

## Improving The Capability Of Madrasah Teachers In Conducting Diagnostic Assessments And Differentiation Learning In Tiris District Probolinggo

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### ABSTRACT

Improving the quality of learning is crucial in the educational context. Teachers, as the main agents in the learning process, are responsible for creating an effective and enjoyable learning environment. This research focuses on the implementation of the Independent Curriculum in madrasas in Probolinggo Regency, particularly in the Tiris District. By involving 30 madrasas, this study aims to enhance teachers' abilities in conducting diagnostic assessments and differentiated learning. The Participatory Rural Appraisal (PRA) approach is used to actively involve teachers in designing and implementing more effective learning strategies. Through this approach, teachers are not merely recipients of instructions but active collaborators involved in every stage of planning and implementation. PRA enables teachers to deeply understand the needs and potential of students, allowing them to design more targeted and contextually appropriate learning strategies. Through two stages of training and mentoring, madrasa teachers are provided with an in-depth understanding of diagnostic assessments and differentiated learning. The evaluation involves both teachers and students as assessment subjects to measure the positive impact of implementing these learning strategies. The research results indicate a significant increase in teachers' knowledge and skills regarding the planning and execution of differentiated learning. Teachers have succeeded in creating an inclusive learning environment, motivating students, and improving learning outcomes. Diagnostic assessments also provide valuable guidance for teachers in designing learning strategies that meet the individual needs of students. It is hoped that this improvement in learning quality will positively impact students' learning experiences and serve as a model for other madrasas in enhancing the quality of education. The implementation of the Independent Curriculum through the PRA approach has proven effective in encouraging positive changes in learning practices in madrasas in Probolinggo Regency

**Keywords:** *Independent Curriculum, Madrasah, Diagnostic Assessment, Differentiated Learning*

### INTRODUCTION

Learning is very important in educational activities. Facilitating learning for students is a noble task for a teacher (Siskandar, 2020; Mukhibat, 2022). Teachers' obligations are not only in the context of being able to create a comfortable and enjoyable learning atmosphere, but teachers must also have an obligation to understand every science of learning management so that they can increase motivation for students. Teachers must be able to sort and choose learning models and methods that suit the students' conditions and circumstances. So that the models and approaches applied by teachers are able to develop students' self-development (Aji Sofanudin, Rokhman, Wasino, & Rusdarti, 2016; McCoach, Gable, & Madura, 2013; R. Strickland, 2001).

The Minister of Education, Culture, Research, and Technology's decision on the Independent Curriculum is stipulated in Minister of Education, Culture, Research, and Technology Decree Number 56/M/2022 with the aim of facilitating an enjoyable learning process. This learning is a lifelong process carried out at all levels of education, from early childhood education (PAUD) to primary and secondary education, starting in 2022. The provisions for the implementation of the Independent Curriculum have also been established by the Ministry of Religion through KMA Number 347 of 2022, which provides Guidelines for the Implementation of the Independent Curriculum in Madrasas. The implementation of the Independent Curriculum follows all the content applied to schools under the auspices of the Ministry of Education and Culture.

In 2022, the Ministry of Religion has designated 2,471 madrasah institutions to implement the independent curriculum. This data will increase to 26,169 in 2023, madrasah institutions at the Raudlatul Athfal, Madrasah Ibtidaiyah, Madrasah Tsanawiyah and Madrasah Aliyah levels that implement the independent curriculum. Based on this data, it provides reinforcement that madrasah residents have strong motivation in implementing the independent curriculum.

The Ministry of Religion has carried out socialization and technical guidance for IKM both intensively through KKMI in each district and city throughout Indonesia using the optimization of independent learning platforms, independent teaching platforms, direct assistance in madrasahs as well as regular monitoring and evaluation of IKM, although it is very limited. However, this activity has not been able to run intensively because the assistance provided is very limited, especially to fringe madrasahs located in remote villages such as Tiris sub-district, one of the two poorest sub-districts in Probolinggo district.

The Merdeka Curriculum aims to provide a student-centered approach to education, emphasizing differentiated learning and diagnostic assessments to cater to diverse student abilities, interests, and potentials. The curriculum involves planning, execution, and evaluation, including diagnostic assessments, formative and summative assessments, differentiated teaching modules, and creating a supportive learning environment (Swandana, 2023). Teachers, schools, and students need to be well-prepared to understand and interpret the Merdeka Curriculum to ensure a student-centered learning process (Yunitasari, 2023).

Differentiated learning strategies within the Merdeka Curriculum aim to allow students the freedom to direct their learning based on their interests, needs, and potential (Shalihah, 2023). This approach aligns with the idea of respecting individual uniqueness, as advocated by Ki Hajar Dewantara (Musdahlipah, 2024). The curriculum also emphasizes the importance of students being able to ask questions, reason, and effectively communicate knowledge acquired during the learning process (Rahayu, 2023). The Merdeka Belajar curriculum underscores the freedom students have in determining their learning paths based on their interests and potential (Wijaya, 2024). Despite its positive impact, challenges exist, such as some teachers' limited understanding of differentiated learning (Wulandari, 2024). However, studies show that a significant percentage of teachers have implemented differentiated learning principles under the Merdeka Curriculum (Mabsutsah et al., 2023)

Information obtained from <https://kemenag.go.id> stated that the KSKK Madrasah Directorate conducted a survey of 2,193 madrasahs as implementers of the Independent Curriculum Implementation in 2021. The results obtained were as follows:

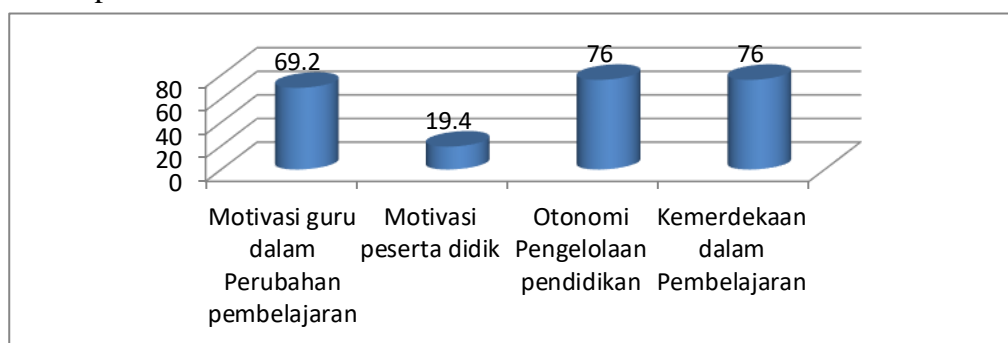


Table 1: Results of survey on implementation of IKM in Madrasahs

The implementation of the Independent Curriculum (IKM) in Probolinggo Regency is only limited to the implementation of technical guidance (bimtek) and socialization of

the implementation of the Independent Curriculum for the Raudlatul Athfal, Madrasah Ibtidaiyah, Madrasah Tsanawiyah and Madrasah Aliyah levels which are carried out in each sub-district by KKMI ([https:// probolinggo.kemenag.go.id/](https://probolinggo.kemenag.go.id/)). This situation will of course have very minimal information if intensive assistance is not carried out at each madrasah, especially about the learning process in implementing the independent curriculum, especially in the diagnostic assessment and differentiated learning sections.

Tiris District is an area that has 49 Madrasah Ibtidaiyah spread across several villages including 1) Andungbiru; 2) Andungsari; 3) Anchor; 4) Trade; 5) Rice fields; 6) Racek; 7) Ranuagung; 8) Ranugedang; 9) Rejing; 10) Fresh; 11) Tegalwatu; 12) Drain; 13) Tlogoargo; 14) Tlogasari; 15) Tulupari, and; 16) Wedusan. Of the 49 Madrasas, strengthening human resource capacity and quality of madrasas is still very limited. Among the causes of this condition are 1) minimal understanding of the criteria for National Education Standards (SNP); 2) there is a gap in the process of administering Madrasas and state elementary schools in one village; 3) Lack of availability of teaching aids used in the learning process and innovative learning models provided. 4) lack of accountability in the management of madrasa heads in their management.

In this way, researchers will provide assistance in the form of community service to 30 Madrasas in the Andungbiru area; Andungsari, and Ranuagung.

The goal to be achieved in this community service is to increase the ability of Madrasah teachers to carry out diagnostic assessments and differentiated learning in Tiris District, Probolinggo Regency. In addition, it can improve the ability of Madrasah teachers to carry out diagnostic assessments and differentiated learning in Tiris District, Probolinggo Regency after implementing a participatory community empowerment model, namely Participatory Rural Appraisal (PRA).

This service strengthens further research carried out by the Probolinggo Regency Ministry of Religion in each sub-district. This service is supported by assets and capital from the assisted madrasah where the community service takes place. One of the assets possessed by the ten madrasas is the competence of the teaching staff, where all the teaching staff are graduates, although there are some who do not have linearity with educational competence. This madrasah place of service has the same goal of improving the quality of madrasas in developing competitive and competitive human resources in implementing the independent curriculum.

### **Theoretical basis**

Madrasah is an educational institution as a formal teaching and learning process that has a curriculum, learning model and learning techniques that are unique and different from other formal schools. The special characteristic in question is a religious education teaching method that prioritizes Islamic values in the form of learning to read the Qur'an, practical recitation of worship, teaching of Tawheed, Islamic Dates, Tafsir, and Arabic. After that, there are general lessons and skills. In terms of education, madrasas were initially synonymous with learning the Koran, recitation of recitation at elementary school level, and the study of advanced books.(Siskandar, 2020).

Madrasas in educational reality are able to provide aspirations in the social, cultural and religious fields. This condition can be considered as an alternative and superior Islamic educational institution in rapid social change(Barni & Mahdany, 2017; Fitriani & Fibriana, 2020; Supardi, 2013). The emergence of madrasas is considered an indicator of the positive development of Islamic cultural achievements, which reflects the success of knowledge, intellectuals and culture (Umar, 2015). The theoretical basis behind the establishment of madrasas as Islamic schools was influenced by the efforts of modernist organizations such as Muhammadiyah and Al Irsyad in adopting the colonial education

system. These organizations aimed to utilize madrasas as platforms for cultivating Islamic values and producing well-informed citizens comparable to those educated in the conventional school system. The interventions in policy were designed to enhance and clarify the roles of madrasa institutions to meet future educational needs effectively (Kultsum et al., 2022).

Madrasas, as Islamic educational institutions, are essential for providing K-12 education and instilling Islamic values in students (Wasif & Prakash, 2017). These institutions are structured to offer education in various subjects, with a specific focus on Fiqh, which is crucial for enabling students to comprehend and apply Islamic law, thereby influencing their way of life through guidance and training (Zainuddin et al., 2022). Madrasas are recognized as schools that prioritize Islamic religious education and knowledge as fundamental subjects of instruction (Sarifah et al., 2023). In the Indonesian context, the progress of Islamic education and the reinforcement of the national education system have been closely linked to the presence of madrasas and Islamic schools (Latief et al., 2021). These institutions have played a significant role in dispelling negative stereotypes and promoting a positive image by producing graduates who do not adhere to radical ideologies (Mansur et al., 2023).

Madrasas have been positioned as competitors to public schools, addressing global challenges and offering a combination of religious and modern education (Anwar, 2018). Moreover, the transformative impact of madrasas on the socio-religious aspects of students' lives has been emphasized, highlighting the interconnectedness between the madrasa environment and the home setting (Sanyal & Farah, 2018). Madrasas have been instrumental in shaping the identity of Muslim women, preparing them for future roles as wives and mothers while promoting piety and modesty (Dassi & Ruby, 2023). The integration of curricula in modern Islamic educational institutions like Salafi madrasas aims to dispel misconceptions and attract a broader demographic, including families from the upper-middle class (Muthohirin et al., 2022).

To educate the Indonesian nation, Islamic education in Indonesia is developing following the rhythm and dynamics of the times. Madrasas are old Islamic institutions that are even older than the Republic of Indonesia. It is an Islamic educational institution owned by the community. The emergence of madrasas began with motivational preaching through education.

Madrasah quality in Indonesia in the context of educational outcomes refers to the achievements obtained at a certain time (whether at the end of each quarter, the end of the year, two or five years, or even ten years). Achievements obtained can be the results of academic ability tests (for example, final exams and general tests) and non-academic achievements such as dancing and skills. (Siskandar, 2020)

Improving the quality of madrasas starts from the strategy of getting prospective students (inputting). There are several things that madrasa heads do in an effort to recruit prospective students. First, select prospective students (Nursaid, 2020). The quality of education is expected to produce alumni who have skills appropriate to their level of education, have integrity and have high morals. Improving the quality of education that is meaningful and of high quality includes developing patterns and perfecting the curriculum and evaluation system, improving educational facilities, developing teaching materials, or strengthening the capacity of teachers and education staff through training. (Kahar et al., 2019).

Implementation of the Independent Curriculum in Madrasas is very important in facilitating students in acquiring the knowledge and skills needed to become independent and creative individuals. The following are several teacher roles in the Independent Curriculum (Mukhibat, 2023; Usman et al., 2023): 1) Become a facilitator: The teacher

becomes a facilitator in learning, which is guided by the independent curriculum. Teachers provide assistance to students in developing knowledge and skills through an open, creative and student-centered approach. 2) Introducing critical thinking: Teachers are responsible for teaching students how to think critically and analytically in dealing with every problem or issue faced by students in society; 3) Developing cooperation: Teachers also teach students about the importance of cooperation and collaboration in the learning process. In the Merdeka Curriculum, students are taught to work together to solve problems and develop creativity; 4) Guiding and providing support: The teacher must be someone who can guide students in developing their potential and provide the support needed to overcome difficulties in the learning process. 5) Becoming a liaison: Teachers also act as a liaison between students and the community and surrounding environment. They help students understand and know more about (Efrina, 2019)

Teachers have made various efforts to make learning more enjoyable, such as collaborating in the learning process in the classroom and outside the school environment, analyzing each lesson that has been carried out. Circumstances that occur are often not in accordance with what is expected. Students in certain materials have very low interest in learning, resulting in low learning outcomes (Anifah, 2020; Muslikhin, 2019; Nappu et al., 2019; Prasetya et al., 2020; Susandi et al., 2022). The hope is to be able to develop a more progressive learning system. In this case, teachers are expected to be able to choose varied methodologies, models and learning strategies by paying attention to student diagnostic assessments first. (Azizah, 2021).

In this regard, the author considers it important to change the implementation of composing learning by using a more different approach, to a certain differentiation as an important task in the implementation of learning. The differentiated learning paradigm sees that all students have their own uniqueness (Rachmawati et al., 2022). Differentiated learning will provide several student needs that are tailored to the student's capacities and interests. This concept is based on the degree to which each individual student has to pay attention to different levels of input. This condition is because each student experiences development growing up in a different social environment and culture. Learning is ultimately carried out in a way to provide an understanding of students' interests and talents (Trianto, 2009)

#### **METHODS OF DEVOTION**

The Participatory Action Research (PAR) method is a research approach that positions participants as active partners throughout the research process. In this method, researchers and participants collaboratively identify relevant issues, design action plans to address them, implement actions, observe the results, and reflect on the processes and outcomes. The uniqueness of PAR lies in its iterative cycle involving continuous planning, action, observation, and reflection. Thus, PAR not only aims to generate knowledge but also to create positive and sustainable social change in the studied community. This process enables participants to have control and ownership over the research, which often enhances the relevance and effectiveness of the interventions applied

The method that researchers use is the empowerment model participatory society or often known as Participatory Rural Appraisal (PRE). The PRA approach is a technique for stimulating community participation of program participants in various activities, starting from the social analysis, planning, implementation, evaluation, to program expansion stages. For program implementers, this method and approach will be very helpful in understanding and appreciating the conditions and life in the location/region in more depth.

This in itself allows program implementers to absorb knowledge, experience and aspirations of the community in implementing program activities, which in turn is expected to support program sustainability. This empowerment model was deliberately chosen with various considerations, including: Those who have or face problems are partners, so that the involvement of these partners is a factor that determines the solution to the problems faced. This method is divided into 3 stages, including the preparation stage, implementation stage and report preparation stage.

1. Area/location preparation

Regional preparation is an important stage for the smooth running of the PRA process. Preparation actually begins with socialization. It is hoped that the locus of service will understand the aims and objectives of implementing community empowerment. Likewise, it is hoped that there is trust, openness and a friendly atmosphere between the community and the research or community empowerment team. One of the stages in socialization is preparing a PRA activity plan.

2. Team Preparation

The PRA process is usually facilitated by a team of facilitators. The members of this team consist of 3 lecturers and 2 students who adapt to the scientific capacity in this service, including lecturers, facilitators of the Ministry of Education and Culture's driving school. Apart from that, the external team that will be involved is the madrasah supervisor and the Primary Education Council.

3. Mentoring Stage.

Training to increase teachers' abilities in carrying out diagnostic assessments and differentiated learning begins with the introduction and understanding of learning objectives and learning flows in the independent curriculum. Next, teachers are introduced to differentiated learning models and diagnostic assessments in preparing teaching modules.

Assistance is provided so that community service activities last as long as possible. 3 (three) months. Mentoring activities. which will. done is. Increasing teachers' abilities in carrying out diagnostic assessments and differentiated learning.

**DYNAMICS OF ACTION PROCESSES**

This research focuses on training and mentoring activities aimed at enhancing the ability of Madrasah teachers in conducting diagnostic assessments and differentiated learning in Tiris District, Probolinggo Regency. These activities were conducted in two phases according to the service locus, with the first phase held on November 2-3, 2023, and the second phase on November 21-22, 2023. This phased approach was designed to provide continuous support and feedback, ensuring the gradual and sustained development of teachers' competencies in these critical areas.

The training included several systematically arranged sessions to equip teachers with the necessary skills and knowledge. The detailed stages of the training were as follows:

Table 1: The detailed stages of the training

<b>Independent Session</b>	<b>Activity</b>
Opening	Explanation of the agenda and objectives of the assistance. Agreement on rules and regulations during mentoring. Introduction.
Start from Yourself	Participants fill out a reflective sheet starting from themselves.

<b>Independent Session</b>	<b>Activity</b>
Concept Exploration	Explanation of concepts related to initial assessment and differentiated learning and Diagnostic Assessment.
Collaboration Space	Group participants share about the initial assessment practices and differentiated learning that have been carried out.
Contextual Demonstration	Individual participants create tables regarding obstacles and alternative solutions that can be implemented from the results of discussions in the Collaboration Room.
Elaboration of Understanding	Participants reflect on the results of the discussions that have been held. Participants share the results of their reflections.
Connections Between Matter	Classical discussions and making conclusions related to the learning that has been obtained during mentoring.
(Plan) Real Action	For Teachers: Create a lesson plan that includes an initial learning assessment plan and differentiated learning and Diagnostic Assessment. For School Principals: Make a plan to support teachers to carry out initial assessments and differentiated learning and Diagnostic Assessments.
Closing	Evaluation and Closing.

This research employed the Participatory Rural Appraisal (PRA) approach, characterized by its participatory nature and the application of an assistance cycle. During the implementation, researchers provided ample opportunities for Madrasah teachers to be actively involved in various scheduled activities. The primary goal of involving Madrasah teachers in multiple cycles of these activities was to better prepare them for teaching, particularly in terms of diagnostic assessment and the application of differentiated learning as outlined in the teaching modules.

Each cycle of activities served as an evaluative step, helping Madrasah teachers to assess and improve their teaching approaches. It was hoped that the active participation of teachers in this process would increase their engagement in designing and implementing more effective learning strategies, particularly concerning diagnostic assessments and the application of differentiated learning. Additionally, this involvement provided teachers with the opportunity to give valuable input and feedback to researchers, fostering better collaboration in developing teaching modules tailored to the needs and educational context of the Madrasah.

Based on observation data and interviews conducted by the community service team, an in-depth evaluation of the learning process in the school was carried out. The main focus of the evaluation was on teachers' understanding of differentiated learning and diagnostic assessment. The community service team not only checked understanding of basic concepts but also assessed differentiation strategies and techniques applied by teachers. This evaluation also included the use of relevant media and technology in the learning context.

In this evaluation process, the community service team not only focused on the teachers' perspective but also actively involved students as assessment subjects. The goal was to assess the impact of differentiated learning on student motivation, participation, and achievement. Students served as valuable sources of information to evaluate the effectiveness of the learning methods applied by teachers.

Through this approach, the community service team provided a holistic picture of the effectiveness of differentiated learning strategies and diagnostic assessments in the school environment. This in-depth evaluation was expected to provide valuable input for further development in improving the quality of education at the school level and enhancing the learning strategies implemented by teachers.

The results from the analysis of observation, interview, and evaluation data revealed several significant findings that reflect the positive impact of implementing differentiated learning strategies and diagnostic assessments in the Madrasah environment. Firstly, there was a clear increase in the knowledge and skills of Madrasah teachers regarding the planning and delivery of differentiated learning and diagnostic assessment.

Teachers successfully demonstrated a deeper understanding of pupils' needs and learning styles. They were able to identify individual differences in the way students learn and design learning to suit each individual's unique needs. These changes included a shift in learning approaches, with teachers able to adapt differentiation strategies more effectively, demonstrating a better understanding of differences in students' learning styles. The following are the results of teacher competencies in conducting differentiated learning:



This research emphasizes the increased use of media and technology in learning at Madrasahs, highlighting teachers' efforts to leverage modern resources to enhance educational quality. During the training, teachers were introduced to innovative educational technology tools such as learning software, online education platforms, and digital assessment tools. They were taught how to integrate these technologies into lesson plans to create a more interactive and engaging learning environment, as well as to conduct real-time diagnostic assessments. The use of digital media, such as educational videos and multimedia presentations, was also taught to enrich learning materials, providing students with the flexibility to learn at their own pace and style. The implementation of technology encourages better collaboration between teachers and students through online platforms that enable interactive discussions and direct feedback. The increased use of technology also helps teachers efficiently manage and track student progress through learning management systems (LMS). Overall, the adoption of modern technology creates a more dynamic, personalized, and effective learning experience, increasing student motivation and engagement, and helping them achieve better academic results, demonstrating the importance of integrating technology into education to meet the challenges of the digital era.



The achievements of Madrasah teachers in improving their understanding and skills are very positive indicators of the effectiveness of the learning strategies implemented. It is hoped that these improvements will have a significant positive impact on the overall learning process and on student achievement, especially in the context of their individual diversity. The implementation of differentiated learning strategies and diagnostic assessments is expected to become a model for other Madrasahs in improving the quality of education.

The quality of learning provided by Madrasah teachers in the context of community service has increased significantly. The teachers not only succeeded in improving quality but also succeeded in creating more engaging, adaptive, and relevant learning experiences for students. This improvement can be seen from teachers' efforts to overcome challenges in responding to the needs of students with diverse abilities.

Madrasah teachers have succeeded in creating a more inclusive learning environment, where students of all ability levels can be optimally engaged. This creates a situation where students are more involved in the learning process, more motivated, and achieve better learning outcomes. The improvement in learning quality is also reflected in increased student understanding of learning material, increased active participation in discussions, and overall improvement in student academic results.

Diagnostic assessments also play a key role in improving the quality of learning. Through these assessments, teachers can identify students' basic abilities, which then serve as the basis for planning differentiated teaching modules. Thus, diagnostic assessments are not only an evaluation tool but also a valuable guide for teachers in designing learning strategies that suit individual student needs.

Overall, the improvement in the quality of learning benefits not only students' academic development but also has a positive impact on their overall learning experience. The implementation of diagnostic assessments and differentiated approaches has opened up new opportunities to enhance the quality of education in this Madrasah, which is expected to become an inspiration and example for other educational institutions.

## **Discussion**

The theoretical basis underpinning the research on the increased use of media and technology in learning at Madrasahs is multifaceted and draws upon various educational frameworks and models. The integration of innovative educational technology tools, such as learning software, online platforms, and digital assessment tools, aligns with constructivist learning theories proposed by Vygotsky (Ibrahim, 2024). Constructivist theory emphasizes that learners actively construct their knowledge through interaction with their environment. In this context, technology plays a crucial role as a facilitator that enriches the learning environment. For example, online platforms enable students to collaborate virtually with classmates and teachers, while adaptive learning software can provide instant feedback and adjust material according to individual learning needs.

The Technology Acceptance Model (TAM) is also vital in guiding the adoption of technology in education. This model, which includes factors such as perceived ease of use and perceived usefulness, helps ensure that teachers and students not only accept but effectively use these technological tools in the learning process (Ibrahim, 2024). By understanding the factors influencing technology acceptance, such as technological readiness and attitudes toward technology, educators can overcome potential barriers and maximize the benefits of technology in learning. Proper training and ongoing support are also necessary to enhance technological comfort and competence among teachers.

Additionally, the research incorporates elements from the Technological Pedagogical Content Knowledge (TPACK) framework, which provides a theoretical foundation for

understanding how to effectively integrate technology into teaching practices (Altun, 2019). TPACK combines technological knowledge, pedagogical knowledge, and content knowledge, enabling teachers to develop more dynamic and engaging lesson plans. By leveraging TPACK, teachers can seamlessly integrate digital tools into their curriculum, enhancing the quality and effectiveness of instruction. For example, the use of digital assessment tools like online quizzes not only simplifies the assessment process but also provides real-time data on student performance, which can be used to adjust teaching strategies quickly and accurately.

Diagnostic assessment is also a key component of this research. Diagnostic assessments allow teachers to identify students' basic abilities and tailor teaching modules based on personalized learning and differentiated instruction principles. This approach ensures that each student receives instruction that meets their needs and abilities, thereby improving their learning outcomes (Meier, 2015). Through diagnostic assessments, teachers can design specific interventions to help struggling students and provide additional challenges for more advanced students, allowing each student to achieve their maximum potential.

Furthermore, the emphasis on creating a more inclusive learning environment at Madrasahs resonates with the concept of a Community of Practice (CoP) (Sadik, 2020). CoP emphasizes the importance of collaboration and shared learning. By using online platforms, Madrasahs can create inclusive learning environments where teachers and students share knowledge and experiences. This not only enhances the quality of learning but also supports the professional development of teachers as they work together to overcome challenges and respond to the diverse needs of their students. In a CoP environment, teachers can share effective teaching strategies, receive constructive feedback, and collaboratively develop innovative solutions to learning challenges.

In conclusion, the research on technology integration at Madrasahs is grounded in a rich theoretical landscape encompassing constructivist learning theories, the Technology Acceptance Model, the TPACK framework, differentiated instruction, personalized learning, CoP, and diagnostic assessment. By drawing on these theoretical foundations, Madrasahs can effectively leverage modern resources to enhance educational quality, improve student engagement and motivation, and ultimately achieve better academic outcomes in the digital era. Technology integration not only enables more interactive and responsive learning but also creates opportunities for developing 21st-century skills such as problem-solving, collaboration, and digital literacy

## CLOSING

In this research, the PRA approach with a participatory character and the implementation of a mentoring cycle has been proven to be an effective framework in involving Madrasah teachers in learning development. The research results show that teachers' active participation in activities carried out in several cycles has a positive impact on learning preparation, especially in diagnostic assessments and the application of differentiated learning. The implications of these findings are very relevant for improving the quality of learning in Madrasahs. Therefore, it is hoped that the results of this research can become a basis for developing learning strategies that are more adaptive and responsive to student needs. As a suggestion for further research, it is recommended to further explore certain aspects of the use of the PRA approach in the context of Madrasah education. Thus, it is hoped that this research can provide a positive contribution and inspiration for the development of education in the future

Overall, through this community service, it can be concluded that the implementation of differentiated learning strategies and diagnostic assessments in Madrasahs has had a

significant positive impact. Teachers have succeeded in increasing their knowledge and skills in planning and delivering learning that suits students' needs and learning styles. This improvement in the quality of learning is reflected in a more interesting, adaptive and relevant student learning experience.

In the process of improving the quality of learning, diagnostic assessments have proven their usefulness as an effective tool for identifying students' basic abilities. The information obtained from this assessment becomes the basis for teachers in designing differentiated teaching modules, thereby enabling more inclusive education services.

Apart from that, improving the quality of learning is also reflected in increasing students' understanding of learning material, increasing active participation, and improving overall academic results. Madrasah teachers have succeeded in creating a learning environment that is responsive to student diversity, thereby creating conditions that support optimal motivation and achievement.

The overall results of this community service provide a positive picture of the potential and effectiveness of implementing differentiated learning strategies and diagnostic assessments in the Madrasah context. It is hoped that this achievement will not only have an impact on improving student academic achievement, but also contribute to improving the overall quality of education. This successful implementation in Madrasahs can be used as inspiration and reference for other educational institutions in an effort to increase learning effectiveness

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