

## **Implementation of the Development of Islamic Religious Education Teaching Materials Based on Project Based Learning to Strengthen Religious Moderation in Students at SDN Pager 02 Purwosari**

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**Abstract:** This study aims to develop Islamic Religious Education (PAI) teaching materials based on Project Based Learning (PjBL) for third-grade students at SDN Pager 02 Purwosari as an effort to enhance learning engagement and instill values of religious moderation from an early age. Addressing the issues of low student participation in project-based learning and the limited availability of digital learning resources, the teaching materials were developed using the ADDIE model by integrating interactive media, staged project tasks, and contextual approaches suited to students' cognitive development. Expert validation showed the materials were feasible for use, and classroom implementation demonstrated improvements in student activity, creativity, and understanding of religious and social values. Therefore, PjBL-based teaching materials are not only effective in supporting academic achievement but also in shaping students' character to be more tolerant, collaborative, and independent.

**Keywords:** Project Based Learning; Islamic Religious Education; Religious Moderation.

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**Abstrak:** Penelitian ini bertujuan untuk mengembangkan bahan ajar Pendidikan Agama Islam (PAI) berbasis Project Based Learning (PjBL) bagi peserta didik kelas III SDN Pager 02 Purwosari sebagai upaya meningkatkan keterlibatan belajar dan menanamkan nilai-nilai moderasi beragama sejak dini. Berangkat dari permasalahan rendahnya partisipasi siswa dalam pembelajaran berbasis proyek serta terbatasnya sumber belajar digital yang tersedia, bahan ajar dikembangkan menggunakan model ADDIE dengan mengintegrasikan media interaktif, tugas

proyek bertahap, dan pendekatan kontekstual yang sesuai dengan tahap perkembangan kognitif siswa. Hasil validasi ahli menunjukkan bahwa bahan ajar layak digunakan, dan implementasi di kelas membuktikan peningkatan dalam aspek keaktifan, kreativitas, serta pemahaman siswa terhadap nilai-nilai keagamaan dan sosial. Dengan demikian, bahan ajar berbasis PjBL tidak hanya efektif dalam mendukung pencapaian akademik, tetapi juga membentuk karakter peserta didik yang toleran, kolaboratif, dan mandiri.

**Kata Kunci:** Project Based Learning; Pendidikan Agama Islam; Moderasi Beragama.

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## A. Introduction

Islamic Religious Education (PAI) is an integral component in the national education system which has a strategic role in shaping the character, morals and spirituality of students (Judrah et al., 2024). PAI not only functions as a means of conveying religious knowledge, but also as an important instrument in the formation of a complete and balanced personality between cognitive, affective and psychomotor aspects. Through PAI learning, students are expected to be able to understand, internalize and practice Islamic teachings in daily life consistently and responsibly.

In the context of formal education, PAI is directed at developing students' religious competence, forming a moderate attitude in religion, and building a personality that is in accordance with the noble values of Islamic teachings (Junita et al., 2023). This goal is very relevant in responding to the challenges of the globalization era which is characterized by advances in science and technology, as well as complex social changes. Therefore, PAI must be able to become a spiritual and moral foundation for students in facing the increasingly competitive and diverse dynamics of modern life.

However, in practice, PAI learning still faces various challenges, especially in terms of the approaches and methods used. Conventional methods that are one-way and teacher-centered tend to limit students' active participation, resulting in low learning motivation and student involvement in the learning process. This condition indicates that PAI learning is not yet fully able to respond to the needs and characteristics of 21st century students who are more critical, collaborative and familiar with technology.

In fact, religious education has a fundamental role in forming noble morals as a manifestation of strong aqidah and faith. The formation of morals is not enough just through the transfer of knowledge, but requires a holistic, contextual and real experience-oriented approach (Iqbal et al., 2024). This suggests the importance of innovation in PAI learning, both in terms of methodology and the media used, in order to be able to create a learning process that is meaningful, participatory and relevant to the lives of students.

As a response to these challenges, it is necessary to develop PAI teaching materials that are adaptive to technological developments and the needs of today's students. The project-based learning approach (Project Based Learning) is an alternative that can be integrated in the development of teaching materials, because it encourages students to be active, think critically, and be able to relate learning materials to real life contexts (Rajagukguk & Weisdiyanti, 2023). Thus, innovation in PAI teaching materials will not only improve the quality of the learning process, but also strengthen the comprehensive internalization of Islamic values in students.

The project-based learning model (Project Based Learning) is an innovative approach that places students as active subjects in the learning process (Farikhatin et al., 2024). This model is designed to train and develop contextual problem solving abilities, oriented towards real problems that are relevant and credible in students' lives. Through direct involvement in learning projects, students are encouraged to explore, analyze, and develop solutions to the problems they face, thereby indirectly stimulating critical, analytical, and creative thinking abilities which are part of Higher Order Thinking Skills.

In order for project-based learning to run optimally, a learning environment is needed that is conducive and supports deep thinking processes. According to Wiwin Fachrudin Yusuf, the learning atmosphere must be kept open, democratic, full of negotiation, comfortable and enjoyable. An atmosphere like this will encourage students to dare to express ideas, work together, and be actively involved in the learning process (Dewi, R. V. K., Sunarsi, D., MM, C., & Khoiri, 2021). Apart from that, the teacher acts as a facilitator who directs, guides and provides space for students to take the initiative

and be responsible for the projects they are working on.

Furthermore, the project-based learning model provides great opportunities for teachers to manage classes more dynamically. Designed project activities can involve various cross-subject competencies, and encourage students to develop 21st century skills, such as collaboration, communication, and the use of digital technology. Therefore, the application of this model is very relevant in efforts to improve the quality of Islamic Religious Education learning, especially in bridging the gap between teaching material and the reality of students' lives.

According to Clegg and Berch, implementing the Project Based Learning model can significantly increase students' creativity and motivation. This model is seen as a form of activity-based learning approach that is contextual and open-ended, where students are given space to explore various alternative solutions to a real problem faced. (Fauzah, 2021). In this way, project work does not just become an additional activity, but rather an integral part of the learning process that emphasizes collaborative problem solving over a certain period of time.

This learning model requires students to be actively involved, both individually and in groups, in designing, implementing and reflecting on the results of the projects they work on. This process allows students to develop various important skills, such as critical thinking, creativity, communication skills, as well as time management and responsibility skills (Septianingsih et al., 2024). This is in line with the demands of 21st century learning which does not only focus on mastering material, but also on character building and strengthening soft skills.

Thus, the project work approach to learning not only improves conceptual understanding, but also provides an authentic and meaningful learning experience. In the context of Islamic Religious Education, the integration of this model can be an effective strategy for instilling Islamic values contextually, while increasing student motivation and involvement in the learning process (Junita et al., 2023).

Based on the results of interviews and observations conducted by researchers at SD Negeri Pager 2 Purwosari, it was found that teachers experienced various difficulties in implementing the Project Based Learning (PjBL) learning model in the Independent

Curriculum material for Building a Civilized Society. This difficulty does not only occur at one or two stages, but occurs throughout the entire PjBL syntax. This includes the project planning stages, project implementation, and evaluation of students' work results. Teachers feel they do not have a deep understanding regarding the ideal implementation of PjBL syntax according to the context and characteristics of students in elementary schools.

Factors causing these difficulties include limited special training regarding the implementation of PjBL in the context of the Independent Curriculum, lack of availability of contextual and supportive teaching materials, and limited time and resources in designing and facilitating meaningful projects. Apart from that, some teachers also admitted that they were not used to learning approaches that were student-centered and based on collaborative activities. As a result, the learning process has not been able to achieve the goals of character formation and strengthening Islamic values as stated in the Independent Curriculum through Islamic Religious Education learning.

Apart from obstacles from the teacher's side, problems were also found on the students' side. Observation results show that students tend to be less active in participating in the project-based learning process. This can be seen from the low level of understanding of the project tasks given. Most students have not shown the initiative to explore further information independently, either through additional reference books or other learning sources relevant to the project topic. When they experience difficulties, they tend to immediately ask the teacher without first trying to find a solution independently. This shows that students' learning awareness and information literacy skills are still low.

Furthermore, the learning resources used by students are still limited to available textbooks and teacher presentation materials, such as PowerPoint containing images or videos. In fact, the school has provided learning support facilities such as a computer laboratory and library. Unfortunately, these facilities have not been utilized optimally as a means to support the exploration and information search process in project implementation. This lack of use of school facilities shows that students' abilities in accessing, evaluating and using information still need to be improved so that project-

based learning objectives can be achieved optimally.

Based on the results of interviews conducted by researchers, there are a number of strategic efforts that can be made to overcome teachers' difficulties in implementing the Project Based Learning (PjBL) learning model in the Independent Curriculum material for Building a Civilized Society, especially in implementing the overall learning syntax. Teachers as learning facilitators are required to be more adaptive and innovative in creating a meaningful and enjoyable learning atmosphere. One step that can be taken is to create learning media that is varied, interesting, and appropriate to the context of students' lives. Teachers also need to actively seek out the latest information and utilize available facilities, such as internet networks, to enrich material and increase the attractiveness of learning.

Furthermore, so that PjBL learning runs effectively, teachers need to intersperse learning activities with relevant ice breakers to maintain students' enthusiasm and concentration. Consistent mentoring is also an important key, where teachers play a role in reminding and directing students to remain focused on completing projects. Apart from that, teachers' understanding of the conditions and characteristics of each student is very important to create the right approach and suit individual needs.

No less important, increasing communication and collaboration between teachers, parents and the school is a significant supporting factor in creating a supportive learning ecosystem. Teachers also need to build an open learning climate, namely by accepting and respecting students' ideas and opinions. This open attitude is believed to be able to foster a high sense of self-confidence and curiosity in students, which will ultimately have a positive impact on their involvement in the project-based learning process.

A number of previous studies have examined the effectiveness of the Project Based Learning (PjBL) model and the use of digital teaching materials in improving the quality of learning in various subjects. However, studies that specifically highlight the need to develop PjBL-based digital teaching materials in the context of Islamic Religious Education (PAI) are still relatively limited. This shows that there is a significant and relevant research gap for further study, considering that PAI has different characteristics compared to other subjects.

PAI does not only emphasize mastery of cognitive aspects, but also includes affective and psychomotor aspects which are directly related to the formation of students' attitudes, values and religious behavior. Therefore, developing PAI teaching materials requires a holistic and integrative approach, which is able to accommodate these three domains in a balanced manner. PjBL as a contextual learning approach is considered to have potential in bridging these needs, especially when collaborated with the use of digital technology which can enrich students' learning experiences.

The limitations of PjBL-based digital teaching materials in the PAI domain are both a challenge and an opportunity to innovate in developing learning tools that are relevant, adaptive and in line with current developments. By considering the complex characteristics of PAI material and the needs of students who are increasingly familiar with technology, the development of PjBL-based digital teaching materials can be a strategic solution to increase the effectiveness and attractiveness of Islamic Religious Education learning in elementary schools.

These findings indicate that teaching staff are required to be more innovative and creative in building and developing teaching materials that are relevant to the needs of the times. In the context of implementing the Independent Learning Curriculum, educators are expected to not only deliver material conventionally, but also be able to digitize teaching materials and organize them with a contextual and student-centered approach. This approach is important to support learning that is flexible, adaptive, and appropriate to the characteristics of the digital generation.

However, based on the results of the initial assessment, it is known that only around 50% of class III students have access to digital learning resources, even though learning uses the Merdeka Curriculum. This condition shows that there is a gap in the availability and utilization of technology-based learning resources, which has the potential to hamper the optimization of project-based learning and the comprehensive use of digital teaching materials. Thus, efforts are needed to develop digital teaching materials that are not only easy to access and use by students, but are also able to accommodate diverse learning needs in the elementary school environment.

This research focuses on analyzing the needs of teachers and students for digital



teaching materials in the context of Islamic Religious Education (PAI) learning in elementary schools. Specifically, this research is aimed at class III students at SDN Pager 02 Purwosari who have implemented the Independent Curriculum in their learning process. The main focus of this research is identifying and analyzing the need for the development of digital teaching materials that are integrated with project-based learning (PjBL) models.

The aim of this research is to provide an empirical basis for designing digital teaching materials that are not only pedagogically relevant, but also adaptive to developments in educational technology. By understanding the real needs in the field, both from the side of educators and students, it is hoped that the development of PjBL-based digital teaching materials can be designed appropriately to support more active, collaborative and meaningful learning.

Furthermore, it is hoped that the results of this research can become practical guidelines for teachers in designing and using digital teaching materials that are able to increase learning motivation, student involvement in learning, and achievement of competency in PAI subjects. Therefore, this research has high urgency as a contribution to the development of innovative learning resources in the Independent Curriculum era.

## **B. Methods**

In this research, the type of research used is Development Research or (Research and Development). Research and development is research used to formulate, improve, develop, produce certain products, and test the effectiveness of these products (Okpatrioka, 2023). Researchers used a qualitative approach with the Research and Development (R&D) method. This method was chosen because it allows the development of teaching materials that suit the needs of students and teachers in PAI learning.

Meanwhile, for Research and Development Procedures, researchers refer to the research and development design developed by Robert Martie Branch. The ADDIE model is an abbreviation for Analysis, Design, Development or Production, Implementation or Delivery and Evaluations (ZULFARMANSYAH, 2023).



Development model according to (Ibrahim Maulana Syahid et al., 2024) applied in this research is the ADDIE model, which consists of five main stages:

- a. **Analysis** At this stage a needs analysis is carried out to understand the current conditions of PAI learning at SDN Pager 02 Purwosari. Analysis was carried out using teacher interviews, classroom observations, and literature studies regarding religious moderation and Project Based Learning.
- b. **Design** Based on the results of the analysis, PjBL-based teaching materials are designed taking into account the values of religious moderation. Design includes preparing learning objectives, learning strategies, as well as project materials and activities that can actively involve students.
- c. **Development:** At this stage the teaching materials that have been designed begin to be developed into concrete form, such as modules or learning guides. The teaching materials are then validated by Islamic education experts and learning media experts to ensure suitability of content and format.
- d. **Implementation:** After being validated, the teaching materials are tested in class involving students at SDN Pager 02 Purwosari. The teacher plays a role in applying the teaching materials in learning activities, while the researcher observes the learning process and collects data regarding the effectiveness of the teaching materials.
- e. **Evaluation:** This stage includes assessing the effectiveness of teaching materials based on the results of field trials. Evaluation is carried out by collecting input from teachers and students, as well as analyzing student learning outcomes in understanding the concept of religious moderation.

This research was located at SD Negeri Pager 2 Purwosari. The reason for choosing this location was because researchers found that there were obstacles faced in learning Islamic Religious Education. From the results of interviews, researchers found that there was still a lack of tolerance and a lack of understanding of the differences that exist in the social environment between one student and another, especially in class 3.

The data analysis technique used is qualitative descriptive analysis which aims to identify and analyze the need for developing digital teaching materials based on Project Based Learning (PjBL) in the context of Islamic Religious Education (PAI) (Junita et al., 2023). The collected data was analyzed by grouping the findings based on themes, then presented to gain a better understanding of the challenges, obstacles and solutions in developing digital teaching materials.

It is hoped that the results of this research can provide guidelines for the development of teaching materials that are more innovative and in line with current needs and can increase student motivation and involvement in the PAI learning process in elementary schools.

### **C. Results and Discussion**

#### **Implementation of the Development of Islamic Religious Education Teaching Materials Based on Project Based Learning**

Based on the results of research conducted at SDN Pager 02 Purwosari, the implementation of developing Islamic Religious Education (PAI) teaching materials based on Project Based Learning (PjBL) has gone through several stages in accordance with the ADDIE model. This stage includes needs analysis, teaching material design, development, implementation and evaluation.

##### **1. Needs Analysis**

From the results of observations and interviews with teachers, it is known that class III students are still less active in project-based learning (PjBL). Most students are not familiar with tasks that require independent exploration. They are more comfortable with conventional learning methods, such as lectures and instructive written assignments. This shows that project-based learning is still not a familiar part of their learning process.

Teachers also experience several obstacles in implementing PjBL syntax effectively. One of the main inhibiting factors is the lack of digital learning resources that can support the learning process. In the current digital era, the use of technology should be used to help students be more active in learning. However, limited access to

innovative learning resources means that the PjBL implementation process does not run optimally.

Apart from that, school facilities such as computers and libraries have not been utilized optimally. Many students only rely on textbooks and teacher presentations to understand the material. In fact, project-based learning requires broader exploration, both through searching for information from various sources and through direct experimentation. This limitation causes learning to be less dynamic and less interesting for students.

In cognitive development theory, grade III elementary school age children are at the concrete operational stage (Nuryati & Darsinah, 2021). At this stage, it is easier for them to understand concepts if they are given real examples that they can see and feel directly. Therefore, learning methods that are too abstract or based on theory are often less effective. Project-based learning actually has great potential in helping students understand the material better because it provides direct experience in solving problems (Mashudi, 2021).

However, implementing PjBL in class III still faces challenges in terms of student readiness. Because they are not used to learning patterns that require independence, many students still experience difficulties in designing and completing their own projects. They need more intensive guidance from teachers to be able to develop critical thinking and creativity in completing assignments. Therefore, more targeted assistance is needed so that students can adapt to this method gradually.

On the other hand, teachers also need support in developing more effective teaching strategies. The lack of adequate resources, both in the form of teaching materials and professional training, makes teachers face difficulties in implementing PjBL optimally. Apart from that, there is a need to improve teachers' skills in using technology as a learning tool so that this method can be applied more easily.

One solution that can be implemented is the development of teaching materials specifically designed to support project-based learning in Islamic Religious Education (PAI) subjects. These teaching materials must be able to provide clear guidelines for students to actively explore the material. Apart from that, teaching materials must also

be designed according to the level of cognitive development of students, so that they can help them understand PAI concepts more easily.

Islamic religious education has an important role in forming character and attitudes of religious moderation from an early age. With a project-based approach, students not only understand religious concepts theoretically, but can also apply them in everyday life (Dewi fina, 2024). For example, projects that involve social activities or working together in groups can help students understand the importance of tolerance, cooperation, and mutual respect in diversity.

In order for the implementation of PjBL in PAI learning to be more successful, there needs to be support from various parties, including schools, parents and the government. Schools can provide more adequate facilities, such as access to digital learning resources and comfortable study spaces. Parents also have an important role in encouraging children to be more active in studying. Meanwhile, government education policy can help encourage wider use of these methods through teacher training and supporting curriculum development.

By developing appropriate teaching materials and support from various parties, it is hoped that project-based learning can be implemented more effectively in class III. Apart from increasing students' activity and creativity, this method can also be a good means of instilling the values of religious moderation from an early age. In this way, students not only gain a deeper understanding of PAI, but also grow into individuals who are more tolerant, creative and independent in learning.

## 2. Teaching Material Design

Based on the needs analysis that has been carried out previously. In its design, teaching materials use a Project-Based Learning (PjBL) approach which focuses on collaboration and problem solving. This approach aims to enable students to learn actively, work together, and develop critical thinking skills through the projects they are given. The designed teaching materials have several main elements, namely:

### a. Interactive learning module

This module combines the concept of religious moderation in Islamic Religious Education (PAI) material. Thus, apart from understanding

religious teachings, students are also invited to apply the values of tolerance, mutual respect and diversity in everyday life.

b. Multimedia content

To make learning more interesting, teaching materials are equipped with various forms of media, such as text, images, videos and animations. This aims to help students understand the material more easily, because class III children learn more easily through interactive visual displays.

c. Phased project tasks

Project assignments are given in stages, according to the level of understanding of class III students. Some examples of designed project tasks include:

- 1) Make posters, to help students express their understanding in visual form.
- 2) Reflection video, so that students can express their understanding of the values of religious moderation.
- 3) Group projects, to increase cooperation between students and get them used to discussing and solving problems together.

d. Exploration-based Student Worksheets

The LKS prepared aims to encourage students to think critically and actively seek information from various sources. With this method, students not only receive information passively but are also invited to explore and find their own understanding of the material being studied.

The overall design of this teaching material aims to make learning more active, interesting and meaningful, as well as helping students understand PAI material more deeply through project-based learning experiences.

### 3. Development of Teaching Materials

The teaching materials development stage is an important step to ensure that the teaching materials that have been designed can be used effectively in the learning process. At this stage, teaching materials are developed in two forms, namely digital and print, so that they can be accessed by all students with various conditions of facilities

and infrastructure at the school. Digital teaching materials allow students to learn more flexibly by utilizing technology, while printed teaching materials are still needed as an alternative for students who have limited access to digital devices.

To ensure the quality of teaching materials, validation is carried out by experts, namely Islamic education experts and learning media experts. Islamic education experts are tasked with assessing the suitability of the material content with religious teachings and its relevance in forming attitudes of religious moderation in students. Meanwhile, learning media experts evaluate the design, appearance and delivery methods so that teaching materials can be more interesting and effective in conveying learning concepts.

The validation results show that overall this teaching material is quite suitable for use in the learning process. The material prepared meets curriculum standards and is appropriate to the level of cognitive development of class III students. However, there are several improvement notes provided by experts to further improve the quality of this teaching material. One of the main suggestions is to add interactive elements so that students are more motivated in learning and can more easily understand the material presented.

One of the revisions made is the addition of interactive quizzes to digital teaching materials. This quiz is designed so that students can evaluate their understanding after studying the material. With this feature, students not only read and listen to material, but are also actively involved in testing and reflecting on their understanding of the concepts they have learned.

Apart from that, experts also suggest that the use of language in teaching materials be made simpler. This is important because class III students are still in the concrete operational stage so it is easier to understand concepts if they are conveyed in light language and not too academic. Therefore, revisions are carried out by simplifying sentences that are too complicated and adjusting the terms used so that they are easier for students to understand.

Other revisions involve improving the quality of illustrations in teaching materials. The illustrations used need to be more relevant to students' daily lives, so that it is easier for them to relate the material to their personal experiences. For example, in

learning about religious moderation, pictures are added that reflect social interactions between religious communities in the school and community environment. In this way, students can understand concepts not only theoretically, but also in real life contexts.

After revisions are made based on input from experts, the teaching materials are then ready to be tested in class. This trial aims to see how students respond to teaching materials and evaluate whether the material presented can help them understand the concepts being taught better. At this stage, teachers also play an important role in providing feedback regarding the effectiveness of teaching materials in increasing student involvement in learning.

The trial process is carried out by observing students' reactions and participation when using these teaching materials in teaching and learning activities. Several indicators observed include the level of student involvement, ease in understanding the material, and enthusiasm in carrying out the tasks given. If problems are found in the use of teaching materials, further improvements can be made before the teaching materials are used more widely.

Through this development and validation stage, it is hoped that the teaching materials that have been designed can have a positive impact on the learning process. With a more interactive approach, students can more easily understand the material, increase creativity in completing project assignments, and develop an attitude of religious moderation in everyday life.

Thus, the development of teaching materials not only aims to improve students' academic understanding, but also to shape character and moderate religious values. Through project-based learning and a more interesting approach, students are expected to be more active, creative, and better understand the importance of tolerance and harmony in religious life.

#### 4. Implementation in Class

After the teaching materials were developed, trials were carried out in learning in class III at SDN Pager 02 Purwosari. The teacher uses this teaching material in several learning sessions using the PjBL approach. Implementation results show increased student participation in discussions and completion of project assignments. However,



several challenges still arise, such as students' lack of initial understanding of the project concept and lack of experience working independently.

To overcome these challenges, teachers apply several strategies, including: 1) Provide more intensive guidance in understanding project tasks; 2) Utilize school facilities such as computer laboratories and libraries to support material exploration; 3) Increase parental involvement in supporting project-based learning at home; 4) Using icebreaking and reflection methods to maintain student enthusiasm during the learning process.

#### 5. Evaluation of the Effectiveness of Teaching Materials

Evaluation is carried out through classroom observations, interviews with teachers and students, as well as analysis of student learning outcomes. From this evaluation, it was found that PjBL-based digital teaching materials were able to increase students' understanding of the concept of religious moderation in PAI. Students are more active in discussions, more creative in completing projects, and show better tolerance for differences in the school environment.

However, there are still several aspects that need to be improved, such as: 1) Improve the quality of digital teaching materials to make them more interactive and interesting; 2) Provide training for teachers in the use of educational technology; 3) Optimizing the use of school facilities to support project-based learning.

### Research Implications

The results of this research have several important implications in the development of PAI learning in elementary schools:

- 1) **Increasing Teacher Skills:** Teachers need to be equipped with skills in developing and implementing PjBL-based teaching materials, especially in the use of digital technology.
- 2) **Optimizing School Facilities:** Schools need to increase the use of facilities such as computers and libraries to support student exploration in project-based learning.

- 3) Strengthening Religious Moderation: Project-based learning at PAI can be an effective strategy for instilling the values of religious moderation, by involving students in projects that encourage understanding, tolerance and cooperation.

#### **D. Conclusion**

The importance of innovation in developing Islamic Religious Education (PAI) teaching materials that do not only focus on academic achievement, but also on strengthening the character and religious attitudes of students. The main findings show that the implementation of Project Based Learning (PjBL) based teaching materials is able to provide more active, contextual and meaningful learning for class III students at SDN Pager 02 Purwosari. Through this approach, students show an increase in learning engagement, critical thinking skills, and understanding of the values of religious moderation.

The development of teaching materials carried out in systematic stages based on the ADDIE model has succeeded in responding to real needs in the field, especially in facing the constraints of a lack of digital learning resources and limitations in implementing project-based learning. The design of teaching materials that combine multimedia elements, exploratory activities, and projects that are gradual and relevant to everyday life has proven to be effective in facilitating learning that is appropriate to students' cognitive development stages.

The results of implementation in the classroom show that although there are still challenges in the initial adaptation stage, students are able to show positive development in working independently and collaboratively. Moreover, the integration of religious values in a more real social context through learning projects provides space for students to internalize the meaning of religious moderation in a more concrete and applicable way.

Thus, this research not only achieves its goal of producing appropriate and effective teaching materials, but also confirms that the PjBL approach in PAI learning has great potential to develop a generation that is not only intellectually competent, but also spiritually and socially mature in diversity.

## E. Bibliography

- Dewi, R. V. K., Sunarsi, D., MM, C., & Khoiri, A. (2021). Pendidikan Ramah Anak. In *Cipta Media Nusantara* (Vol. 01).
- Dewi Ixfina, F. (2024). Harmoni Kebhinekaan: Peran Moderasi Beragama di Lembaga Pendidikan Islam. *At Ta'dib: Jurnal Pendidikan Guru Madrasah Ibtidaiyah*, 1(1), 25–38.
- Farikhatin, N., Eka Subekti, E., & Hanum, A. (2024). Pengaruh Model Pembelajaran Project Based Learning dengan Media Diorama terhadap Hasil Belajar Peserta Didik. *Jurnal Inovasi, Evaluasi Dan Pengembangan Pembelajaran (JIEPP)*, 4(1), 9–15. <https://doi.org/10.54371/jiepp.v4i1.365>
- Fauzah, S. S. (2021). *Pengaruh Media Prezi Berbasis Project Based Learning Terhadap Keterampilan Berpikir Kreatif Siswa Pada Mata Pelajaran Biologi*. 1–108. <http://repository.radenintan.ac.id/id/eprint/15690>
- Ibrahim Maulana Syahid, Nur Annisa Istiqomah, & Azwary, K. (2024). Model Addie Dan Assure Dalam Pengembangan Media Pembelajaran. *Journal of International Multidisciplinary Research*, 2(5), 258–268. <https://doi.org/10.62504/jimr469>
- Iqbal, M., Panjaitan, A. Y., Helvirianti, E., Nurhayati, N., & Ritonga, Q. S. P. (2024). Relevansi Pendidikan Karakter dalam Konteks Pendidikan Islam: Membangun Generasi Berkarakter Islami. *Indonesian Research Journal on Education*, 4(3), 13–22. <https://doi.org/10.31004/irje.v4i3.568>
- Judrah, M., Arjum, A., Haeruddin, & Mustabsyirah. (2024). Peran Guru Pendidikan Agama Islam dalam Pembentukan Karakter Peserta Didik. *Journal of Instructional and Development Researches*, 4(1), 25–37. homepage: <https://www.journal.iel-education.org/index.php/JIDeR>
- Junita, E. R., Karolina, A., & Idris, M. (2023). Implementasi Model Pembelajaran Project Based Learning (Pjbl) Dalam Membentuk Sikap Sosial Peserta Didik Pendidikan Agama Islam Di Sd Negeri 02 Rejang Lebong. *Jurnal Literasiologi*, 9(4), 43–60. <https://doi.org/10.47783/literasiologi.v9i4.541>
- Mashudi, M. (2021). Pembelajaran Modern: Membekali Peserta Didik Keterampilan Abad Ke-21. *Al-Mudarris (Jurnal Ilmiah Pendidikan Islam)*, 4(1), 93–114. <https://doi.org/10.23971/mdr.v4i1.3187>
- Nuryati, N., & Darsinah, D. (2021). Implementasi Teori Perkembangan Kognitif Jean Piaget dalam Pembelajaran Matematika di Sekolah Dasar. *Jurnal Papeda: Jurnal Publikasi Pendidikan Dasar*, 3(2), 153–162. <https://doi.org/10.36232/jurnalpendidikandasar.v3i2.1186>

- Okpatrioka. (2023). Research And Development ( R & D ) Penelitian Yang Inovatif Dalam Pendidikan. *Jurnal Pendidikan, Bahasa Dan Budaya*, 1(1), 86–100.
- Rajagukguk, F. H., & Weisdiyanti, N. (2023). *Prosiding Seminar Nasional Keguruan dan Pendidikan Universitas Muhammadiyah Muara Bungo Prosiding Seminar Nasional Keguruan dan Pendidikan Universitas Muhammadiyah Muara Bungo Volume ( 1 ) Juli 2023*. 17, 108–113.
- Septianingsih, D., Burhanudin, M. Z., Fawzia, M., Irawati, H., & Wahyuni, P. A. (2024). Implementasi Metode Pembelajaran Project Based Learning Berbasis Teknologi Canva Untuk Meningkatkan Kreativitas Peserta Didik di SMA N 1 Tambun Selatan. *SSRN Electronic Journal*. <https://doi.org/10.2139/ssrn.4837650>
- Zulfarmansyah, D. (2023). *Pengembangan E-Pocket Book Berbasis Web Untuk Meningkatkan Kemampuan Pemecahan Masalah Siswa SMA / MA Pada Materi Suhu*. 59.