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AI-Based Corrective Feedback in Writing Skills: How Do Students See It?

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ABSTRACT: AI has emerged as a potential tool for providing automatic feedback on students' writing processes. One AI-based automatic feedback tool is ProWritingAid. This study aims to explore students' perceptions of how they view ProWritingAid as an AI-based automatic feedback tool in supporting writing skills. Several studies have examined students' perceptions of ProWritingAid in writing skills, but these studies were conducted on EFL learners outside Indonesia, where the students' backgrounds are different. Therefore, to bridge this gap, this study was conducted on Indonesian undergraduate students. Using a phenomenological qualitative approach, participants were involved in semi-structured interviews to collect data concentrating on their experiences, the benefits gained, and the roles expected of students. The findings show that ProWritingAid contributes to students' writing skills by explaining writing errors. The various feedback features available in ProWritingAid greatly benefit students in terms of writing aspects and time efficiency. Students also indicated that they felt the tool served as a writing companion that could improve their writing skills.

KEYWORDS: AI-Based Corrective Feedback, AI In Writing Skill, Students' Perception.

INTRODUCTION

Writing is one of the skills that needs to be mastered in language learning. Understanding, mastering, and conveying concepts in the form of paragraphs or essays is a necessary foundation for writing skills (Intiser et al., 2023). However, many students find it difficult to master writing skills due to various aspects that need to be considered when writing, such as spelling, grammar, punctuation, vocabulary, and so on. In writing, students are required to express their thoughts and ideas in meaningful writing, which is why writing is often considered a challenging skill (Perend, 2023). Writing is complicated, so during the process, students will revise repeatedly to achieve the best result. In this case, feedback is needed in the writing process. Feedback plays a role in improving students' writing skills, both from the results of their writing and in the writing process itself (Wulandari, 2022).

Along with the development of technology in the world of education, AI has emerged with various features to assist students in the writing process. One of these features is AI-based corrective feedback, which is able to provide objective, consistent, and quick feedback so that students can understand and correct their mistakes in a timely manner (Nazli et al., 2025). Online platforms have designed automated written corrective feedback features to help students correct language errors in their writing (Rahimi et al., 2025). AI-based corrective feedback is capable of analyzing minor errors in writing, which is very helpful in improving writing accuracy (Khan et al., 2025). The automatic feedback provided by AI includes vocabulary, grammar, organization, and coherence, which can improve the effectiveness of the writing process (Mun, 2024).

Although AI-based corrective feedback has various advantages, students' perceptions of its use still vary greatly. As reported in several studies, AI-based automatic feedback is useful in the writing process by correcting grammar, providing real-time feedback, improving sentence clarity, and increasing the efficiency of corrections. However, there are concerns and challenges regarding ambiguity in some contexts and the risk of dependence, which can limit creativity (Afifah & Dewi, 2025; Chen, 2025). Students' perceptions of AI-generated feedback vary depending on the prompting method used when requesting feedback (Pylypenko, 2025). A study states that students have diverse perceptions regarding the appropriateness of feedback, whether the feedback is effective or not depends on how critically students review the feedback (Aruna & Sarosa, 2025).

Previous studies have shown that AI-based feedback significantly improves the writing skills of EFL learners (Thao et al., 2025; Sanosi, 2022). ProWritingAid is an AI-based feedback tool equipped with advanced features that can analyze and evaluate students' writing in greater depth, Bahari (2024) also states that this tool significantly improves students' writing skills. However, most of these studies were conducted in the general context of EFL and outside Indonesia, with students who had different backgrounds and abilities. Thus, there is a gap in understanding how AI-based corrective feedback can be applied to English Education students at Mercu Buana University Yogyakarta. ProWritingAid will choose for this research, because this tool is relevant to the research objective, which is to investigate students' perceptions of AI-based corrective feedback in writing skills. Focusing on the experience,

expected roles, and benefits gained by students in the process of writing using AI-based corrective feedback, this study is expected to provide insights into how AI is utilized in the writing learning process.

Based on the background of the problem explained above, the following problems can be formulated:

1. What is the students' experience in using ProWritingAid during the writing process?
2. What is the students' perception of the expected role of ProWritingAid?
3. What are the advantages of ProWritingAid that are accepted by students?

METHOD

This study uses qualitative methods with a phenomenological research design approach. This approach was chosen to identify and describe the similar experiences of the participants in dealing with the phenomenon (Creswell, 2016). The phenomenon referred to in this study is the use of ProWritingAid. This study involved English Language Education students at Universitas Mercu Buana Yogyakarta who were selected using purposive sampling techniques. Considering that the participants have experience using ProWritingAid, 5 people were finally selected to be the sample in this study. The data in this study used semi-structured interviews based on (Kim et al., 2025). Then, the data obtained was analyzed using a thematic analysis technique, which focuses on experience, expected roles, and advantages.

RESULT AND DISCUSSION

Analysis from various student perspectives was conducted to gain insight into how students use ProWritingAid to facilitate their writing skills. The analysis focused on students' experiences using ProWritingAid, the role they expected it to play in the writing process, and the advantages they felt when receiving feedback from the tool.

Students' Experience of ProWritingAid in Writing Process

The students' experience in using ProWritingAid shows a significant contribution to their writing process. Based on the interview results, students revealed that by using ProWritingAid, the tool helps identify errors in grammar, sentence structure, spelling, and writing style. Not only does it detect errors, but this tool also provides suggestions for corrections in spelling, grammar, and punctuation (Akramuzzaman, 2023). This can be seen from participant 1's statement: *"When I'm using ProWritingAid, it provides some suggestion about my grammar, about my sentence structure."* Similarly, participant 4 stated that *"With ProWritingAid, I can immediately see mistakes in grammar, spelling, or writing style."* This is in line with the findings of Damayanti & Santosa (2024), who state that ProWritingAid is a tool that helps improve grammar accuracy, sentence structure, spelling, and writing quality. Based on these findings, ProWritingAid is one of the AI tools that provides a positive learning experience.

Furthermore, several other students also stated that ProWritingAid made the writing process easier by identifying writing errors and providing suggestions for improvement. Therefore, this makes their writing neater and more structured. In the findings of Pitukwong & Saraiwang (2024), students indicated that ProWritingAid is a holistic tool equipped with automatic correction and comprehensive explanations. As participant 2 said: *"Using ProWritingAid makes it easier because we can see the writing errors and correct them immediately to make the writing neater and more structured."* And also participant 3: *"Using ProWritingAid also allows me to see mistakes and suggestions for improvement, so my writing becomes neater and more structured."* A similar point was also emphasized by participant 5, who stated that *"ProwritingAid immediately shows me which parts are not quite right and can be improved."* Likewise, Rahma & Zen (2023) state that ProWritingAid allows students to analyze errors in their writing. Indirectly, students learn from their previous mistakes, which then improves their writing.

Students' Perception of Expected Roles of ProWritingAid

From the analysis of students' statements regarding their expectations of ProWritingAid, students see ProWritingAid not only as a tool for proofreading or providing suggestions and simply changing their writing, but also as a support for developing their writing skills. By receiving automatic feedback, students will become aware of their habits and mistakes in their writing, which will ultimately shape their self-understanding in the learning process (Farahdiba, 2025). This can be seen in participant 1's statement: *"I expected that ProWritingAid is provide direct suggestion about my writing task. But, after using this for a long time during my writing task I recognized that ProWritingAid is not only want me to change my writing, but to more understand about how to make a good sentence structure or so on"* And also a statement from participant 4: *"I thought ProWritingAid was just for checking grammar. But after I used it, I found that it has many other features, such as improving writing style and clarity."* Other students also expressed the view that ProWritingAid is expected to help expand their vocabulary and make their writing more interesting to read, as stated by participant 3: "*I hope ProWritingAid can be a tool to help improve grammar, expand vocabulary, and make writing more enjoyable to read*." This finding is in line with Ariyanto et al (2019) which shows that with ProWritingAid, students can understand and correct their writing errors through explanations provided by the tool. Gradually and independently, students will become reflective and able to recognize areas for improvement in their own writing.

Meanwhile, participant 5 said: *"I thought ProWritingAid could fix everything, but it turns out I still need to make my own adjustments."* This statement shows that even though ProWritingAid provides various suggestions regarding aspects of writing,

students must still make adjustments so that their writing matches the style and intent or desire of the writer. The detailed report provided by ProWritingAid still requires adjustments from the writer based on the writing purpose and audience (Farahdiba, 2025). In line with this opinion, participant 2 also emphasized: *" I hope ProWritingAid can be a companion in writing and not a tool that makes me lazy to think about expressing my ideas"* This highlights ProWritingAid's role here as a writing companion, not as a substitute for the writer's thought process. AI is more accurately viewed as a companion rather than a direct replacement in writing, because even though its use is increasingly helpful, students still rely on their own logic, especially in complex writing (Dawes & Melnikova, 2025). Ultimately, achieving effective and authentic writing requires a balance between technological assistance and one's own critical thinking skills.

Students' Perceived Advantages of ProWritingAid

"The aspect of ProWritingAid that I think have positively effect on my writing process itself are grammar and also when I make the structure of the sentence" (Participant 1)

"I think the grammar check feature can help me write more neatly" (Participant 2)

"The most helpful features, in my opinion, are the grammar checker and clarity tools." (Participant 3)

"The most helpful features, in my opinion, are grammar and clarity." (Participant 4)

"The most helpful part is checking sentence structure and clarity of writing." (Participant 5)

Based on interviews conducted with five participants who have used ProWritingAid, they mentioned several features that they found useful in writing. Almost all participants consistently mentioned that the grammar checking feature was useful in the writing process. With the grammar feature, students can identify grammatical errors that they may not have been aware of before, so that their writing complies with the rules of writing. According to Rezaee & Allahyari (2023) ProWritingAid contributes to grammar checking, writing style editing, and guidance in the writing process. In addition, students also believe that the clarity and sentence structure features were useful for their writing. These features combine to support students' ideas in writing so that they are easier to read and understand. These findings show that ProWritingAid is useful as an effective tool in improving students' writing skills with the support of its features. Similar to what Borna et al (2024) stated, ProWritingAid has the potential to have a positive impact on improving students' writing skills, as can be seen from the feedback provided by ProWritingAid, which covers grammar, sentence structure, writing style, and other aspects related to writing.

"I do really agree that it has saved my time" (participant 1)

"ProWritingAid can help me save time." (participant 2)

"Yes, of course. ProWritingAid helps me save time" (participant 3)

"ProWritingAid is very helpful and saves time" (participant 4)

"ProwritingAid makes the revision process faster" (participant 5)

Quoted from the interview responses with participants, as stated above, all participants agreed that using ProWritingAid can help them save time in the process of writing and revising their writing. Referring to (Pham, 2025), the development of AI has given rise to various ways of improving time efficiency, which is a highly valuable aspect. Students feel the benefits of using ProWritingAid in terms of the time spent during the writing process. They can easily check for errors without having to read the text repeatedly. This tool gives students the opportunity to correct and retry their work without waiting long for feedback (Tran & Nguyen, 2021). Suggestions for improvement are provided immediately without a long wait, so students can immediately identify the parts that need to be corrected and revise more efficiently. Supported by features that work automatically, ProWritingAid can help students speed up the editing process, which usually takes a long time when done manually. Students felt the positive impact of ProWritingAid because their writing time became more effective (Ariyanto et al., 2021). Students can focus more on developing ideas without being burdened by manual revisions.

"I wrote better using that AI and rather than I write by myself" (participant 1)

"Yes, the results look better and more structured. With the help of ProWritingAid" (participant 2)

"After using ProWritingAid, I feel that my writing has improved" (participant 3)

"My writing is clearly much better when I use ProWritingAid," (participant 4)

"The final result feels neater and easier to read" (participant 5)

In addition, the students also indicated that they felt there had been an improvement in the quality of their writing. As stated by the participants above, they agreed that after using ProWritingAid, their writing had become better, more structured, and easier to understand. In the same way, Akramuzzaman (2023) stated that, students improved their writing skills by using ProWritingAid. These findings show that ProWritingAid has a positive impact on writing. The tool not only helps identify errors but also contributes to the overall quality of students' writing. This is reinforced by Wahyuda et al (2022), who state that ProWritingAid has a positive impact and can effectively improve students' writing skills. The integration of technology in learning is represented in the changes that have occurred in the world of education (Polakova & Ivenz, 2024). This proves that integrating technology such as ProWritingAid into learning can be a relevant strategy for improving writing skills.

CONCLUSION

This study highlights students' views on the use of ProWritingAid, including their perceptions when using this tool, their experiences, and the benefits they received after using it. After conducting interviews with the students, they provided different views on the use of ProWritingAid during the writing process. In terms of experience, the students revealed that ProWritingAid helped them. They became aware of the details of the mistakes in their writing. Therefore, ProWritingAid became an adequate tool for students to understand the important aspects of good writing. From the perspective of its expected role, students see ProWritingAid not only as a correction tool, but also as a companion that can guide students during the writing process. However, students realize that in the end, their writing still requires their own critical ideas. While using ProWritingAid, students experience various benefits. They emphasize that the grammar, clarity, and sentence structure checking features are very helpful in the writing process. In addition, this tool can also shorten the editing process because it provides suggestions for improvement so that students can correct their writing immediately. Respondents explained that after using ProWritingAid, their writing became neater, more organized, and easier to understand. It can be concluded that the findings of this study show that ProWritingAid plays an important role in supporting students' writing process. This tool contributes significantly to improving students' writing skills in terms of both writing quality and comprehension. Overall, this research is important in providing an overview of how students utilize AI in the learning process so that it can be used wisely. The results of this study can be applied in various educational contexts to design AI-based learning by considering the needs and preferences of students. It is recommended that future research explore the long-term impact of using ProWritingAid or compare its effectiveness with other tools.

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