and Academic Achievement requires further research.

Previous studies have generally examined these variables in regular classroom settings, while research focusing on academic competitions, particularly economics olympiads, is still limited. This gap highlights the need to investigate whether Self-Regulated Learning and Self-Efficacy significantly influence Academic Achievement in a competitive educational context. Therefore, this study aims to analyze the influence of Self-Regulated Learning and Self-Efficacy on the Academic Achievement of ECOLY 2025 participants. These findings are expected to contribute to the development of educational psychology literature and provide practical recommendations for teachers, coaches, and competition organizers in designing more comprehensive training programs for economics olympiad participants.

B. METHOD

This study uses quantitative approach with causal associative research design.to examine the influence Independent Learning and Self-Efficacy to Academic Achievement ECOLY 2025 participants. ECOLY 2025 (Annual Economic Competition), a national economics olympiad organized by the faculty. A total of 44 respondents complete the questionnaire and the research instrument consisted of a structured questionnaire that measured Self-Regulated Learning, Self-Efficacy, and Academic Performance validators and reliability to ensure measurement accuracy. Data was analyzed using IBM SPSS Statistics version 21 The analysis includes. I swear for partial effects, and I am F for simultaneous effects. This analysis was conducted to determine whether Independent Learning and Self-Efficacy significantly influence each other.

C. RESULTS AND DISCUSSION

This study involved 44 participants who actively participated in Economic Competition Olympiad (ECOLY) 2025, representing 18 high schools from various regions in Indonesia. The diversity of respondents indicates that participants come from different educational backgrounds, providing a broader representation of students participating in the national academic competition. Descriptive statistical analysis shows that the average score Self-Regulated Learning (58.43), Self-Efficacy (48.43), and Academic Achievement (50.00) all were higher than their respective standard deviations. These findings indicate that the data were relatively homogeneous and normally distributed around the mean, indicating that respondents generally exhibited moderate levels of learning regulation, self-confidence, and academic achievement.

Further distribution analysis revealed that most of the respondents were classified into medium category for all variables. Specifically, 63,6% participants demonstrated moderate Independent Learning, 68,2% demonstrate moderate Self-Efficacy, and 72,7% achieve moderate academic achievement. These findings suggest that although the majority of participants possess adequate learning regulation skills and confidence in their academic

abilities, these characteristics do not necessarily translate into superior competitive performance. This pattern suggests that academic achievement in competitive environments may depend on many interacting factors beyond psychological characteristics alone.

Prior to hypothesis testing, the data met all the classical assumptions for multiple regression analysis. The normality test using the Kolmogorov-Smirnov method yielded a significance value of0,200, which shows that the residuals are normally distributed. Furthermore, the multicollinearity test shows a tolerance value above0,10and the Variance Inflation Factor (VIF) value is below10, which confirms the absence of multicollinearity between the independent variables. The heteroscedasticity and linearity tests also meet the required statistical assumptions, indicating that the regression model is suitable for further analysis.

Multiple linear regression analysis produces the equation $Y = 34,146 + 0,240X_1 + 0,037X_2$, where X_1 represents Self-Regulated Learning and X_2 represents Self-Efficacy. Although both regression coefficients are positive, neither variable significantly predicts Academic Achievement. Self-Regulated Learning obtained a significant value.0,369, while Self-Efficacy produces a significant value0,875, both exceed the accepted threshold, namely0,05. These findings suggest that increasing learning regulation or self-confidence alone is not sufficient to significantly improve participants' competition scores.

The first hypothesis states that Self-Regulated Learning Significantly Influences Academic Achievement However, the research results rejected this hypothesis because calculated t value (0.909) lower than the critical value and the significance level exceeds 0.05. These findings indicate that although participants generally demonstrated appropriate learning management skills, these abilities were not directly related to higher achievement in ECOLY 2025. According to Bandura's Social Cognitive Theory (1986) Academic achievement is influenced by the reciprocal interaction of personal, behavioral, and environmental factors. Consequently, learning settings alone may not be sufficient to explain student success in highly competitive academic environments.

The insignificant effect of Self-Directed Learning may also be explained by the nature of academic competition. ECOLY requires participants not only to organize their learning process but also to master complex economic concepts, develop higher-order thinking skills, apply analytical reasoning, and manage time effectively under exam pressure. Previous studies by Higgins et al. (2022), Li et al. (2018), and Tarumasely (2021) also reported that Self-Reported Learning does not consistently predict Academic Achievement because its effectiveness depends on contextual factors, learning experiences, and the accuracy of self-reported learning behaviors.

The second hypothesis examines the influence Self-Efficacy on Academic Achievement. Statistical analysis shows that Self-Efficacy also does not have a significant influence, with t value of 0.158and level of significance0,875. Although descriptive analysis indicates that most respondents have moderate confidence in their abilities, this confidence is not sufficient to produce higher competition scores. Consistent with Bandura (1986), self-efficacy functions as one component of personal factors, but successful academic achievement also requires behavioral competence and supportive environmental conditions.

Several previous studies support these findings. Honicke & Broadbent (2016) argue that the relationship between self-efficacy and academic achievement is often mediated by variables such as motivation, stress management, and learning strategies. Similarly, Talsma et al. (2018) found that high self-confidence does not necessarily translate to better academic performance if it is not accompanied by adequate competence and preparation. In a competitive context like ECOLY, participants' mastery of economic concepts, analytical reasoning, and prior competitive experience may have a stronger influence than self-confidence alone.

Further simultaneous regression analysis shows that Independent Learning and Self-Efficacy do not simultaneously influence Academic Achievement. The F test produces a significance value0,294, which indicates that the regression model is statistically insignificant. In addition, the coefficient of determination shows Adjusted R^2 of 0.012, which means that the two independent variables only explain1,2%from variations in Academic Achievement, while the rest98,8%caused by other factors not included in the model. These findings reinforce the multidimensional nature of academic achievement, particularly in competitive learning environments.

Overall, the findings suggest that Academic Achievement in ECOLY 2025 cannot be adequately explained by Self-Regulated Learning and Self-Efficacy alone. In accordance with Social Cognitive Theory (Bandura, 1986) Academic success arises from a complex interaction between personal characteristics, behavioral processes, and environmental influences. Therefore, future competitive training programs should not only strengthen students' self-regulation and self-confidence, but also emphasize conceptual mastery, higher-order thinking skills, intensive practice, prior competitive experience, effective coaching, and a supportive learning environment to optimize student academic achievement.

D. CONCLUSION

This study examines the influence Self-Regulated Learning (SRL) and Self-Efficacy (SE) to Academic Achievement Participants in the 2025 Economic Competition Olympiad (ECOLY). The results showed that neither Self-Regulated Learning nor Self-Efficacy had a statistically significant effect on Academic Achievement. Although most participants demonstrated moderate levels of learning regulation and self-confidence, these characteristics were not sufficient to significantly improve their competition performance. The results of this study indicate that students' ability to regulate their learning process does not necessarily lead to higher academic achievement in competitive academic environments. Similarly, self-confidence in one's abilities alone is not sufficient to ensure better performance in competitions. These findings suggest that success in academic competition is influenced by a combination of cognitive, behavioral, and environmental factors, rather than a single psychological characteristic.

Furthermore, simultaneous analysis showed that Self-Regulated Learning and Self-Efficacy together only explained1,2%of variance in Academic Achievement, whereas98,8%explained by other variables outside the research model. This finding is consistent with Bandura's Social Cognitive Theory (1986), which emphasizes that academic achievement results from the reciprocal interaction of personal, behavioral, and environmental factors. Therefore, the two variables examined in this study cannot independently explain the academic achievement of participants in ECOLY 2025. The practical implications of this research are that ECOLY participants, teachers, and competition coaches should not only focus on developing students' self-regulation and self-confidence. Greater attention should also be paid to strengthening conceptual understanding of economics, analytical thinking skills, intensive problem-solving practice, competition experiences, effective coaching strategies, and a supportive learning environment to enhance students' academic achievement in economics competitions.

Finally, further research is suggested to expand the research model by including additional variables derived from Social Cognitive Theory, specifically environmental factors, learning motivation, previous competitive experience, analytical thinking skills, and teaching quality. Future research should also involve larger, more diverse samples and use broader measures of Academic Achievement to provide a more comprehensive understanding of the factors influencing student achievement in academic competitions.

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