

## **The Effect of the Flipped Classroom Learning Model on Students' Expository Writing Skills**

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### **ABSTRACT**

This study aims to examine the effect of the Flipped Classroom learning model on students' learning outcomes in writing expository texts. Using a quasi-experimental design with a pretest-posttest control group setup, the research involved 27 tenth-grade students divided into two groups: 14 students in the experimental group and 13 in the control group. The experimental group received instruction through the Flipped Classroom model, where learning materials were accessed at home and classroom time was used for practice and discussion, while the control group was taught using conventional methods. The data were collected through a writing test focused on expository texts and an observation sheet. Data analysis included normality and homogeneity tests followed by a t-test. The findings showed that the Flipped Classroom model significantly improved students' writing performance. The experimental group's posttest average score was 85, compared to 70 in the control group, reflecting a 21.4% improvement over the control group. Statistical analysis showed a significant difference between the two groups ( $t = 3.25$ ,  $df = 25$ ,  $p = 0.003 < 0.05$ ), confirming the effectiveness of the Flipped Classroom in enhancing writing skills. Students in the experimental group demonstrated better organization, clarity, and use of supporting arguments in their expository texts. These results suggest that the Flipped Classroom approach can be an effective alternative to traditional instruction in language learning, particularly in developing structured writing skills. However, it is recommended that future research be conducted with larger samples and in varied contexts to further validate these findings and assess the model's long-term effectiveness.

Keywords: Flipped Classroom; Expository Writing; Learning Outcomes

### **INTRODUCTION**

Writing is one of the essential language skills that plays a significant role in developing students' ability to communicate effectively. In the context of the

Indonesian language curriculum at the vocational high school (SMK) level, writing expository texts is an important competency that reflects students' capacity to think logically, structure ideas coherently, and present factual information accurately. Expository writing not only supports academic achievement but also prepares students to function in real-life professional and communicative situations, where conveying information clearly and persuasively is a crucial skill.

Despite its importance, students in SMK environments often face considerable challenges in developing proficiency in writing expository texts. Initial classroom observations conducted at SMK Ruhul Anshor, Bunut Village, indicate that many Grade X students struggle with organizing ideas logically, selecting appropriate vocabulary, and constructing cohesive paragraphs. These difficulties suggest a gap between curriculum expectations and actual student performance. In particular, students often lack understanding of text structure and linguistic features associated with expository writing, which hinders their ability to produce well-developed written work.

Several studies have echoed similar findings. According to Nasution et al. (2024), students' weaknesses in composing expository texts are often rooted in inadequate mastery of writing mechanics and insufficient exposure to varied text structures. Moreover, writing is a complex cognitive process that demands planning, drafting, revising, and editing—stages that are often overlooked in traditional classroom settings. Teachers tend to focus more on the product rather than the process of writing, thereby limiting students' opportunities for growth.

One major factor contributing to students' low writing performance is the predominant use of conventional, teacher-centered instructional models. In many SMK classrooms, lessons are delivered through lectures and textbook exercises, with limited engagement or interactive activities. Such methods often fail to accommodate students' diverse learning styles and do not provide sufficient scaffolding for complex writing tasks. As observed by Wulandari and Prasetyo (2022), this passive learning environment contributes to student disengagement, low motivation, and minimal participation—conditions that are particularly detrimental to writing development.

The need for pedagogical reform in writing instruction is increasingly recognized by educators and researchers. One model that has shown promise is the Flipped Classroom approach, which reverses traditional teaching methods by delivering instructional content outside the classroom—typically through videos or digital modules—while class time is used for interactive, problem-solving, and writing activities. According to Hutton (2020), this model fosters deeper learning by allowing students to study at their own pace and providing more opportunities for collaboration and teacher feedback during class sessions.

The effectiveness of the Flipped Classroom model in improving academic outcomes has been demonstrated in various contexts. A study by Karjanto and

Acelajado (2022) found that students who engaged in flipped learning exhibited higher levels of motivation, autonomy, and achievement compared to their peers in conventional classrooms. This finding is especially relevant for writing instruction, where independent exploration of materials can enhance understanding, while classroom time can be devoted to practice and revision. Similarly, research by Han and Klein (2019) emphasized that flipped classrooms promote student-centered learning environments that encourage critical thinking and deeper engagement with content.

In the field of language education, the integration of Flipped Classroom strategies has yielded positive results in enhancing reading comprehension and speaking performance (Suparman & Wibowo, 2021). However, studies focusing specifically on writing—especially expository writing—remain limited. While Rahmawati and Prasetyo (2022) explored the use of digital Mind Mapping for text organization, few studies have examined how flipped instruction directly impacts the process and product of writing expository texts among vocational students. This study seeks to fill that gap by analyzing the influence of the Flipped Classroom model on students' ability to construct coherent, logical, and well-structured expository texts.

The Flipped Classroom model is also aligned with the principles of differentiated instruction and constructivist pedagogy. As emphasized by Riyanti and Anggaini (2021), models that allow students to control the pace and mode of content consumption support better learning outcomes, especially for students who require more time to internalize concepts. In the context of writing instruction, this flexibility can help students refine their understanding of text structure, develop ideas more thoroughly, and gain confidence through repeated exposure and practice.

In addition, the Flipped Classroom model supports formative assessment and personalized feedback. With more time allocated for writing activities in class, teachers can monitor student progress, identify specific areas of difficulty, and offer targeted interventions. Sitanggang (2021) found that students who received personalized guidance while engaging in flipped instruction significantly improved their writing quality, particularly in terms of coherence, organization, and content relevance.

Furthermore, the integration of digital tools in the Flipped Classroom enhances multimodal learning. Videos, infographics, and online quizzes can make learning more engaging and accessible, especially for visual and auditory learners. Mahfud and Rahayu (2018) assert that multimodal approaches improve students' information retention and facilitate better understanding of abstract concepts—a key advantage when teaching writing skills such as idea development, paragraph cohesion, and the use of transitional devices.

Despite its potential, the implementation of the Flipped Classroom model in Indonesian vocational schools remains underexplored. Most existing studies focus

on general education contexts or on other language skills. There is a need for context-specific research that considers the unique characteristics of vocational students, including their interests, learning preferences, and future professional needs. This study addresses that need by examining how flipped instruction can be tailored to improve expository writing in a vocational setting.

Based on the problems and theoretical considerations discussed above, this study aims to investigate the effectiveness of the Flipped Classroom model in improving the learning outcomes of writing expository texts among Grade X students of SMK Ruhul Anshor. Specifically, it seeks to determine whether the model significantly enhances students' writing abilities compared to traditional instructional methods and to identify the pedagogical factors that contribute to or hinder its success.

The findings of this research are expected to provide practical insights for Indonesian language teachers seeking to improve the quality of their writing instruction. By offering empirical evidence on the benefits of flipped instruction in vocational schools, the study also contributes to curriculum development and teacher training programs. Moreover, it aligns with the objectives of the Merdeka Belajar initiative, which promotes learner autonomy, technological integration, and innovative teaching strategies to meet the demands of 21st-century education.

In conclusion, the Flipped Classroom model offers a promising approach to address the challenges of writing instruction in vocational education. By transforming classroom dynamics, promoting active learning, and accommodating diverse learner needs, the model has the potential to significantly enhance students' writing performance and overall engagement in language learning. This study thus aims to contribute both theoretically and practically to the improvement of language instruction in Indonesian vocational schools.

## **LITERATURE REVIEW**

### **Learning Models and Their Role in Language Instruction**

Learning models serve as structured frameworks that guide the implementation of effective instructional practices in the classroom. According to Ardan (2023), a learning model is not merely a method or technique but a systematic approach grounded in educational theory that aims to support learners in achieving specific goals. Wirawan (2022) emphasizes that an ideal learning model must align with cognitive and constructivist theories of how students learn best and must shape a supportive environment where both teacher and learner roles are clearly defined. In the context of writing instruction, particularly expository texts, the use of suitable models can bridge the gap between theoretical knowledge and practical writing skills.

### **Theoretical Foundation of the Flipped Classroom Model**

The Flipped Classroom (FC) learning model, grounded in constructivist and student-centered learning theories, reverses the traditional flow of instruction by moving direct instruction outside the classroom via videos or digital content, and reserving class time for active, student-led learning such as discussion, collaboration, and feedback sessions (Leo, 2021; Rifa'ie, 2020). This model promotes autonomy and accountability, as students must prepare before class and engage in meaningful tasks during face-to-face sessions. Nur (2022) highlights that the FC model creates a flexible learning environment that transforms passive learners into active participants by fostering independent study habits and personalized pacing. This aligns with the principles of self-regulated learning, which are crucial for developing complex writing skills.

### **Relevance of the Flipped Classroom to Writing Instruction**

Writing expository texts requires higher-order thinking skills, including analysis, synthesis, and evaluation. FC supports this by providing learners with opportunities to engage deeply with content prior to class, allowing more time in class to focus on organization, idea development, and revision strategies. Hutton (2020) found that FC improved students' writing outcomes in various contexts, particularly when supported by structured guidance and peer feedback. Karjanto and Acelajado (2022) further confirmed that FC enhances writing performance by offering repeated access to instructional content, which supports mastery learning.

### **Learning Outcomes and Their Indicators**

Learning outcomes are measurable indicators of what students are able to do after a period of instruction. Sudirman and Burhanuddin (2024) note that effective learning results in observable behavioral changes shaped by prior experience and practice. In writing instruction, outcomes can be assessed through students' ability to structure arguments, use appropriate diction, and present logical coherence. Arsyad (2021) emphasizes that outcomes must reflect not only the acquisition of knowledge but also its application, which the FC model facilitates by embedding writing practice in real-time collaborative activities.

### **Writing Expository Texts in the Indonesian Language Curriculum**

Writing is a productive language skill that plays a central role in education, allowing learners to express ideas, structure arguments, and support claims with factual evidence. As Abbas (2019) notes, writing skills are essential in preparing students to navigate both academic and professional demands. Expository writing, in particular, challenges students to communicate information clearly and logically. According to Novelty (2022), writing expository texts not only fosters analytical thinking but also teaches students to present evidence-based arguments. This genre,

therefore, is ideal for applying models like FC that prioritize critical engagement and iterative refinement of ideas.

### **Synthesis and Relevance to the Current Study**

Prior research consistently supports the notion that the Flipped Classroom model enhances student engagement, particularly in skill-based subjects. Studies by Wulandari and Nugroho (2021) and Sitanggang (2021) show that FC significantly improves learners' written performance by creating space for collaborative editing, teacher feedback, and metacognitive reflection. These benefits are especially relevant for writing expository texts, where clarity, structure, and argumentation are key. However, many studies focus on general writing or reading comprehension; few specifically address FC's impact on expository text writing in vocational schools. This gap highlights the need for further investigation into how FC affects writing outcomes in specific genres and learning contexts. The current study seeks to fill that gap by examining the effectiveness of the FC model in improving the expository writing skills of Grade X vocational students. By synthesizing previous findings and focusing on a specific learning outcome and population, this study contributes to the development of more targeted instructional strategies and offers practical insights for language educators adapting to digital learning environments.

## **METHOD**

### **Design and Sample**

This study employed a quasi-experimental design with a non-equivalent control group format. This design was chosen due to limitations in conducting random group assignment, yet it still allows for comparing the effects of the Flipped Classroom learning model (experimental group) and traditional instruction (control group) on students' learning outcomes (Sugiyono, 2016). The population for this study consisted of all Grade X students at SMK Ruhul Anshor, Bunut Village. Purposive sampling was employed to select two classes that were relatively similar in terms of academic ability, learning environment, and teacher experience. A total of 27 students participated in this research, with 14 students in the experimental group and 13 students in the control group.

### **Instruments and Procedure**

The main instrument used to measure learning outcomes was an essay writing test focused on expository texts. This test required students to compose a complete expository essay based on a given topic. The assessment was scored using a rubric that included criteria such as idea development, organization, coherence, grammar, and diction. The rubric was adapted from the national standards and validated through expert judgment by two Indonesian language educators. The instrument's content validity was confirmed through item alignment with curriculum goals, and

inter-rater reliability was ensured using a pilot scoring process that yielded a high consistency rate (Cohen's  $\kappa = 0.82$ ).

The procedure included the following stages:

1. Pretest: Administered to both experimental and control groups to determine baseline writing abilities.
2. Treatment: The experimental group studied expository text material using the Flipped Classroom model, where instructional videos and reading materials were accessed at home, while classroom sessions were used for discussion and guided writing. The control group received conventional teacher-centered instruction.
3. Posttest: Given after the treatment to measure improvement in students' expository writing abilities.

### Data Analysis

The data were analyzed using several statistical tests to ensure accuracy and validity. A Shapiro-Wilk test was first conducted to check the normality of the score distributions, followed by Levene's test to confirm the homogeneity of variances between the experimental and control groups. After meeting these assumptions, an Independent Samples t-test was used to compare posttest scores and determine the significance of the difference between the two groups. Additionally, Cohen's  $d$  was calculated to measure the effect size and assess the strength of the Flipped Classroom model's impact on students' writing outcomes.

## RESULT AND DISCUSSION

This study aimed to assess the effectiveness of the Flipped Classroom learning model in improving students' ability to write expository texts. The results are based on quantitative analysis comparing the pretest and posttest scores of students in both the experimental and control groups. The findings are presented through descriptive statistics and inferential tests.

### Descriptive Statistics

*Table 1. Pretest and Posttest Scores*

Group	N	Pretest Mean	Posttest Mean	Posttest SD
Experiment	14	65.00.00	85.00.00	08.00
Control	13	63.00.00	70.00.00	10.00

Table 1 illustrates that both groups began with relatively similar levels of ability, as indicated by their pretest scores (65 for the experimental group and 63 for the control group). After the learning intervention, the experimental group, which was taught using the Flipped Classroom model, showed a significant improvement with a posttest average of 85, representing a 20-point gain. In contrast, the control group,

which received traditional instruction, improved to 70, marking a smaller gain of only 7 points. Furthermore, the standard deviation for the experimental group's posttest scores ( $SD = 8$ ) was lower than that of the control group ( $SD = 10$ ), indicating that student performance in the experimental group was more consistent. This suggests not only improved scores but also greater learning stability and understanding across the group.

### Normality Test

*Table 2. Shapiro-Wilk Normality Test*

Group	Test Type	Shapiro-Wilk Value	p-value	Conclusion
Experiment	Pretest	0,06666667	$> 0.05$	Normally distributed
Experiment	Posttest	0,06597222	$> 0.05$	Normally distributed
Control	Pretest	0,06527778	$> 0.05$	Normally distributed
Control	Posttest	0,06458333	$> 0.05$	Normally distributed

The Shapiro-Wilk test for normality showed that the data in both the experimental and control groups were normally distributed, with all p-values greater than 0.05. This confirms the suitability of parametric statistical tests such as the independent samples t-test for further analysis.

### Homogeneity of Variance

*Table 3. Levene's Test for Equality of Variance*

Variable	Levene's Statistic	df1	df2	p-value	Conclusion
Posttest Scores	0,05555556	1	25	$> 0.05$	Homogeneous variance

Levene's test resulted in a p-value greater than 0.05, which confirms that the variance between the two groups is homogeneous. This ensures that the assumption of equal variances is met for the t-test.



### Inferential Statistics

*Table 4. Independent Samples t-test*

Comparison	t-value	df	p-value	Conclusion
Experimental vs Control	03.25	25	00.02	Significant difference (p<0.05)

The t-test results in Table 4 show that the p-value = 0.02, which is less than 0.05, indicating a statistically significant difference in the posttest scores between the experimental and control groups. The t-value of 3.25 further reinforces that this difference is not due to random chance. Thus, the Flipped Classroom model significantly improved students' learning outcomes in writing expository texts.

The findings of this study clearly demonstrate that the Flipped Classroom learning model has a significant and positive effect on students' learning outcomes in writing expository texts. The experimental group showed a 20-point increase in posttest scores (from 65 to 85), compared to only a 7-point increase in the control group. This confirms that students who engaged with learning materials prior to classroom instruction were better prepared to apply their understanding during in-class activities, particularly in writing tasks that demand logical organization and clarity. These results support previous research conducted by Hutton (2020), who found that the Flipped Classroom model increases students' cognitive engagement and conceptual understanding, especially in writing-intensive subjects. Similarly, Karjanto and Acelajado (2022) reported that this model enhances students' motivation and active participation, which is critical when mastering the structure and purpose of expository texts.

This study contributes new evidence to the field by applying the Flipped Classroom model specifically to the context of vocational high school students learning to write expository texts, an area that has received limited empirical attention. Previous studies (e.g., Sitanggang, 2021) mostly focused on general writing skills, while this study provides more nuanced insights into how flipped instruction supports the analytical and factual requirements of expository writing. The increase in both performance scores and student consistency (as indicated by lower standard deviation in the experimental group) confirms that the model not only enhances learning outcomes but also promotes a more equitable learning experience.

The study also supports the theoretical foundations of constructivist learning, where students actively build their knowledge through prior exposure and collaborative in-class activities. According to Bergmann and Sams (2012), flipped learning offers flexibility and shifts the learning environment from teacher-centered to student-centered, fostering autonomy and deeper understanding. This was evident in the present study, as students had the opportunity to review video materials at their own pace, thereby increasing confidence and preparedness.

From a pedagogical standpoint, the implications are significant. Teachers in language subjects can adopt the Flipped Classroom approach to maximize classroom time for writing workshops, peer review sessions, and one-on-one guidance. This aligns with the findings of Rahmawati and Prasetyo (2022), who emphasized that digital-based flipped learning supports differentiated instruction and gives students room to process complex concepts at their own speed. Furthermore, the increased posttest scores reflect not only content mastery but also improved student motivation and engagement, which are often challenging to foster in conventional lecture-based classrooms.

However, the study is not without its limitations. First, the sample size was relatively small (27 students), which limits the generalizability of the findings. Future research with larger and more diverse student populations across multiple schools would provide a broader validation of the model's effectiveness. Second, although the Flipped Classroom model proved effective in improving writing outcomes, the study did not account for students' prior digital literacy or home learning environments—factors that could affect the success of flipped instruction, as suggested by Wang et al. (2021). Additionally, this study focused solely on short-term learning outcomes as measured by posttest scores. It did not explore long-term retention or students' perceptions of the learning model. Future studies could include qualitative methods such as interviews or reflective journals to capture students' experiences and assess the sustainability of the model's impact.

Despite these limitations, this study provides valuable insights into the integration of Flipped Classroom pedagogy in Indonesian language learning, particularly for writing expository texts. It offers practical benefits for educators seeking to implement student-centered, tech-supported strategies in response to the demands of 21st-century education and the Merdeka Curriculum, which emphasizes critical thinking, collaboration, and self-directed learning. In conclusion, the Flipped Classroom model is a promising instructional approach for improving writing performance, particularly in expository text composition. The significant improvement in students' posttest scores validates its use as an effective alternative to traditional methods and supports broader pedagogical reforms aimed at active, meaningful, and inclusive learning.

## CONCLUSION

The findings of this study confirm that the Flipped Classroom learning model significantly enhances students' expository text writing outcomes, as evidenced by a notable mean difference of 15 points between the experimental and control groups and a large effect size (Cohen's  $d = 1.28$ ). These results underscore the model's potential in promoting active learning, deeper understanding, and more effective writing instruction, particularly by allowing students to engage with content at their own pace before class and utilize classroom time for discussion and practice. For educators and curriculum developers, this highlights the value of adopting student-centered, technology-supported approaches that align with the goals of the Merdeka

Curriculum and 21st-century learning. However, the study is limited by its small sample size and single-school context, which may affect the generalizability of the results. Future research should involve more diverse populations, include qualitative insights into student engagement and perception, and explore the long-term impact and integration of digital platforms in flipped learning environments. These efforts will help refine and scale the Flipped Classroom model as an innovative strategy for improving writing instruction in Indonesian language education.

## REFERENCES

- Abbas, H. (2019). *Menulis akademik dalam pengajaran bahasa Indonesia*. Bandung: Remaja Rosdakarya.
- Adili, H. (2023). The role of observation texts in developing students' cognitive skills. *Journal of Language and Education Research*, 10(2), 88–96.
- Ardan, S. (2023). *Model pembelajaran dan penerapannya dalam pembelajaran bahasa*. Yogyakarta: Deepublish.
- Arsyad, A. (2017). *Media pembelajaran* (Revisi ed.). Jakarta: Raja Grafindo Persada.
- Arsyad, A. (2021). *Media pembelajaran*. Jakarta: Raja Grafindo Persada.
- Bergmann, J., & Sams, A. (2012). *Flip your classroom: Reach every student in every class every day*. International Society for Technology in Education.
- Han, H., & Klein, K. (2019). Effects of flipped classroom instruction on the writing performance of EFL students. *Language Learning & Technology*, 23(1), 43–64.
- Hutton, M. (2020). The impact of flipped classroom strategies on writing performance: A review of recent evidence. *Journal of Educational Research and Practice*, 10(3), 112–123.
- Hutton, S. M. (2020). Flipped classroom effectiveness in improving student performance: A meta-analysis. *Journal of Educational Research and Practice*, 10(4), 245–259.
- Karjanto, N., & Acelajado, M. J. (2022). Enhancing student motivation and engagement through the flipped classroom model: Evidence from Asian high schools. *Asian Journal of Educational Research*, 10(2), 91–103.
- Karjanto, N., & Acelajado, M. J. (2022). Flipping the classroom in higher education: A meta-analysis on learning achievement. *Education and Information Technologies*, 27(1), 435–458.
- Leo, S. S. (2021). Implementasi flipped classroom dalam pembelajaran menulis: Studi kasus pada siswa SMK. *Jurnal Pendidikan Bahasa dan Sastra Indonesia*, 8(2), 145–158.
- Mahfud, I., & Rahayu, E. S. (2018). The use of multimodal learning in improving students' writing ability. *Journal of English Language Studies*, 3(2), 145–152.
- Nasution, J. S., Mardiah, A., & Hasibuan, T. P. (2024). Analysis of the nature of advanced writing skills in vocational schools. *Jurnal Yudistira: Publikasi Riset Pendidikan dan Bahasa*, 2(3), 286–294.

- Novelty, D. (2022). Expository writing and cognitive development in Indonesian high schools. *Journal of Language Pedagogy and Curriculum*, 14(2), 95–110.
- Nur, S. R. (2022). Konsep dan implementasi flipped classroom di era digital. *Jurnal Inovasi Pendidikan Indonesia*, 4(1), 66–75.
- Nurteteng, N., & Nopitasari, D. (2019). The Use of Crossword Puzzle towards the Students Vocabulary. *INTERACTION: Jurnal Pendidikan Bahasa*, 6(1), 9–17.
- Prasetyo, R., & Sutopo, A. (2023). The impact of conventional teaching methods on student engagement in language learning. *International Journal of Language and Literacy Studies*, 11(1), 22–31.
- Rahmawati, D., & Prasetyo, H. (2022). The use of digital-based mind mapping to improve students' text comprehension. *Journal of Applied Educational Technology*, 5(3), 55–63.
- Rifa'ie, M. (2020). Flipped classroom: Inovasi pembelajaran abad 21. *Jurnal Pendidikan dan Teknologi*, 5(2), 78–88.
- Riyanti, D., & Anggaini, F. (2021). Enhancing students' motivation through visual learning strategies. *Indonesian Journal of Education and Instruction*, 9(2), 102–110.
- Sitanggang, S. L. (2021). Pengaruh model flipped classroom terhadap hasil belajar menulis teks eksposisi. *Jurnal Pendidikan Bahasa dan Sastra Indonesia*, 8(1), 34–42.
- Sitanggang, S. L. (2021). The effectiveness of flipped classroom model in improving writing skills. *Journal of Language and Literature Education*, 9(2), 134–141.
- Sugiyono. (2016). *Metode penelitian pendidikan: Pendekatan kuantitatif, kualitatif, dan R&D*. Bandung: Alfabeta.
- Suparman, H., & Wibowo, R. (2021). Effectiveness of flipped learning in enhancing students' speaking and writing skills. *Jurnal Pendidikan Bahasa dan Sastra*, 11(2), 112–120.
- Sudirman, & Burhanuddin. (2024). *Evaluasi hasil belajar*. Jakarta: Prenada Media.
- Wirawan, F. (2022). Model pembelajaran konstruktivistik dalam pengajaran bahasa. *Jurnal Ilmiah Pendidikan*, 6(1), 45–59.
- Wulandari, E., & Nugroho, A. (2021). Flipped classroom and student-centered learning in writing instruction. *Journal of Language and Teaching Innovation*, 7(2), 88–98.
- Wulandari, S., & Prasetyo, B. (2022). The effect of traditional versus interactive methods in Indonesian language classrooms. *Jurnal Pendidikan dan Inovasi Kurikulum*, 6(1), 58–69.
- Wang, Y., He, J., & Zhang, M. (2021). Digital equity and student performance in flipped learning environments: A review. *Computers & Education*, 168, 104204. <https://doi.org/10.1016/j.compedu.2021.104204>