Analysis of Learning Projects in the Implementation of the Kurikulum Merdeka in Elementary Schools

Vivi Darmayanti[1], Naomi Dias Laksita Dewi[2], Moh. Badrus Sholeh Arif [3]

[1,2,3] Universitas Jember, Indonesia

✉ vividarmayanti.fkip@unej.ac.id

ABSTRACT

The Kurikulum Merdeka allows teachers to design educational and enjoyable learning experiences, with project-based learning being one of its most engaging and meaningful methods. This study aims to explore the types of projects commonly implemented by elementary school teachers under the Kurikulum Merdeka. Data were collected through questionnaires distributed to 20 elementary school teachers. The data were analyzed using a quantitative descriptive approach in the form of percentages. The findings reveal that the most frequently used project types are posters (45%), followed by interviews (20%), practicums (10%), concept maps (10%), and other activities such as making maps, performances, and comics (each at 5%).

INTRODUCTION

Learning in the Kurikulum Merdeka framework emphasizes a holistic approach that integrates academic knowledge with practical skills. It encourages students to take ownership of their learning experiences by fostering independent learning, critical thinking, and creativity (Rizki & Fahkrunisa, 2022; Abidin & Malisa, 2023). This curriculum supports a shift away from the traditional teacher-centered model to a more student-centered approach, where collaboration, exploration, and innovation are key components (Aninda et al., 2020; Tang, 2023; Kerimbayev et al., 2023). In this context, the role of technology becomes paramount, as teachers and students are encouraged to leverage digital tools to access a diverse array of learning resources. Additionally, the flexibility of the Kurikulum Merdeka allows learning to take place both inside and outside the classroom, empowering students to engage with real-world contexts and experiences. This approach not only enhances the variety of learning methods but also nurtures essential skills such as problem-solving, collaboration, and adaptability, which are crucial in the global and digital era (Adipat et al., 2021; Fadhli, 2023; Alam & Mohanty, 2023). Teachers act as facilitators, guiding students in the exploration of subjects and encouraging discussions that promote deeper understanding and knowledge sharing (Indarta et al., 2022). In essence, Kurikulum Merdeka is designed to equip students with the competencies needed to thrive in a rapidly changing world.

The Kurikulum Merdeka with the concept of independent learning in elementary schools provides freedom for teachers and school principals to compile, develop, and implement a curriculum based on the potential and needs of students and schools. Freedom to learn gives teachers the freedom to organize learning that emphasizes essential material by considering characteristics so that learning outcomes will be achieved that are more meaningful, enjoyable, and in-depth (Rahmadayanti & Hartoyo, 2022). The advantage of the Kurikulum Merdeka is that it focuses on essential material and develops student's abilities in each phase so students can learn more deeply, meaningfully and have fun, without being rushed (Kementerian & Kebudayaan, 2022). The Kurikulum Merdeka introduces new concepts (Indarta et al., 2022). Kurikulum Merdeka also gives students, teachers, and schools

more freedom in choosing learning. Teacher creativity greatly influences learning activities in the Kurikulum Merdeka. Relevant and interactive learning can be done with project activities.

Project-based learning is an important concept in implementing the Kurikulum Merdeka. Project activity requires learners to work together to find solutions to authentic problems in the process of knowledge integration, application, and construction (Guo et al., 2020). Learning through project activities is learning that places students as active learning subjects, providing the opportunity to apply what is learned, and the opportunity to present or communicate and evaluate the results of their learning. The characteristic of project learning is producing a product, for example, items or services (Santoso, 2022). Project-based learning focuses students on real-life experiences to enrich their learning experience. Students will make observations to produce products or real work that will later be communicated and responded to. Students are also encouraged to develop creativity, independence, responsibility, self-confidence, and critical (Mascita et al., 2020).

Project-based learning can be conducted individually or in groups to produce a tangible product. The topics chosen should be specific, interesting, and contextual to engage students and encourage active participation. Selecting the right project topics motivates students to be creative, responsible, and diligent in completing their tasks. This method also promotes collaboration and provides meaningful learning experiences (Amelia & Aisya, 2021). By applying concepts learned in class to real-world projects, students become more active and skilled in designing and implementing their knowledge. Research shows that project-based learning, such as using poetry, enhances student engagement and learning outcomes (Lestari, 2019). Additionally, it helps students develop problem-solving skills (Norhikmah et al., 2022). In the context of Kurikulum Merdeka, project-based learning in elementary schools can take various forms, allowing students to tackle challenges and create products (Almulla, 2020). The selection of projects should align with learning objectives, time allocation, and teacher skills, making it crucial to analyze which types of projects are most effective for classroom implementation.

RESEARCH METHODS

The research method used in this study is descriptive research, specifically the survey research type. The objective of survey research is to gather information on opinions, views, assessments, attitudes, and behaviors toward a particular phenomenon (Ramdhan, 2021). This study draws samples from a population of elementary teachers and employs a questionnaire as the primary tool for collecting data (Singarimbun & Effendi, 1991). The questionnaire used in this research consists of closed-ended questions, where the possible responses have been predetermined by the researcher (Agung & Yustesi, 2019). The research was conducted in September 2023, targeting 20 elementary school teachers who have implemented the Kurikulum Merdeka in their teaching practices. The data collection process was carried out through direct distribution of questionnaires, ensuring that respondents provided their answers based on their practical experiences with the curriculum.

The analysis will be conducted using descriptive and quantitative approaches. The descriptive analysis will summarize and interpret the data to provide an overview of the trends and patterns found in the responses. The quantitative analysis, presented in the form of percentages and charts, will be used to measure the frequency and distribution of the responses regarding the types of projects frequently employed in the implementation of the Kurikulum Merdeka. This approach allows for an in-depth understanding of how teachers perceive and utilize project-based learning within the framework of the Kurikulum Merdeka. The research data will be analyzed descriptively and quantitatively.

$$P = \frac{f}{N} x \ 100\%$$

Description:
P   = percentage
f   = frequency
N   = number of respondents (Fadilla et al., 2021)

This method, as outlined by Fadilla et al. (2021), allows for an easy-to-understand representation of the data, showing the proportion of respondents who favor or use certain types of projects. By applying this formula, the research will present the distribution of responses in a clear and quantifiable manner.

RESULTS and DISCUSSION

he following data represents the results of a questionnaire that explored the types of projects commonly used by elementary school teachers when implementing the Kurikulum Merdeka. The findings highlight the diverse teaching strategies employed to enhance student learning and engagement through project-based activities. These projects are designed to encourage creativity, critical thinking, and hands-on learning, in line with the goals of the Kurikulum Merdeka. By incorporating a variety of project types, teachers aim to provide students with meaningful learning experiences that not only reinforce academic concepts but also foster essential skills such as collaboration, communication, and problem-solving.

The projects listed in the questionnaire reflect a wide range of approaches, from visual presentations like posters and concept maps to more interactive and practical activities such as interviews, performances, and practicums. This variety allows teachers to adapt their methods to different learning styles, making the educational process more dynamic and student-centered. The flexibility provided by the Kurikulum Merdeka enables teachers to choose project types that best suit the subject matter and the needs of their students, contributing to a more effective and enjoyable learning environment.

Table 1. Results of Completing the Project Type Questionnaire in Implementation of the Kurikulum Merdeka in Elementary Schools

No	The Type of Project	Frequency	Percentage
1.	Maps	1	5%
2.	Practicum	2	10%
3.	Performances	1	5%
4.	Comics	1	5%
5.	Concept maps	2	10%
6.	Interview	4	20%
7.	Poster	9	45%

Based on the questionnaire results, the types of learning projects most commonly used by teachers in implementing the Kurikulum Merdeka show a varied distribution. Among these projects, creating posters emerged as the most frequently used method, accounting for 45% of the total. This high percentage suggests that posters are considered an effective tool by teachers, likely due to their ability to visually present information in a creative and engaging way, which enhances student understanding and participation. Interviews are the second most common project type, making up 20%. This indicates that teachers often incorporate real-world interactions, allowing students to develop critical communication and inquiry skills. Practicums and concept maps are used by 10% of teachers each, reflecting their importance in hands-on learning and helping students organize and conceptualize information clearly. Less frequently used project types include making maps, performances, and comics, each representing 5%. Although these activities are not as common, they still offer unique opportunities for students to engage creatively and develop diverse skills, such as geographic understanding through map-making, expressive abilities in performances, and storytelling through comics. This variety of project types highlights the flexibility of the Kurikulum Merdeka in accommodating different learning styles and objectives.

Discussion of Findings

Maps Project Type

Based on the results of the questionnaire, it was found that 5% of elementary school teachers implementing the Kurikulum Merdeka frequently use map-making projects in their teaching. Map-making offers a valuable educational tool as it provides a visual representation of geographical areas,

showing part or all of the Earth's surface in a scaled format (Basyari et al., 2022). This activity allows students to engage with spatial concepts, helping them understand the physical relationships between locations. Maps are not only a way to represent places, but they also provide vital information on topics such as climate change, biodiversity, and geographical conditions of specific regions (Griffin, 2020). By working on map-related projects, students gain a deeper understanding of how geography affects the world around them, from environmental factors to human interactions with the landscape.

One of the key advantages of making maps for students is the development of practical skills such as scale calculation and precision in drawing. This process enhances their mathematical abilities as they work with measurements, distances, and ratios to create accurate representations. Moreover, creating maps fosters critical thinking and problem-solving, as students must carefully analyze geographical data and determine how to present it effectively. These skills are crucial for students, as they not only contribute to their academic growth but also prepare them for more complex spatial reasoning tasks in the future. In summary, although only 5% of teachers utilize map-making as a project, its educational value lies in developing students' technical and analytical skills, while also helping them better understand geographical concepts and real-world issues.

Practical Project Type

Based on the results of filling out the questionnaire, the percentage of practicum projects is 10%. Practicum is an activity that aims to train and develop basic skills in using tools and materials, measuring, and observing (Arini & Darmayanti, 2022). Practicums can be carried out inside or outside the laboratory. This activity is preceded by a problem or a question. Things that need to be considered in practicum activities are explaining the purpose of the practicum, explaining tools and materials measurements, explaining the stages of the activity, explaining what needs to be observed, and making conclusions (Sapriati et al., 2008). Practical projects can improve science process skills such as asking questions, predicting, observing, clarifying, planning experiments, using tools and materials, applying concepts, interpreting, and communicating (Kristianto & Rahayu, 2020). This is supported by research results which state that the practicum method can increase understanding of concepts (Demulawa et al., 2022). Practicums are also able to improve student's process skills (Dewi & Firman, 2023).

Practicums can be carried out individually or in groups. Practicums can develop experiment skills, thinking skills, and scientific work. The practicums must be prepared carefully so that the practicums can run smoothly. An obstacle to practicum activities is the practicum kits are incomplete or not available. Teachers must be creative in finding alternatives to replace practical equipment with other objects that have the same function so that practical activities can be carried out. The estimated practicum time cannot be determined with certainty because in reality the practicum is not immediately successful so sometimes it needs to be repeated. After carrying out the practicum, students are required to write an analysis report on the results of the practicum and make conclusions.

Performance Project Type

Based on the questionnaire results, 10% of elementary school teachers implementing the Kurikulum Merdeka frequently use performance-based projects, such as drama, singing, and dancing. Performance projects play a significant role in enhancing students' learning experiences by offering a creative outlet for artistic expression. As a form of communication, performances allow students to convey messages, emotions, and stories, and they serve as an important tool in understanding and interpreting various social and cultural phenomena (Purnomo & Subari, 2019). Performances serve multiple functions: they can be a medium for relaxation and entertainment, a platform for self-expression, and a means for education and social integration. Additionally, performances can serve as a way to convey messages or promote values, such as cooperation, unity, and responsibility (Yuniastuti et al., 2020). In the context of the Kurikulum Merdeka, performance projects may take the form of artistic performances that incorporate elements of dance, drama, or music (Fajrianti & Imtihan, 2019). The type of performance selected is typically aligned with the specific learning objectives set by the teacher.

One of the key benefits of performance-based learning is its ability to enhance students' creativity. Whether through choreography, singing, or dancing, students are encouraged to explore new ways of expressing themselves. However, performance projects often require more time for practice and preparation, as students must develop both technical and creative skills to execute the performance successfully. Research by Ramadani et al. (2022) supports the effectiveness of performance-based project learning, showing that it not only improves students' creativity but also fosters key values such as teamwork, responsibility, and appreciation for the efforts of others. Through collaborative performance projects, students learn to work together, take responsibility for their roles, and value the contributions of their peers, ultimately leading to a more holistic development of both their academic and interpersonal skills. Thus, while performance projects may require more time and effort, their educational and developmental benefits make them a valuable tool in the Kurikulum Merdeka.

Comic Project Type

Based on the questionnaire results, it was found that 5% of teachers frequently use comic projects in the implementation of the Kurikulum Merdeka. Comics, as a medium, consist of a series of images that tell a story, often characterized by cartoons designed to capture the reader's interest through engaging visuals and narrative elements. This format helps develop students' visual imagination, allowing them to interpret stories and concepts through imagery, which enhances their creative and cognitive skills (Kristianto et al., 2020). Comics serve as an effective learning tool, offering a creative way to introduce complex topics or concepts in a more accessible and enjoyable manner. They not only support teaching but also encourage students to explore their own creativity by designing and narrating their own comic stories. By incorporating comic projects into learning, students are able to exercise their imagination and visual storytelling skills, which can improve comprehension and retention of the material (Darmayanti & Abadi, 2021).

Comics can function as a valuable learning resource, particularly in interactive learning environments. They allow for a two-way process where teachers can use comics as teaching aids, and students can create comics as part of their learning activities. This interactive element makes comics an effective tool for engagement and participation in the classroom (Nafala, 2022). Moreover, with advancements in technology, comics are no longer limited to traditional book formats. They are now available in electronic forms, which makes them more accessible to students in a digital learning environment (Utami et al., 2022). In summary, though comics are used by a smaller percentage of teachers, their potential as a learning medium is significant. Comics help to bridge visual and textual learning, fostering creativity, enhancing student engagement, and providing an interactive platform for learning in both traditional and digital formats.

Comics can provide a more concrete and realistic picture to readers, comics combine a series of images with textual information. Comics can influence the psychological and cognitive aspects of readers because they can evoke sensory and emotional responses in readers (Putri, 2023). Comics help convey material directly or indirectly to readers through visual media in an interesting way. This is supported by research results, namely that the use of comic media can improve student's reading abilities (Muhaimin et al., 2023). Learning with comic media can foster enthusiasm and be effective in learning (Senjaya et al., 2022). Comic-based learning can also increase scientific literacy (Filjinan et al., 2022). Learning with projects in the form of comics is expected to increase children's creativity in imagining and expressing the concepts they have learned in the form of a series of illustrated stories. Even though the project activity of making comics requires a lot of time and special talent, comics are expected to attract reader's attention and help readers understand the concept.

Concept Maps Project Type

Based on the results of filling out the questionnaire, the percentage of concept map projects is 10%. A concept map is a concept depicted graphically that is connected to other concepts to simplify student's thinking structures (Putra et al., 2019). Concept maps can also be interpreted as mapping and linking an understanding of certain concepts or problems depicted on paper (Irfadila, 2020). Concept maps are a medium that can help students to note down, and record important concepts

related to the material being studied (Saridewi et al., 2023). Students will more easily understand the learning material, students will find it easier to learn and remember a concept, students will better understand the systematics and outline of the material and sub-material, students will find it easier and more understand in learning (Rahmawati, 2019).

In concept maps, students do not get bored quickly because the writing method is effective and efficient and students are free to be creative (Khasanah, 2019). Concept maps provide a graphical summary of concepts, making it easier for students to understand a concept (Tarmidzi, 2018). This is supported by research results which state that concept maps can guide students in understanding concepts (Setiawan & Syaifuddin, 2020). The use of concept maps can also improve student learning outcomes (Astuti et al., 2022). Students can understand a concept easily and quickly without having to read the concept which is usually written on several pages. Learning with projects in the form of making concept maps is expected to improve children's ability to simplify and express the concepts they have learned in graphic form.

Interview Project Type

Based on the questionnaire results, 20% of teachers frequently use interview-based projects in the implementation of the Kurikulum Merdeka. An interview is a direct communication process between an interviewer and a respondent, aimed at gathering information and data through structured or semi-structured conversations (Harahap, 2019). One of the key advantages of interviews is the immediacy with which responses can be obtained. The interviewer can clarify the meaning of questions, ensuring that both parties fully understand the content, thus minimizing misunderstandings and allowing for a more flexible and dynamic data collection process compared to standardized tests (Fadhallah, 2020). The results of interview-based learning activities typically provide an in-depth exploration of topics, as students can probe into the details and gather comprehensive explanations from their interviewees (Hansen, 2020). A crucial aspect of successful interview-based learning is the role of the interviewer. The interviewer must possess essential skills such as active listening, the ability to formulate clear questions, and the ability to maintain a neutral and friendly approach towards respondents (Agung & Yustesi, 2019). These skills are particularly important in ensuring that the collected information is accurate and that the interview process is both respectful and effective.

Interview projects in the classroom offer multiple benefits. They allow students to ask direct questions about the topics they are studying, which helps them gather relevant information more effectively than through other methods. Additionally, interviews reduce the likelihood of miscommunication, as students can immediately clarify any points of confusion with the respondent. Moreover, these projects help improve students' communication and public speaking skills. By conducting interviews, students learn how to ask questions clearly and use standard, comprehensible language, which enhances their ability to convey ideas effectively to others. However, interview projects also come with certain challenges. One significant limitation is that interviews cannot be conducted at any time; they must be scheduled according to the availability of the interviewees. This requires careful planning and coordination, which can limit the flexibility of the project. Despite this, the educational value of interview projects remains high, as they promote critical thinking, enhance communication skills, and provide students with firsthand information that can deepen their understanding of the subject matter.

Poster Project Type

Based on the results of filling out the questionnaire, the percentage of poster projects is 45%. Posters are media in the form of writing, images, or a combination of both to provide information to the audience (Fatah, 2023; Sitompul et al., 2021). Posters are an intermediary medium for conveying messages both generally and specifically in learning (Chairunnisa & Sundi, 2021). Posters can improve students' design and visual skills (Heriyanto, 2023). Posters can help student's capture the meaning or material of the poster (Nurfadillah et al., 2021). Making posters can train student's cooperation and creativity through drawings. Students will be more interested in studying the material because the material is presented in more attractive visual media.

Based on the results of the data analysis above, there are various types of projects used by elementary school teachers in implementing the Kurikulum Merdeka. The type of project that is most often used is making posters. The purpose of elementary school learning is to develop children's intelligence and personality through systematic guidance (Nurdianasari et al., 2023). Learning that can support this is a learning project. The selection of the type of learning project must be based on the learning objectives, type of material, time allocation, and student characteristics. Projects help develop student's creativity, independence, and responsibility (Lapase, 2021; Santoso, 2022). Project-based learning encourages students to produce real products both individually and collaboratively as a result of a combination of knowledge and process skills (Iswantari, 2021). Project-based learning encourages students to be active, creative, think critically, and be confident (Azizah & Widjajanti, 2019). Students are encouraged to actively seek, process, construct, and use knowledge (Jusita, 2019).

Project activities can provide a more enjoyable and meaningful learning experience for students and increase collaboration between students in problem-solving (Mascita et al., 2020). The advantages of project-based learning are developing student's learning capacity and thinking skills, helping students gain experience in organizing projects, allocating time, managing materials, and creating fun learning activities (Amelia & Aisya, 2021). Students are more active and creative, develop self-confidence, and have a high sense of responsibility. The disadvantages of project-based learning are that it requires more time to solve problems and produce products, and requires complete facilities, equipment, and materials (Sari et al., 2021; Arizona et al., 2020).

CONCLUSIONS

Based on the research results, it can be concluded that there are various types of learning projects used by elementary school teachers in implementing the Kurikulum Merdeka. The type of learning project that is most often used is making posters. The types of learning projects that are little used are making maps, performances, and making comics. Determining the type of learning project used by elementary school teachers is based on learning objectives, type of material, time allocation, and student characteristics. Teachers should always try to improve their knowledge and skills in implementing various types of learning projects by reading from various sources, conducting research, and attending seminars or training. Teachers are also expected to practice using learning projects more often so that learning activities are more effective, varied, and meaningful.

This research enhances the theoretical understanding of Kurikulum Merdeka by highlighting the most commonly used learning projects in elementary schools, with poster-making being the most frequent and projects like map-making, performances, and comics less applied. The findings support constructivist learning theory, emphasizing the value of varied, hands-on learning experiences for deeper student understanding. Practically, teachers are encouraged to diversify their project use, improve their skills through practice, and seek further knowledge via seminars and research. By doing so, they can create more effective, engaging, and meaningful learning experiences that benefit student growth and engagement.

For future research, it is recommended to explore the effectiveness of different project types in enhancing specific student skills, such as critical thinking, creativity, or problem-solving, within the framework of the Kurikulum Merdeka. Additionally, comparative studies across different educational levels, such as between elementary, middle, and high schools, could provide insights into how project-based learning impacts students at various stages of development. Further research could also examine the challenges and barriers faced by teachers in implementing less commonly used project types, such as performances and comics, and propose strategies to overcome them. Finally, investigating the role of technology in project-based learning, especially with digital tools, could offer valuable insights into modernizing teaching practices and expanding the reach of project-based approaches.

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ACKNOWLEDGEMENT

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