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SELF-REGULATED LEARNING STRATEGIES AND THEIR RELATIONSHIP TO GRAMMAR ACHIEVEMENT OF UNDERGRADUATE ENGLISH DEPARTMENT STUDENTS

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Abstract
Self-regulated learning is an educational process that enables students to self-regulate when determining ideas or concepts and evolving their learning strategies to accomplish attainable outcomes. The present study investigated self-regulated learning strategies undergraduate English department students used and examined the significant relationship with students' grammar achievement. The researchers conducted a quantitative correlational design on 70 undergraduate English department students. The researchers collected the data through a self-regulated learning strategies questionnaire and students' grammar scores. The first result showed that the peer learning strategy was the dominant strategy used by students with the highest average score *(M= 3.48, SD= 1.14)*, and the less dominant strategy with the lowest average score is time and study environment *(M= 3.03, SD= 0.99)*. This study applied descriptive statistics using the SPSS program to describe the first research problem. The second result was analyzed using Pearson correlation, indicating a low negative correlation between self-regulated learning strategies and students' grammar achievement. Thus, this study concluded that the higher the grammar achievement students' got, the less self-regulated learning strategies they used, and the less grammar achievement students' got, the more learning strategies they used.

Keywords: EFL undergraduate students, grammar achievement, self-regulated learning

Introduction
Recently, becoming an independent learner is essential and desirable in the learning context. It correlates with students in this modern era, where they can learn at their own pace by taking responsibility and actively participating in their learning process (Cakiroglu & Ozturk, 2021). In addition, Yulianti et al. (2021) also argue that students need to take accountability for their learning because they cannot grasp the subject matter entirely through the teacher's explanations in class. Consequently, students are expected to evolve into self-regulated learners to

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broaden their comprehension of learning outside of the classroom, which may assist them in achieving tremendous academic success. These statements demonstrate that students must plan and organize their learning activities inside and outside the school (Nursyarah et al., 2019; Sutiono et al., 2022; Umamah & Cahyono, 2022). Regarding this case, self-regulated learning as a learning strategy is required to assist learners in obtaining more independence inside and outside the classroom, particularly when learning English as a foreign language.

Self-regulated learning (SRL) commonly focuses on how students genuinely oversee, modify, and adjust their learning process. SRL also can be recognized as an active, beneficial process in which learners set learning goals and then monitor, regulate, and manage their cognition, motivation, and behavior (Paul R. Pintrich, 2000; Zimmerman, 2008). Moreover, Menggo et al. (2022) assert that SRL is an educational process that enables students to self-regulate when determining ideas or concepts and evolving their learning strategies to accomplish attainable outcomes. Unlike conventional education, these learning strategies concentrate on students' interests and acknowledge students' voices as the basis of the learning experience (Alten et al., 2020; Nen et al., 2022; Olubode et al., 2022). Hence, it is unsurprising that the SRL strategies can promote student innovation, critical thinking, problem-solving, and communication throughout the learning process.

Additionally, language learners' self-regulation can be measured from several categories. According to Chen (2002), self-regulated learning strategies can be divided into five categories to measure language learners' self-regulated learning: meta-cognitive self-regulation, time and study environment, effort regulation, peer learning, and help-seeking. The core category of this strategy is meta-cognitive self-regulation, which involves planning, monitoring, and regulating activities. This category can assist students in distinguishing between successful and unsuccessful behavior in learning strategies. Then, time management entails scheduling, planning, and managing one's study time to guide students in better self-regulating their studies. Meanwhile, the study environment refers to where the student completes her classwork. The following category is effort regulation, which can be used to gradually develop learning skills and assist learners in dealing with numerous distractions inside and outside of school. The fourth category is peer learning, which may assist a learner in clarifying course material and gaining knowledge that they would not have achieved on their own. The fifth category is help-seeking, which includes peer help, peer tutoring, and individual teacher guidance to improve student achievement (Pintrich et al., 1991; Chen, 2002). The researchers conclude that students can become better learners if they use incredible self-regulatory strategies, regulate their physical environment to meet their needs, seek help, engage in peer-learning activities, and use time-management abilities during the learning process.

Furthermore, the presence of self-regulation correlates with college students nowadays. This is because college students can modify and shift current learning to suit their educational requirements. Moreover, the absence of SRL strategies can benefit EFL college students by allowing them to seek opportunities to improve their English skills outside the classroom (Isnayasari, 2018). The previous statements show that EFL college students can use SRL to display and evaluate their learning strategies. Meanwhile, it is feasible that many undergraduates still cannot regulate their learning effectively. It aligns with Lee et

al. (2020), who argue that sometimes college students are passive while learning English in the classroom. It occurred because they had no plans and failed to discover the best method for learning English (Zahra, 2020). Hence, EFL college students need a self-regulated learning strategy to achieve successful academic results and strengthen their English mastery.

Regarding English mastery, a particular manner for EFL college students to master English is to strengthen their grammar mastery. Generally, grammar is a fundamental component of learning English and plays a vital role in language mastery (Chu et al., 2019; Kayan & Aydın, 2020). Moreover, Mermoune and Seghier (2021) affirm that a good command of grammar can help language learners communicate and articulate their thoughts effectively. Meanwhile, if students ignore grammar, they will be unable to master the four language skills and find it challenging to communicate precisely (Ngoc, 2023). Based on these statements, it is reasonable to conclude that all language skills, including speaking, writing, reading, and listening, can only be improved with an extensive knowledge of grammar. Thus, mastering grammar is critical for EFL college students, and it should be accompanied by learning strategies that enhance students' achievement.

To achieve the goals of learning grammar, EFL college students need to employ self-regulated learning strategies to help them comprehend the target language and communicate properly. Besides, there is no uncertainty that every student has distinctive abilities to achieve their goals, particularly when learning grammar (Rachmawaty & Ariani, 2019). The different skills in learning grammar can affect college students' grammar achievement. At the tertiary level, grammar achievement is one of the sub-skills in English academic achievement that students must accomplish. Generally, academic achievement is essential for students to understand their level of learning and is typically represented in scores for each field of study (Xiao et al., 2019). Through these previous statements, it is not intriguing that each student has unique skills to regulate themselves while learning the target language, which can affect their academic achievement.

In the last few years, several researchers worldwide have conducted numerous studies examining the role of self-regulation in students' English academic achievement. Speaking (Agustina, 2022; Heriansya et al., 2023); Reading (Sutiono et al., 2022); Writing (Syafitri, 2019); and Listening (Isnayasari, 2018) were among the language sub-skills in English academic achievement. The studies conducted by Agustina (2022) and Heriansya et al. (2023) found a similar study result about a significant relationship between SRL and speaking achievement of Undergraduate EFL students and Vocational high school students. Likewise, Sutiono et al. (2022) reported a positive correlation between SRL and reading achievement of Undergraduate EFL students in the fourth semester. In contrast, Syafitri (2019), in her study, revealed no significant correlation between self-regulation and writing achievement of Senior High School students in the Eleventh Grade. In line with Syafitri, Isnayasari (2018) in her study also showed that there is no significant correlation between SRL and the listening achievement of Undergraduate EFL students. The recent studies mentioned above revealed that SRL is significantly related to students' speaking and reading achievement. However, several studies also confirm that SRL doesn't correlate substantially

with students' writing and listening achievement in various educational backgrounds.

According to several previous studies, little attention has been paid to revealing the relationship between SRL strategies and English academic achievement, particularly in grammar skills. Moreover, studies about SRL strategies that the students employ to achieve grammar mastery are still lacking and far between, specifically at the undergraduate level in the English department study program. Besides, none of the studies have revealed a significant correlation between self-regulated learning strategies and undergraduate EFL students' grammar achievement. In addition, none of the studies analyzed the relationship between self-regulated learning strategies and EFL students' grammar achievement utilizing Pintrich's model (1991) as the framework. Therefore, the researchers in this study modified the Motivated Strategies for Learning Questionnaire (MSLQ) as the research instrument developed by Pintrich et al. (1991) to carry out SRL strategies that the students employ to achieve grammar mastery. Moreover, the present researchers hope that it can benefit lecturers in designing a course that can facilitate their students to explore more about self-regulation through learning grammar.

In response to the background above, the current study investigates self-regulated learning strategies that students employ to achieve grammar mastery at the undergraduate English department level. On the other hand, the researchers are expected to examine the significant relationship between self-regulated learning strategies and grammar achievement of undergraduate English department students. Thus, the present study addressed the following research questions:

1. What self-regulated learning strategies do the students employ to achieve grammar mastery at the undergraduate English department level?
2. Is there any significant relationship between self-regulated learning strategies and grammar achievement of undergraduate English department students?

Method

This present study was a quantitative study that employed a correlational research design. According to Creswell (2013), correlational research is a procedure in quantitative research in which researchers use the statistical correlation analysis technique to measure the degree of relationship between two or more variables. In other situations, there might be no correlation between the variables of interest. The correlational design was chosen by the researchers in this study because it is used to determine whether variables are related. It aligns with the study's objective since the researchers attempt to examine the relationship between two variables: students' self-regulated learning strategies as the independent variable and grammar achievement of undergraduate English department students as the dependent variable.

Moreover, the population of this study was the second-semester students at the undergraduate English department, UIN Sunan Ampel Surabaya, in the academic year 2022/2023. The researchers chose this population because the second-semester students are currently taking a grammar course, an Intermediate English structure appropriate to this study's objective. In addition, this study's sample is taken using purposive sampling. According to Isnayasari (2018),

purposive sampling entails the researcher specifying the characteristics of the population of interest and then attempting to find individuals who share those characteristics. Therefore, the researchers in this study selected two classes, including the intermediate English structure 2A and 2B, with a total number is 70 students (N=70), as the sample because these classes had completed the midterm test earlier than the other classes.

Furthermore, the researchers in this study used two instruments to collect the data. They are questionnaires to determine the students' self-regulated learning strategies in achieving grammar mastery and students' grammar scores to measure their grammar achievement. Besides, the primary instrument in this study was the Motivated Strategies for Learning Questionnaire (MSLQ) developed by Pintrich et al. (1991). The researchers not only adapted this questionnaire but also modified the questionnaire to find out students' self-regulated learning strategies while learning grammar. The researchers chose this instrument because it has been tested validly by the previous research conducted by Chen (2002) and Jiwani (2018). The questionnaire in this study consists of 5 categories of self-regulated learning strategies with 31 items. The researchers prepared the questionnaire using a closed-ended question with a five-point Likert scale (1= Not at all true of me; 2= Untrue of me; 3= Somewhat true of me; 4= True of me; and 5 = Very true of me). The MSLQ questionnaire, which consists of five categories, is presented in Table 1.

Table 1. The MSLQ questionnaire of self-regulation

Variable	**Categories**	**Items Number**	**Total Items**
Students' Self-Regulated Learning Strategies (X)	Metacognitive Self-Regulation	1,2,3,4,5,6,7,8,9,10,11, 12	12
	Time and Study Environment	13,14,15,16,17,18,19,20	8
	Effort Regulation	21,22,23,24	4
	Peer Learning	25,26,27	3
	Help-Seeking	28,29,30,31	4

Then the second instrument used by the researchers was grammar score documentation as the data of the students' grammar achievement. The researchers collected the data from students in grades 2A and 2B who have completed the Midterm test. The researchers gained the students' grammar scores from the lecturers' documentation. In collecting data, the researchers asked permission from the subject lecturer and cooperated with class representatives. Furthermore, the researchers created the online questionnaire in Google Forms and distributed the link via WhatsApp group class to the target participants.

After collecting data, the researchers analyzed the data using the SPSS (Version 25.00) computer program to answer the research questions. In the first research question, the researchers used descriptive statistics, consisting of Mean and Standard Deviation, to describe the student's self-regulated learning strategies for achieving grammar mastery through the result of the MSLQ questionnaire. Then, the researchers calculate the total from all items in each category based on the Likert scale score and find the average score. After that, the researchers

analyzed the self-regulated learning strategies the undergraduate English department students used by looking at the Likert scale's mean score and standard deviation for each subscale. The researchers also analyzed the data by presenting it in diagrams and tables. Next, the second research question was analyzed using the Pearson-Product Moment Correlation to determine the possible significant relationship between the students' self-regulated learning strategies and grammar achievement.

Findings and Discussion

This section presents the empirical findings and discussion that answer the two research questions: (1) What self-regulated learning strategies do the students employ to achieve grammar mastery at the undergraduate English department level? (2) Is there any significant relationship between self-regulated learning strategies and grammar achievement of undergraduate English department students? Each of the two research questions is discussed under a separate heading.

Self-regulated learning strategies used by EFL undergraduate students

In this part, the researchers answered the first question about self-regulated learning strategies undergraduate English department students use to achieve grammar mastery. The result of this question is based on the Motivated Strategies for Learning Questionnaire (MSLQ) developed by Pintrich et al. (1991) and administered to 70 undergraduate English students. The researchers calculated the questionnaire results using SPSS to analyze the descriptive statistics. Before analyzing the data, the researchers checked the normality of the questionnaire data result distribution, as seen in Table 2.

Table 2. Questionnaire data normality test results

	Kolmogorov-Smirnov[a]			Shapiro-Wilk		
	Statistic	df	Sig.	Statistic	df	Sig.
SRL strategies	.092	70	.200*	.956	70	.016

Based on the table above, the researchers decided to analyze the part of Kolmogorov-Smirnov rather than Shapiro-Wilk because the sample of this study is more than 50 students. In addition, Table 2 shows that the Sig value in Kolmogorov-Smirnov is 0.200 ($p > 0.05$), which means that the self-regulated learning strategies questionnaire data are normally distributed. Furthermore, the researchers calculated the total from all items in each category based on the Likert scale scores to respond to the first research question, as seen in Table 3.

Table 3. Descriptive statistics of self-regulated learning strategies

	N	Minimum	Maximum	Mean	Std. Deviation
Metacognitive SR	70	31	53	41.24	4.707
Time and Study	70	19	40	24.23	3.079
Effort Regulation	70	4	20	12.41	2.325
Peer Learning	70	3	15	10.43	2.836
Help-Seeking	70	8	20	13.46	2.495
Total SRL Strategies	70	79	143	101.77	10.353

The descriptive statistics in Table 3 showed that this study's total respondent (N) is 70 students and consisted of the value from five strategies in self-regulated learning. Moreover, the Mean value (M) from the total of all items is 101.77, with a Standard Deviation (SD) of 10.353. On the other hand, the researchers calculated the average scores of each category to find out the dominant and less dominant strategies used by EFL undergraduate students. The researchers calculated the Mean scores and Standard Deviation for each category based on the questionnaire (MSLQ) results, which can be presented below.

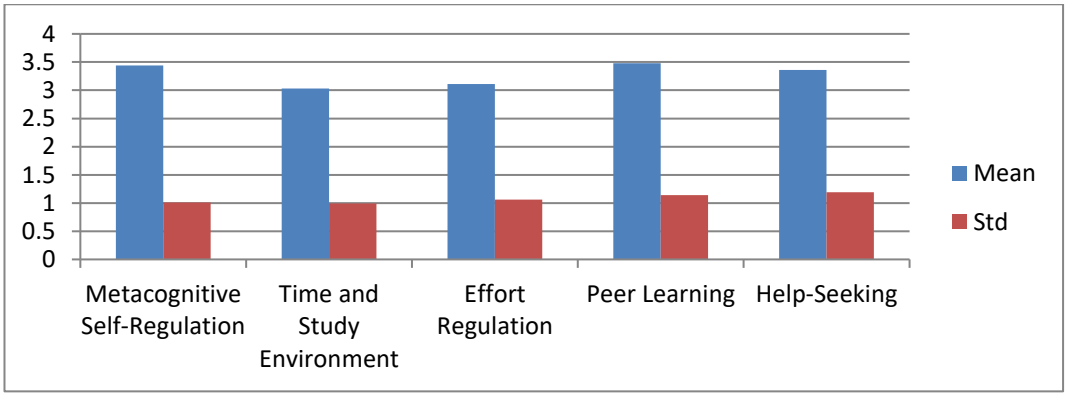


Figure 1. The average score of self-regulated learning strategies

According to the result above, the average score of SRL strategies indicates the dominant and less dominant strategies used by EFL undergraduate students. The researchers analyzed the dominant and less dominant strategies by looking at the average scores from highest to the lowest of the sub-categories, including peer learning (M= 3.48, SD= 1.14), metacognitive self-regulation (M= 3.44, SD= 1.01), help-seeking (M= 3.36, SD= 1.19), effort regulation (M= 3.11, SD= 1.06), and time and study environment (M= 3.03, SD= 0.99). To sum up, the dominant strategy undergraduate English department students use in achieving grammar mastery is peer learning which can be seen in Table 4 below.

Table 4. Peer learning

No.	Items	N	Mean	Std. Deviation
26	I try to work with other students to complete the grammar course assignments.	70	4.00	.993
27	I often set aside time to discuss the course material with my classmates.	70	3.53	1.201
25	I often try to explain the material to my classmates.	70	2.90	1.218
	AVERAGE	70	3.48	1.14

The table above indicates that 70 EFL undergraduate students had a highly self-regulated learning strategy when they did peer learning to achieve grammar mastery. Most students chose this strategy because it is the most significant way to help them clarify course material and gain the knowledge they would not have achieved independently. Therefore, the peer learning strategy has the highest average score (M= 3.48, SD= 1.14). Besides, items 26 and 27 gain the two highest Mean scores. Based on the result, it seemed that "trying to work with other students to complete the grammar course assignments" is the common peer learning strategy used by EFL students while learning grammar. Moreover, the other category is metacognitive self-regulation, with the second-highest average score (M= 3.44, SD= 1.01). The results are presented in Table 5 below.

Table 5. Metacognitive self-regulation

No.	Items	N	Mean	Std. Deviation
3	When I become confused about the grammar material, I reread it and try to figure it out.	70	4.17	.834
10	When studying for this grammar course, I try to determine which concepts I don't understand well.	70	3.90	.854
6	I ask myself questions to ensure I understand the grammar material I have been studying in class.	70	3.83	.900
12	If I get confused taking notes in class, I sort it out afterward.	70	3.74	1.200
	AVERAGE	70	3.44	1.01

The total of questionnaire items in this strategy is twelve items. However, in Table 5, only four items gain the highest mean score. These several items in metacognitive self-regulation showed that most students chose to use the strategy in item 3, which states, "When I become confused about the grammar material, I reread it and try to figure it out." In addition, the results also show that most EFL undergraduate students have implemented procedures for planning, monitoring, and managing their activities in learning grammar. Furthermore, this study's third highest average score is help-seeking (M= 3.36, SD= 1.19), as seen in Table 6 below.

Table 6. Help-seeking

No.	Items	N	Mean	Std. Deviation
30	When I can't understand the material, I ask another student in this class for help.	70	4.04	1.042
28	I try to do the work on my own, without help from anyone.	70	3.29	1.276
31	I try to identify students in this class with whom I can ask for help if necessary.	70	3.11	1.234
29	I ask my lecturer to clarify concepts about grammar that I don't understand well.	70	3.01	1.210
	AVERAGE	70	3.36	1.19

The result of Table 6 above shows there are four items in help-seeking strategies. Help-seeking is a strategy that concerns how the students do peer help, peer tutoring, and individual teacher guidance to improve their learning achievement. One of EFL undergraduate students' most used help-seeking strategies is item 30: "When I can't understand the material, I ask another student in this class for help." It means that most students ask their friends for help when they don't understand grammar material rather than asking their lecturer to clarify concepts about grammar that they don't understand well. It can be seen in item 29, which has the lowest score than item 30. On the other hand, the fourth self-regulated learning strategy in this study is effort regulation (M= 3.11, SD= 1.06), shown in Table 7 below.

Table 7. Effort regulation

No	Items	N	Mean	Std. Deviation
24	Even when course materials are dull and uninteresting, I keep working until I finish.	70	4.06	1.048
22	I work hard to do well in this grammar class even if I don't like what we are doing.	70	3.77	1.106
21	I often feel so lazy or bored when I study grammar that I quit before I finish what I planned to do.	70	2.43	1.001
23	When coursework is challenging, I either give up or only study the easy parts.	70	2.16	1.072
	AVERAGE	70	3.11	1.06

In line with the previous table, Table 7 shows four items in effort regulation strategies. In this study, effort regulation can be used to gradually develop

learning skills and assist learners in dealing with numerous distractions inside and outside of school. The result indicates that item 24 is the EFL undergraduate students' most used effort regulation strategy in achieving grammar mastery. It means that students try to manage themselves and continue their studies even though grammar lessons are not engaging. Meanwhile, item 24 is contrasted with item 23, in which item 23 has the lowest score because this item is less suitable for students' grammar learning strategies. Finally, the least strategy EFL undergraduate students use in achieving grammar mastery is time and study environment, which can be seen in Table 8.

Table 8. Time and study environment

No.	Items	N	Mean	Std. Deviation
18	I attend grammar classes regularly.	70	4.63	.854
17	I ensure I keep up with this course's weekly readings and assignments.	70	3.86	1.011
13	I usually study grammar in a place where I can concentrate on my coursework.	70	3.80	.987
14	I make good use of my study time for this grammar course.	70	3.43	.878
	AVERAGE	70	3.03	0.99

According to the Motivated Strategies for Learning Questionnaire (MSLQ), the total item in this strategy is eight items. But in Table 8 above, only four items gain the highest mean score in time and study environment. Generally, time and study environment are strategies that focus on how students manage their study time to guide them in better self-regulating their studies. Meanwhile, the study environment refers to where the students complete their classwork. One of EFL undergraduate students' most used strategies in time and study environment is item 18. It means that most students attend the class regularly, which is one of their strategies for achieving grammar mastery.

Regarding the result of the first research problem above, the researchers conclude that there are self-regulated learning strategies used by EFL undergraduate English department students in achieving grammar mastery, including peer learning (M= 3.48, SD= 1.14), metacognitive self-regulation (M= 3.44, SD= 1.01), help-seeking (M= 3.36, SD= 1.19), effort regulation (M= 3.11, SD= 1.06), and the less dominant strategy with the lowest average score is time and study environment (M= 3.03, SD= 0.99). From these results, it can be seen that peer learning is the dominant strategy with the highest average score. Due to that, undergraduate students can distribute and share thinking responsibilities with other friends through a peer-learning method in the learning process. Thus, it is unsurprising that peer learning strategies can improve students' ability to manage their grammar learning.

The relationship between SRL strategies and grammar achievement

In this section, the researchers presented answers to the second research question related to the relationship between self-regulated learning strategies and grammar achievement of undergraduate English department students using the Pearson- Product Moment Correlation. The self-regulated learning questionnaire

(MSLQ) and grammar score result indicate a low negative correlation between the two variables, as shown in Table 9 below.

Table 9. Pearson correlation of SRL strategies and grammar achievement

		SRL strategies	Grammar Achievement
SRL strategies	Pearson Correlation	1	-.276*
	Sig. (2-tailed)		.021
	N	70	70
Grammar score	Pearson Correlation	-.276*	1
	Sig. (2-tailed)	.021	
	N	70	70

*. Correlation is significant at the 0.05 level (2-tailed).

Based on the result in Table 9 above, it indicates that the significant (p) value from 70 samples (N) is 0.021 or $p < 0.05$. It means a correlation exists between EFL undergraduate students' self-regulated learning strategies and grammar achievement. Meanwhile, the Pearson Correlation coefficient (r) in Table 9 is -.276, which indicates that the correlation is low negative. It means when one variable changes, the other changes in the opposite direction. Hence, the researchers concluded that the higher the students' grammar scores, the less self-regulated learning strategies they used. Furthermore, the researchers also analyzed the correlation between each strategy and students' grammar achievement, as seen in Table 10 below.

Table 10. Pearson correlation of each SRL strategies and grammar achievement

		Grammar Achievement
Peer Learning	Pearson Correlation	-.009
	Sig. (2-tailed)	.943
Metacognitive	Pearson Correlation	-.130
	Sig. (2-tailed)	.283
Help-Seeking	Pearson Correlation	-.165
	Sig. (2-tailed)	.172
Effort Regulation	Pearson Correlation	-.388**
	Sig. (2-tailed)	.001
Time Study Environment	Pearson Correlation	-.293*
	Sig. (2-tailed)	.014
Grammar Achievement	Pearson Correlation	1
	Sig. (2-tailed)	

According to the results above, it can be seen that there are probable relationships among each self-regulated learning strategy, including peer learning, metacognitive self-regulation, help-seeking, effort regulation, and time and study environment, as well as students' grammar achievement. As indicated in Table 10, the significant (p) value of the peer learning strategy is 0.943 or $(p) > 0.05$, which means that there is no correlation between peer learning strategy and EFL undergraduate students' grammar achievement. Furthermore, the Pearson

correlation (r) value of metacognitive based on the table above is -.130 < r table 0.235. The value of the r table is obtained from the number of samples (N) of 70 students with a significance of 5%, so the result is 0.235. This means there is no correlation between metacognitive self-regulation and students' grammar achievement. In line with peer learning and metacognitive strategy, the help-seeking also indicated no significant correlation with students' grammar scores because the Pearson correlation (r) value of help-seeking is -.165 < r table 0.235.

Meanwhile, it contrasts with the result of the effort regulation strategy that has a significant (p) value is 0.001, or (p) < 0.05, which means that there is a low negative correlation between effort regulation strategy and EFL undergraduate students' grammar achievement. This result aligns with time and study environment strategy with a Pearson correlation (r) value of -.293 > r table 0.235. This analysis shows that time and study environment negatively correlate with students' grammar achievement. Therefore, the researchers concluded that the higher grammar score does not depend on the strategy the students used.

To strengthen the findings of the first and second research problems in this study, the discussions are made based on the result of data analysis. Besides, this study's first finding contains significant results because none of the studies align with this result regarding peer learning as the dominant strategy undergraduate English department students use in achieving grammar mastery. In addition, the finding of this study is supported by Lim et al. (2020), who discussed the influence of peer learning and self-regulated learning (SRL) strategies on students' academic achievement. The result of this study indicated that peer learning is an essential element that improves students' self-regulation behaviors. This is because several students nowadays prefer to evaluate the quality of their work with their peers. Besides, this study also revealed that peer learning benefits blended learning courses, and undergraduate students' performance has improved. On the other hand, the finding of the current results study strengthens the theory from Pintrich et al. (1991), who states that peer learning may assist a learner in clarifying course material and gaining knowledge that they would not have achieved on their own. Therefore, it is unsurprising that peer learning strategies can improve the students' ability to regulate their learning, particularly in attaining grammar mastery.

Meanwhile, the finding of the first research problem in this current study contradicted the previous study by Zahra (2020), who discussed the self-regulated learning strategies used by Indonesian EFL senior high students and examined the correlation with the students' vocabulary size. This study found that the most used strategy in the adolescent learning process is time and study environment, with a higher score (M= 18.38, SD= 2.29). Besides, the subject of this study is senior high school students. Thus, the researchers concluded that the different results of Zahra (2020) and this present study might happen since the study subjects, the senior high-level and undergraduate-level students, were different. The diversity also might come from the language skills that the researchers investigated.

Furthermore, the findings of the second research problem in this study were not correlated with the previous research conducted by Baissane (2023). He revealed that there was a positive and significant relationship between self-regulated learning strategies and high school student's academic achievement, including metacognitive (r = .072), time and study environment (r = .096), peer

learning (r = .035), help-seeking (r = .067) effort regulation (r = .076). The results implied that high and medium-achieving students tended to regulate their learning process effectively. Meanwhile, the result of this present study aligns with the previous research conducted by Rachmawaty and Ariani (2019), who investigated learning strategies and anxiety in EFL students. The previous study revealed a negative correlation between learning strategies and grammar achievement. The researchers also argue that learning strategies are not the strongest predictors of students' achievement, particularly when learning grammar. Hence, the researchers in the present study argue that the learning strategies used in learning grammar make a small contribution to helping students receive better scores.

Conclusion

After analyzing the data, the researchers draw a conclusion related to the research problems. The finding of the first research question indicates that undergraduate English department students use self-regulated learning strategies to achieve grammar mastery, including peer learning, metacognitive self-regulation, help-seeking, effort-regulation, and time and study environment. The peer learning strategy was the most used in achieving grammar mastery by EFL undergraduate students. In contrast, the least used techniques used by EFL undergraduate students were time and study environment. Moreover, the second result shows a low negative correlation between self-regulated learning strategies and EFL undergraduate students' grammar achievement. In addition, the present study also revealed that peer learning as the most dominant strategy used by EFL undergraduate students does not correlate with students' grammar achievement. Meanwhile, it contrasts with time and study environment as the least strategies negatively relating to students' grammar achievement. The researchers concluded that the higher the grammar achievement students' got, the less self-regulated learning strategies they used, and the lowest grammar achievement students' got, the more learning strategies they used.

Based on the results of the current study above, there are still many opportunities for further research, particularly those who want to examine related self-regulated learning strategies and students' grammar achievement. The researchers suggest that upcoming researchers might need to conduct the research widely with more students from different grade levels in many regions in Indonesia. Since this study was limited to several aspects, future research can execute the investigation in offline meetings since it can affect the authenticity of the study result. Furthermore, the researchers propose that upcoming researchers might need to consider the data collection methods, including conducting classroom observations and interviews with students, teachers, and parents to validate the quantitative data. Moreover, the present researchers hope that this study can encourage lecturers to design a grammar course that can facilitate their students to explore more about self-regulation strategies used while learning grammar.

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