An English Writing Materials Analysis Through Microlearning Skill Views

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***Abstract**.*

Microlearning is a short-term learning strategy that can increase students' interest in learning. It is in line with the characteristics of today's students who cannot focus on learning for long periods of time. The study was conducted at three senior high schools in Bogor, Indonesia. This study aimed to analyze microlearning in writing English learning materials for the tenth grader. This research employed a content analysis approach. The data sources are learning materials from two student books from two publishers that refer to Kurikulum Merdeka Belajar as well as additional learning materials developed by teachers such as PowerPoint slides, explainer videos, and infographics. Interviews with three English teachers were also conducted. The result of the study showed that the microlearning features in each unit are not entirely satisfied, although numerous media have been found in a short amount of time, there are still certain components that have not been addressed. The study suggested that to improve students' writing English learning experiences, book writers and teachers should emphasize microlearning aspects and critical thinking skills more in learning materials.

Keywords: *Microlearning, English Writing and Learning Materials.*

I. INTRODUCTION

Micro-learning or microlearning in language means learning activities carried out on a small scale. The word micro here refers to the material or concept conveyed in the learning, in addition to being related to a relatively short time as a learning activity. The term microlearning might be considered to have similarities with microteaching, but it turns out that the two terms are applied to two different concepts. The process of learning using bite-sized, well-planned modules and short-term learning activities is referred to as microlearning. According to Hug cited in Allela (2021) Microlearning addresses the brain's constraint of working memory by countering learner boredom, disengagement, and poor recall caused by cognitive overload as a result of more typical long-format learning.In addition, according to Langreiter and Bolka, as cited in Allela (2021), the term "microlearning" indicates the emerging reality of the ever-increasing fragmentation of both information sources and information units used for learning, particularly in fast-moving areas with rapid development and a constantly high degree of change. On the other hand, according to Torgerson & Iannone (2020), "Microlearning" is a method of learning that focuses on little "portions" of information. In this instance, each learning contact has a specified goal that must be met. Therefore, according to Garg cited in Susilana et al., (2022) "Microlearning is a relatively small-scale learning and short-term learning activity."From the opinions above, it shows that the general understanding to describe micro-learning includes aspects of time, aspects of learning content, and aspects of learning experiences. Microlearning is a small-scale learning strategy in which content (object learning) is designed into little parts utilizing various media forms, resulting in "short content" that helps students quickly comprehend the topic. In addition, the ease of access allows students to learn anywhere and anytime "learning on the go" through the technology devices they have. Therefore, microlearning can be interpreted as learning that is carried out in a short time, the material is studied a little, and students have independence in the learning process.

Microlearning has great importance for a fully self-directed and independent approach to learning; its criteria are suitable with the student's characteristics today. According to Santos in Drakidou (2018), the millennial generation has proven attention spans, which means that they cannot learn thoroughly or work productively when they deal with long, traditional courses. In addition, according to Salleh et al. (2022), microlearning has increased students' enthusiasm in their learning and students' participation is at an excellent level. Therefore, microlearning can be summed up as a short-term learning method, it can help

student interest in their learning and in accordance with the characteristics of today's students who cannot focus on studying for too long.In recent years, there have been many papers describing microlearning in a variety of fields, such as in computer science, retail banking, education, and language learning. According to Yang (2018) micro learning of data structure based on smart phones, Madden & Govender (2020) microlearning in retail banking, De Gagne et al.(2019) Microlearning in health professional education. Furthermore, in education fields according to Buhu & Buhu (2019) microlearning in textiles in higher education, microlearning in teaching mathematics (Mateus-Nieves; Moreno, 2021), microlearning applications among science teachers (Al-shehri, 2021), microlearning in modernize Education system (Jomah et al., 2016) and Sirwan Mohammed et al. (2018) demonstrate the efficacy of microlearning in improving students' learning abilities. In language learning, Edge et al., (2011)studied microlearning for language learning content, Tolstikh et al., (2021) studied microlearning for language learning in engineering students, and Mohammad Hosseini et al., (2020)studied flipping microlearning-based EFL classroom to enhance learners' self-regulation. Furthermore, Meng & Wang (2016) Micro-learning in College English Teaching. In addition, microlearning has had a substantial influence on English pedagogical practice by offering students with conveniently available resources with attainable learning objectives in order to improve instructional designs (Bontisori et al., 2023).

It can be concluded that microlearning has been widely applied in various fields and has been shown to have a positive impact.Meanwhile, the use of microlearning in education fields has been found to have positive impacts. Microlearning, according to Meng and Wang (2016) and Adhipertama et al., (2021), can assist students enhance their entire English skills, namely listening, speaking, reading, and writing.

Rafli & Adri (2022) defined that microlearning evolves over time based on factors such as ease of access, use of technology, and adaptation to modern times. Therefore, using microlearning in English instruction is particularly advantageous because it helps students enhance their entire English abilities, including listening, speaking, reading, and writing. Microlearning is regarded as a key trend in the field of education in the 21st century due to its potential to boost students' enthusiasm, comprehension, and motivation to study.Despite the importance of microlearning in education, few researchers have studied the implementation of microlearning in learning English. However, it is unclear whether microlearning can be infused into in writing English learning materials for senior high school phase E or tenth grader student. In accordance with the considerations above, the analyzing of microlearning is something that must be done especially in English writing materials. Therefore, this study aimed to analyze microlearning infused in writing English learning materials for the tenth grader.

II.   METHODS

The content analysis approach was employed in this study, which is described as a research method for identifying specific parts of textual and visual materials. Content analysis, also known as document analysis, may be used to examine a variety of documents, textbooks, and learning resources. The study was carried out at three senior high schools in Bogor. The content of the coursebooks and additional learning materials serves as the primary source of information for this research because it aims to glean any relevant data from them. Data, in this case, may be words, phrases, or sentences, as well as media as additional learning materials. Microlearning descriptors (Allela 2021, Torgerson & Iannone 2020, De Gagne 2019, Li Zhang 2016, Hug 2005) were used to analyze the data. In the analysis step, the researchers analyzed and described the data gained from some documents, such as course books, existing learning materials, and interviews. The first, the microlearning descriptors were designed to be used to describe microlearning in the existing English learning materials in the English coursebook and supplementary materials. And the next, interview results, should also be presented as secondary data in order to know to what extent microlearning are infused in writing English learning materials.

III.   RESULT AND DISCUSSION

After analyzing the content in the writing English learning materials, the results are then portrayed on the analysis table to what extent microlearning is incorporated and how it   is   incorporated. Look at

Table 1, which lists the book's unit 1 – 6, additional materials from two schools and the microlearning indicators, which have been coded as ML 1–ML 9, to analyze the activity instructions, phrases, words, or sentences that combine microlearning as well as the justifications.

Table 1. Result Analysis of Microlearning

| Book 1	Microlearning Indicators (Code)	Book 2	Microlearning Indicators (Code)
General	ML 4, ML 5	General	ML 4, ML 5
Unit 1	ML 1, ML 2, ML 3, ML 6, ML 8, ML 9	Unit 1	ML 1, ML 6, ML 7, ML 8
Unit 2	ML 1, ML 2, ML 3, ML 6, ML 7, ML 8, ML 9	Unit 2	ML 1, ML 8
Unit 3	ML 1, ML 2, ML 3, ML 6, ML 8	Unit 3	ML 1, ML 8
Unit 4	ML 1, ML 2, ML 3, ML 6, ML 7, ML 8, ML 9	Unit 4	ML 1, ML 8
Unit 5	ML 1, ML 2, ML 3 ML 6, ML 7, ML 8, ML 9	Unit 5	ML 1, ML 6, ML 7, ML 8
Unit 6	ML 1, ML 2, ML 3, ML 6, ML 8, ML 9	Unit 6	ML 1, ML 6, ML 7, ML 8

Further analysis showed that the teaching materials used by high school tenth grader teachers currently contain the microlearning components listed in Table 1. In the analysis of book 1 from units 1 to 6, it was found that English textbooks contain various microlearning indicators, such as: a) ML 1 – present in all units from 1 to 6. b) ML 2 in units 1 to 6 c) ML 3 in all units because the material can be accessed by technology d) ML 4 as general content because the teaching materials are in accordance with the Merdeka Belajar curriculum e) ML 5 is general content as the materials are broken down into specific skills. e) ML 6 found in units 1 to 6. g) ML 7 found in unit 4 and 5. h) ML 8 found in units 1 to 6 i) ML 9 found in units 2 and 4.Then, in the analysis of book 2 from units 1 to 6, it is found that English textbooks contain various microlearning indicators, such as: a) ML 1 is present in all units from 1 to 6. b) ML 4, as general content because the teaching material according to the independent learning curriculum c) ML 5 as general content because the teaching material is broken down into several skills d) ML 6 is found in units 1, 5 and 6 because additional teaching material is in the form of PowerPoint which must be accessed with technology. e) ML 7 The materials are incorporated with varieties of media (PDF, PPT) found in units 1,5 and 6 f) ML 8. - Students are involved in the learning process because in each unit or topic students must follow the learning process. However, from the results of the analysis of this book and additional teaching materials, there are several indicators of microlearning that are not present in teaching materials, including materials designed for a short time (ML 2), The materials contents are provided at the moment of need (ML 3), and students spend less time studying the material (ML 9).

To start with, the ML 3 indicator states: Material content is provided when needed and can be seen from learning materials that can be accessed via the internet such as YouTube video links and QR codes. This automatically allows students to access learning materials regardless of time and place. because they have access to the internet with cell phones or other devices such as laptops and so on. So, they still have access to these teaching materials as long as there is an internet connection and adequate technology.In addition, the ML 4 indicator's claim that "the material is based on the school curriculum" is clearly supported by the textbooks currently used. This is because the independent curriculum is the curriculum used in Indonesia in several schools, although it is limited to certain schools and certain grades. Therefore, the Merdeka Curriculum that is currently used in several schools will be used as a guide by researchers to design the development of teaching material products in the future.Furthermore, the ML 5 indicator, which assumes that the material is divided into different skills, can be found in two current textbooks of teaching materials. The content mapping part of the book informs the user, in this case, the instructor, that each unit is divided into four skills: listening, speaking, reading, and writing. Despite of the fact that the skills are separated into receptive and productive categories, each unit covers the notion of grouping all of the abilities contained in one unit, including writing skills.

Furthermore, ML 6, which includes "material utilizing technology," is found in several existing teaching materials. This indicator appears in Book 1 of Units 1–6 because students must use this type of technology to access the QR code, which contains audio and video links, PowerPoint, and PDF. Then, in book 2, ML 6 appears in units 1, 5, and 6 because additional teaching material is in the form of PowerPoint, which must be accessed using technology. As a result, students can use technology to access the materials via an internet connection or technological devices such as cell phones or computer devices to open the material provided by the teacher.On the other hand, ML 7 "The materials are incorporated with varieties of media" This indicator appears in Book 1 of Units 1–6 which contains audio and video links, PowerPoint, and PDF.Meanwhile, the ML 8 indicator which states that students are involved in the learning process can also be reflected in textbook instructions. In each book unit, it is hoped that students will be actively involved in the learning process. Furthermore, based on the results of the interviews, the teacher stated that during teaching and learning English subjects' students were involved in the learning process such as reading various texts and making their own various texts type as their own assignments. Then, it can be concluded that students do participate actively in the process of learning English.On the other hand, ML 1 indicates that the materials are divided into a single topic (small unit). Because the materials for each unit are divided into several different topics and types of text according to the existing curriculum, this indicator can be found in books 1 and 2 of units 1 to 6, as well as additional material.

Then, the ML 2 indicator states that the materials are designed for a short time (2 - 5 minutes, Allela, 2021; few seconds to 15 minutes, De Gagne 2019). This indicator is found in books 1 and 2 of units 1 to 6 as well as additional material. After analyzing the first book, there are several learning object materials contained in the book or from additional materials developed by teachers from 3 schools. The learning object materials found included audio, Videos, PowerPoint, and PDF. The amount of audio found is 6 audios with a duration from 01:00 s until 04:15 minutes, then there are 3 videos with a duration of 04:52 until 05:00 minutes.Finally, ML 9. Students spend little time learning the materials; this is reflected in learning object materials such as audio and video with short durations ranging from 1 to 5 minutes. As a result of the short duration, students can learn in the expected time.In addition, the learning object materials in the current learning materials were also discovered in the analysis. Figure 1 depicts the course's recognized learning object materials, which include two coursebooks, four sets of PowerPoint, three videos, six audio files, and one PDF. It implies that supplementary learning object materials were regularly employed in English writing studies.

Fig 1. The Existing Learning Object Materials
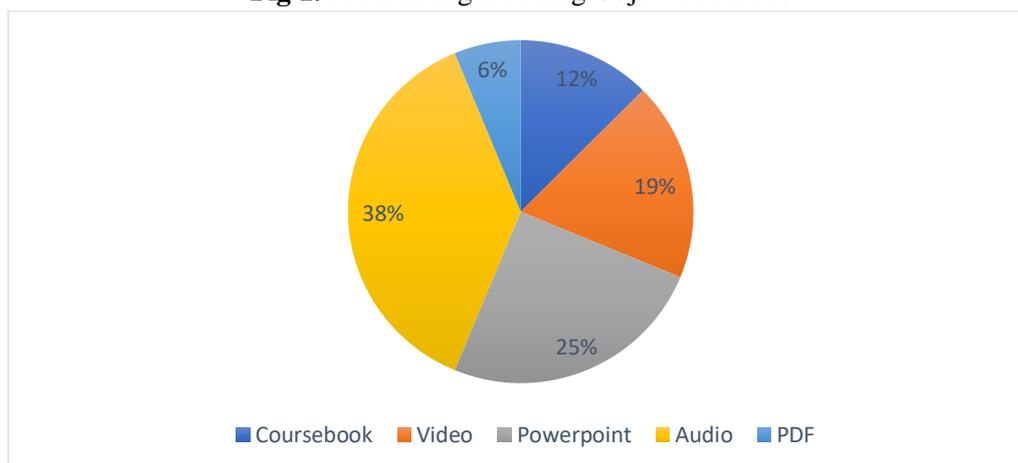
Coursebooks

Based on the analysis of the content of 2 textbooks used in the learning of English writing skills for high school students of 10th grade, it was found that there were 6 units that discussed about 6 types of text. Among some of these units, some are identified to have learning objects materials such as audio in them that can be accessed by scanning them. Then Audio2 was identified as having the criteria of the microlearning aspect.

Audio

According to the findings of this study, audio is found in textbooks that can be accessed using QR code. From some audio found in the identification that the audio has a microlearning aspect because it has a very short duration from 01:00 s until 04:15. As for the audio found to be 6 audios, the audio serves as a medium to provide an understanding of the types of text being studied.

Video

Video may be a powerful tool for integrating microlearning strategies in the classroom. According to Redondo et al., cited in Bontisori et al., (2023) microlearning exercises should take no more than five minutes to capture students' attention and maximize efficiency. Videos that continue longer than five minutes cause pupils to lose focus and skip the video part. The movies identified as having microlearning elements in the study of the instructional material, which included a total of three videos, had a runtime ranging from 04:52 to 05:00 minutes.

PDF

PDF is one of the media that may be utilized in learning; by utilizing PDF in learning, students can access the content through their technological devices. The number of PDFs discovered as learning object materials as a consequence of PDF analysis is one, and the PDF is a textbook file that can be viewed via technology devices.

PowerPoint

The findings of the investigation carried out to identify the training materials utilized in English writing skills. PowerPoint was discovered to contain a total of four PowerPoints, with PowerPoint being utilized as supplemental resources created by teachers.These findings show that the microlearning contained in two books published by private and government publishers, as well as additional teaching materials created by teachers, used the Merdeka Belajar curriculum. According to the analysis, the microlearning aspects in each unit are not fully met. Even though many media, such as audio and video, have been discovered in a short period of time, there are still some aspects that have not been addressed.In addition, the interview findings are discussed in this section to help with the document analysis. The teachers being interviewed is in charge of teaching English tenth graders. The description of the teacher interview is provided in Table 2 and is broken down into three themes: The existing learning material, additional learning materials, microlearning-based learning materials.

Table 2. Result of interview

Theme	Answers
The existing learning material	The books used are books published by the government and privately published books such as Erlangga which has implemented the Kurikulum Merdeka Belajar.
Additional learning material	The teacher completes the material with several media such as video, audio taken from several sources such as YouTube, Google, and links from trusted sources. The teacher also makes PowerPoint and PDF slides whose contents are taken from various sources.
Microlearning-based learning material	Microlearning-based materials have the potential to address the easily distracted needs of today's students.

When the participants were asked about can microlearning be applied in writing, the majority commented that microlearning must be applied because today's children are more easily distracted and microlearning is also a become stimulus and teaching resource. These results show that teaching materials because of interviews with 3 teachers turned out to be student handbooks and additional teaching materials from reliable sources such as YouTube, Google, PowerPoint, infographics. The teachers explained that media such as PDF, video and relevant links are widely used as a stimulus to guide students to write various types of texts and also to make them more effective. Learning material is presented briefly with the most common duration of 7 minutes, for PowerPoint and audio with a duration that is not too long and varied.

Additionally, material can be accessed anywhere and anytime through applications such as kahoot, zoom and PowerPoint or videos from YouTube. And finally, the learning materials should be in accordance with the themes of youth life and have a short duration.

IV.   CONCLUSION

After analyzing existing learning materials and conducting teacher interviews, the learning object materials from two coursebooks and additional learning materials are found such as four sets of PowerPoint, three videos, six audio files, and one PDF. But the appropriate writing English learning material for the student guide remains lacking, teachers claim that because students have a short attention span when learning, it is difficult for them to understand the material because it is time-consuming and there is no learning medium that meets students' current needs.Therefore, the learning material's content that fits the microlearning standards is not adequately incorporated into the existing writing English learning material. So, this is a compelling argument for researcher to develop learning materials for writing English that are infused with microlearning aspects. Ultimately, students' English language skills must meet the CEFR standard level B1 for the tenth grade.

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