# FACTORS AND STRATEGIES TO DEVELOP CRITICAL THINKING IN ACADEMIC WRITING: A CASE OF EFL STUDENTS AT ONE UNIVERSITY IN JAMBI

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## ABSTRACT

At the university level, critical thinking is an essential yet challenging skill for EFL students. EFL students often face various barriers to developing this skill. The purpose of this study is to explore the factors that influence EFL students' abilities and to investigate the strategies they employ to develop critical thinking skills in academic writing. This study used a qualitative research design with a case study approach while the data was collected through semi-structured interviews with ten participants, specifically eighth-semester students majoring in English at a publicUniversity in Jambi.The researcher used purposive sampling to select participants based on specific criteria. The researcher used thematic analysis as a method to examine and interpret the collected data. The findings show that EFL students face several factors that affect their ability to develop critical thinking in academic writing including personal competence factors(lack of topical knowledge), linguistic factors (grammar and vocabulary), andpsychological factors(low motivation, lack of self-confidence, and anxiety in supervision),. However, despite these influencing factors, EFL students also apply strategies to overcome challenges when developing critical thinking in academic writing, specifically self-management, technology support, learning atmosphere, support system, and mentorship schedule management. It can be concluded that this research is expected to be useful as suggestions and recommendations aimed to develop critical thinking in academic writing, especially for Indonesian students at the undergraduate level.

*Keywords: Critical Thinking in Academic Writing, Factors, strategy, EFL students.*

## INTRODUCTION

The development of science has transformed the world, ushering in an era of technological advancement. This progress requires synergy, cooperation, and a comprehensive approach to various global problems, necessitating a new way of thinkingcritical thinking (Sihotang, 2019). Critical thinking is an intellectual process involving the conceptualization, application, synthesis, and evaluation of information obtained from observation, experience, reflection, reasoning, or communication as a basis for belief and action (Lismaya, 2019). Samanhudi and Linse (2019) further define critical thinking as the formulation of arguments, analysis, interpretation, and making sound judgments, alongside the mechanisms these processes operate through. Despite differing views on the nature of critical thinking, there is consensus in the literature that it is demonstrated through students' abilities to identify issues and assumptions,

recognize important relationships, make correct inferences, evaluate evidence or authority, and draw conclusions.

Critical thinking is crucial for influencing all four language learning skills but plays a particularly vital role in writing, one of the productive skills often disliked for various reasons. According to Rahmat (2019), writers face problems such as linguistic difficulties (grammar, vocabulary, language usage), physiological difficulties (lack of interaction between writer and reader), and cognitive difficulties (punctuation, capitalization, and paragraph structuring). In higher education, writing serves as a medium for critical thinking, particularly in academic writing. Vyncke (2012) states that when critical thinking is applied to academic writing, abilities are expressed through argumentation processes, resulting in essays and dissertations. The use of English is compulsory in higher education to prepare EFL students to understand lecture literature primarily written in English. However, EFL students often face significant difficulties in enhancing their critical thinking skills, especially in academic writing.

Several studies have explored the topic of critical thinking in academic writing. Chaffee (2002) found that six international students faced major challenges in writing critical essays, including clarity of ideas, critical analysis, critical evaluation, and rigor. Egege and Kutieleh (2004) reported that most Southeast Asian students struggle to express critical thinking in their academic writing, despite having excellent English skills. Samanhudi and Linse (2019) identified factors hindering critical thinking in writing, such as greater awareness of critical thinking, understanding critical thinking better, differences in academic requirements, and inadequate English skills. Thabran (2022) found that Indonesian students face challenges in critical reading and writing using the case-based method, including presentation problems in groups, selected cases, and writing responses.

The significance of this study is particularly relevant for EFL students at Universitas Jambi, where critical thinking skills are foundational in higher education, especially in academic writing. English Education students face various writing assignments, and their academic writing quality depends on effectively applying critical thinking skills. Previous studies have inspired further investigation into critical thinking in academic writing at the undergraduate level in Jambi. Samanhudi and Linse (2019) concluded that Indonesian students face difficulties in developing critical thinking skills in academic writing, prompting further research into "Factors and Strategies to Develop Critical Thinking in Academic Writing: The Case of EFL Students at One University in Jambi."

## METHODS

The researcher employed qualitative research with a case study approach to gain in-depth and detailed insights into the factors influencing EFL students' development of critical thinking skills in academic writing and how they overcome related challenges. Wallace (2008) explains that qualitative research aims to study a subject carefully to achieve an in-depth understanding of a case. The researcher selected 10 seventh-semester English major students from a state university in Jambi and conducted interviews for data collection. To achieve the research objectives, thematic analysis was used. According to Braun and Clarke (2008), thematic analysis identifies patterns or themes within collected data. To ensure trustworthiness, member checking was conducted by returning the research results to participants to confirm data accuracy.

## FINDING AND DISCUSSION

### 1. Findings

### a. Factors Influence EFL Students's ability to Develop Critical Thinking in Academic Writing.

According to the data obtained from the participants, they have several factors during the experience of developing critical thinking skills in academic writing.

| No. | Themes | Sub Themes |
|---|---|---|
| 1. | Personal Competence Factors | Lack of topical knowledge |
| 2. | Linguistic Factors | Grammar<br><br>Vocabulary |
| 3. | Psychological Factors | Low motivation<br><br>Lack of self-confidence<br><br>Anxiety in mentorship |

*Table Participants' Factors Themes and Sub-themes*

### b. Strategies Applied by EFL Students to Develop Critical Thinking Skills in Academic Writing.

Researchers obtained data regarding the strategies that participants applied in developing critical thinking skills in academic writing from interviews, such as self-management,

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technological support, learning atmosphere, support system, and mentorship schedule management. Each theme also has several subthemes, which can be seen in the table below:

| | Themes | Sub-themes |
|---|---|---|
| **Participants' strategies** | Self-management | Reading of literature<br><br>Setting deadlines<br><br>Building writing habits |
| | Technology Support | Artificial Intelligence (AI) |
| | Learning Atmosphere | Quiet learning atmosphere |
| | Support System | Peer support<br><br>Family support |
| | Mentorship schedule management | Routine guidance |

*Table Participants Strategies Themes and sub-themes*

## 2. Discussion

### a. Factors Influencing EFL Students's ability to Develop Critical Thinking in Academic Writing.

From the data, the researcher found that there are three main factors experienced by EFL students when developing critical thinking in academic writing.

**Personal Competence Factors**

The study reveals that a lack of topical knowledge is a significant challenge for EFL students. Five participants reported difficulties understanding their thesis topics or materials, which often stemmed from challenges in finding relevant literature. This lack of understanding hinders the development of ideas crucial for their thesis. Students with strong literacy skills, such

as frequent reading and sourcing references, tend to complete their theses more efficiently. Conversely, as Barus (2022) found, lower literacy skills slow down this process. This issue is exacerbated by limited access to necessary literature, which impedes the development of critical thinking needed to strengthen thesis content.

## Linguistic Factors

The study identifies linguistic factors as a major hurdle, with eight participants citing common issues, particularly grammar. In line with Islamiyah and Al Fajri (2020) also found that students struggle to express critical thinking due to insufficient grammar skills. This study confirms that grammatical challenges are a significant barrier in academic writing for many participants.

Vocabulary is another crucial linguistic factor affecting academic writing. Prasiska and Tohamba (2021) highlight that a limited vocabulary makes it difficult for students to express ideas effectively. Vocabulary development is essential for producing well-crafted writing. Dhuli et al. (2023) also note that students with high vocabulary mastery tend to perform better in writing, while those with limited vocabulary struggle. Therefore, students should strive to enhance their vocabulary to improve the quality of their academic writing and broaden their horizons and critical thinking skills.

## Psychological Factors

The study reveals that low motivation, lack of confidence, and anxiety in mentoring are significant barriers to critical thinking. Low motivation was the most frequently mentioned factor by participants. A lack of motivation often correlates with a lack of critical thinking skills, impacting the ability to complete a thesis. Hu W. (2016) supports this, noting that stress, depression, and procrastination are psychological obstacles to thesis completion. Similarly, Prasiska and Tohamba (2021) found that ESL students' academic writing abilities are influenced by their motivation levels.

Lack of confidence is another internal factor identified. Participants' lack of confidence hindered their ability to construct strong, organized arguments in their theses. They often felt insecure about their writing quality and worried about potential flaws. This finding aligns with Whiting et al. (2015), who reported that students feel less confident in their research and critical appraisal skills, leading to dissatisfaction with their work.

Mentorship anxiety was the last psychological factor identified. Three participants reported anxiety related to meeting supervisor expectations and fear of criticism, causing

significant stress. Wakhyudin et al. (2020) also found that anxiety is a major factor inhibiting thesis completion, with participants worried about their thesis concepts not meeting supervisors' expectations and experiencing anxiety during online guidance.

### b. Strategies Applied by EFL Students to Develop Critical Thinking Skills in Academic Writing.

After analyzing the data, the researcher found several strategies applied by EFL students to overcome critical thinking challenges in academic writing.

### Self-Management

The study highlights self-management as a crucial strategy employed by participants to effectively manage time, energy, and emotions to achieve their goals. Key strategies include diligently reading articles, managing time for thesis work, and consistently working on the thesis. The most significant of these is diligent reading. Seven participants emphasized regularly reading articles relevant to their thesis, noting that references from previous theses helped stimulate critical thinking by providing insights into various approaches. Anggraini et al. (2020) found a correlation between reading habits and critical thinking abilities.

Setting deadlines is another self-management strategy. Five participants reported trying to manage their time effectively, revealing that without a clear deadline, they struggled to focus, often working late at night or early in the morning, leading to increased stress and disrupted sleep. Ompusunggu (2022) found a significant correlation between time management and thesis procrastination, indicating that poor time management leads to higher procrastination levels.

Building writing habits also emerged as an effective strategy for developing critical thinking. Five students recognized the importance of consistent writing, noting that even small amounts of writing each week ensured steady progress and accountability. Nejmaoui, N. (2019) found that writing argumentative essays significantly improved critical thinking skills.

### Technology Support

Participants also utilized technology to overcome challenges, particularly through artificial intelligence (AI) tools such as ChatGPT, Perplexity AI, and AI Summarizer. These tools support the critical thinking process by aiding in thesis argumentation and enhancing academic writing quality. İpek, Z. H. (2023) highlighted ChatGPT's ability to provide relevant responses.

**Learning Atmosphere**

Creating a conducive learning atmosphere was another strategy mentioned by a participant, who noted that a productive environment helps develop critical thinking. Afana et al. (2023) found that a non-conducive study environment disrupts concentration and negatively impacts the learning process. Thus, a calm and focused atmosphere is essential for optimal learning and critical thinking development.

**Support System**

Peer support and family support were identified as crucial strategies for dealing with critical thinking in academic writing. Participants highlighted peer support's role in motivation and learning, with Zhou (2015) noting that peer support fosters mutual learning, skill development, and collaboration. In thesis work, peer support provides emotional and intellectual backing, creating a strong community of researchers. Family support, as explained by Prihatsanti (2014), provides essential emotional support, helping students persevere through thesis challenges.

**Mentorship Schedule Management**

Mentorship Schedule Managementwas the final strategy identified. Four participants emphasized the importance of regular mentoring sessions to expedite thesis writing. Effective management of mentoring time involves active engagement with the supervisor and timely seeking of help. Adelina (2018) stresses the importance of a consistent mentoring schedule. Proper mentorship schedule management is crucial for timely and successful thesis completion.

**CONCLUSION AND SUGGESTION**

**Conclusions**

In this chapter, based on the analysis of research findings, the researcher concludes that EFL students encounter significant inhibiting factors in developing critical thinking for academic writing. These factors are categorized into three main themes: Personal Competence Factors (lack of topical knowledge), Linguistic Factors (comprising grammar and vocabulary challenges), and Psychological Factors (including low motivation, lack of confidence, and anxiety in mentorship. The most prevalent barriers identified include low motivation, lack of topical knowledge, and linguistic issues like grammar and vocabulary deficits. Despite these challenges, EFL students employ various strategies such as self-management (including reading literature and setting deadlines), utilizing Artificial Intelligence (AI) for technological support, creating conducive learning atmospheres, seeking support from peers and family, and managing

guidance schedules effectively.

**Suggestions**

Based on these conclusions, several recommendations are proposed. For lecturers, it is crucial to offer comprehensive guidance that supports both the technical aspects of academic writing and fosters critical discussions during supervision. Emotional support is equally vital, as students often face anxiety and confidence issues in their writing process. Lecturers should provide continuous encouragement and create a supportive environment that enhances students' confidence and motivation. For EFL students, addressing barriers to critical thinking involves cultivating strong motivation, managing stress effectively, and expanding knowledge in their research topics. Actively engaging in these areas is essential for improving academic writing quality. Lastly, for future researchers, this study suggests employing a mixed methods approach to gather comprehensive data, combining quantitative surveys with qualitative interviews to deepen understanding and validity in exploring similar research topics.

**REFERENCES**

Adelina, R. A. N. Y. (2018). BMI Correlated to Dietary Patterns of Indonesian College Students Lives in Taipei City, Taiwan. Pak J Med H Sci, 12(3), 1308-1312.

Argiandini, S. R. (2020). Analisis kemampuan berpikir kritis dan kebiasaan membaca untuk bekal menulis karya ilmiah. 1, 2.

Barus, G. (2022). Mengulik tiga factor pendukung percepatan penulisan skripsi mahasiswa. Scholaria: JurnalPendidikan Dan Kebudayaan, 12(2), 96-108.

Braun, V., & Clarke, V. (2006). Using thematic analysis in psychology. Qualitative research in psychology, 3(2), 77-101. challenges encountered by doctoral students, Higher Education Research & Development, DOI: 10.1080/07294360.2020.1809354

Hu, W., Jia, X., Plucker, J. A., & Shan, X. (2016). Effects of a critical thinking skills program on the learning motivation of primary school students. Roeper review, 38(2), 70-83.

İpek, Z. H., Gözüm, A. I. C., Papadakis, S., &Kallogiannakis, M. (2023). Educational Applications of the ChatGPT AI System: A Systematic Review Research. Educational Process: International Journal, 12(3), 26-55.

Nejmaoui, N. (2019). Improving EFL Learners' Critical Thinking Skills in Argumentative Writing. English language teaching, 12(1), 98-109

Ompusunggu, M. M. (2022). Pengaruh Manajemen Waktudan Kecenderungan Kecemasan Terhadap Prokrastinasi Skripsi Pada Mahasiswa. Psikoborneo: Jurnal Ilmiah Psikologi, 10(2), 241. https://doi.org/10.30872/psikoborneo.v10i2.6966

Prasiska, C., &Tohamba, P. (2021). The Challenges That Indonesian Students Faced in Academic Writing: A Cross-Disciplinary Study of Academic Literacies. 540(Ictes 2020), 12–18.

Prihatsanti, et al. (2018). Menggunakan Studi Kasus sebagai Metode Ilmiah dalam Psikologi. Buletin Psiikologi, 26(2), 126–136. https://doi.org/10.22146/buletinpsikologi.38895.

Rahmat, NH, 2019. (2019). Masalah masalah retoris di kalangan penulis akademik. Humaniora. 4(4), 506-515. https://doi.org/10.20448/801.44.506.515.

Samanhudi, U., &Linse, C. (2019). Critical Thinking-Related Challenges to Academic Writing: A Case of Indonesian Postgraduate Students at a UK University. Lingua Cultura, 13(2), 107. https://doi.org/10.21512/lc.v13i1.5122.

Thabran, Y., Fajaryani, N., &Abrar, M. (2022). Teaching critical thinking skills using Case-Based Method: A case study in Critical Reading and Writing course. Ethical Lingua: Journal of Language Teaching and Literature, 9(1), 14-19.

Vyncke, M. (2012). The concept and practice of critical thinking in academic writing: an investigation of international students' perceptions and writing experiences (p. 21).

Wakhyudin, H., &Putri, A. D. S. (2020). Analisis kecemasan mahasiswa dalam menyelesaikan skripsi. Wasis: jurnal ilmiah pendidikan, 1(1), 14-18.

Wallace, M. J. (2008). Action Research for Language teachers, twelfth edition.

Whiting, D. (2015). Fostering confidence in critical thinking and research appraisal skills through journal club participation: An action research study.

Zhou, J. (2015). An apple a day keeps the doctor away… Five minutes of exercise a day helps the doctorate stay! A Guide for Psychology Postgraduates: Surviving Postgraduate Study,73.