# Developing Pedagogical Competence of Madrasah Ibtidaiyah Teachers Through Formative Assessment Management

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## Abstract

Formative assessments play a crucial role in providing valuable feedback to teachers and students, highlighting progress, and pinpointing areas for improvement. This study focuses on developing teacher competence through the planning, organization, implementation, and supervision of formative assessments at Elementary School. It is a descriptive and qualitative research employing interviews, documentation, and observation methods to gather data, ensuring data validity through triangulation techniques. Data analysis involves collection, presentation, and conclusion. The findings indicate that teachers' pedagogical competence is enhanced through effective formative assessment management, evidenced by thoughtful planning, meticulous organization, and comprehensive execution of formative assessments. Responsibilities for supervision are distributed among Madrasah Heads and Madrasah Supervisors. The study's implications suggest that strengthening teacher supervision in formative assessments can improve pedagogical practices, ultimately enhancing student learning outcomes.

**Keywords: Pedagogical Competence Development; Madrasah Teachers; Formative Assessment Management**

## INTRODUCTION

One crucial skill that teachers need is pedagogical competence, which includes the ability to manage students' learning effectively. This involves understanding the students, designing and implementing lessons, evaluating learning outcomes, and helping students reach their full potential (Nurdin et al., Z., 2023). Teachers must be able to conduct honest and accurate evaluations of learning outcomes to determine how far learners have achieved the learning objectives and to plan necessary improvements (Lestari et al., 2023).

Formative assessment management refers to collecting and analyzing data periodically and continuously to support the development of teachers' pedagogical competence. This formative assessment aims to provide an authentic source of data that helps develop a teacher's pedagogical competence profile, supporting the quality of the process and learner learning outcomes (Ratnawati Susanto, 2021).

Formative learning evaluation measures students' learning abilities in an ongoing educational process during the learning process (Adella et al., 2020). A formative assessment is conducted periodically during the learning process to provide feedback to teachers and students on their progress and to address students' weaknesses and strengths. Formative assessment is crucial for improving the quality of education because it helps students improve their weaknesses and strengths (Dewi et al., 2021).

Formative assessments are valuable in determining how well students learn and identifying areas needing improvement (Kamil et al.. Basuki, Sunarno. Sofyan, 2022). They can help teachers change teaching methods and subject matter for better student learning outcomes (Firmansyah, 2022). Additionally, formative assessment can help students prepare for the final assessment and increase their desire to learn (Rahayu et al., 2013). Formative assessment can measure student learning outcomes using a variety of measures, including cognitive, affective, and psychomotor, in addition to commonly used formative tests (Chaerunnisa et al., 2022).

Types of formative assessment vary depending on the situation and educational objectives. A portfolio is a collection of student work during learning, such as notes, assignments, and projects. Portfolios can be used to measure student learning progress (Nurjannah, 2017). Formative tests can come in various forms, such as limited descriptions, multiple choice with reward and punishment scores, and narrative and multiple choice options. This variety shows how diverse formative tests can be used in learning (Hitu et al.., 2017).

In line with the demands of the 2013 curriculum and the Merdeka curriculum, HOTS (higher-order thinking Skills) based formative tests can help students improve their higher-order thinking skills (Sari, Rinda. Pasani, Chairil Faif. Hidayanto, Taufiq, 2022). Formative assessment is carried out in the Merdeka

Curriculum during learning, aiming to provide feedback to teachers and students on student learning progress and effectiveness. This feedback can improve learning and increase student understanding (Putri et al., 2023).

The teachers at Islamic Elementary School Darul Ulum Ngaliyan are facing a problem understanding the concept and practice of formative assessment. The assessments they conduct are often not aligned with the learning objectives that have been set, possibly due to a lack of skills in designing appropriate assessment instruments. Additionally, teachers often have limited time and resources to carry out formative assessments on an ongoing basis. With many administrative tasks and heavy workloads to complete, formative assessment cannot be carried out optimally.

Teachers are primarily responsible for evaluation as they oversee the learning process. Therefore, the quality of the evaluation depends on the evaluator. Evaluators must adhere to established procedures, which is one of their responsibilities. The evaluation process is crucial for supporting student development and improving the quality of learning. However, it is essential to ensure that evaluations are conducted accurately and sustainably to minimize adverse impacts.

In previous research on "Improving teachers' pedagogical competence in preparing K-13-based assessment administration through academic supervision," it was found that one teacher was able to compile 12 aspects of assessment administration with an excellent category (96%), and eight teachers scored in the good category (B) with a score interval of 76%-90% (Amri et al., 2022). The study "Improving Pedagogical Competence Through Academic Supervision" found that the pedagogical competence of SMPN 10 Tambun Selatan teachers can be enhanced through academic supervision (Purwatiningsih, Nunuk, 2020). Additionally, a study on "Improving Teachers' Competence in Preparing Assessment Administration Through the Implementation of Academic Supervision at SD Inpres XXXVII Kota Uneng" showed that academic supervision can improve the ability of teachers in preparing assessment administration in learning at SD Inpres XXXVII Kota Uneng by 26.2% (Konsolina, 2022). Another study, "The Application of Academic Supervision to Improve Teachers in Preparing Assessment Administration at SDN 31/IX Sei Landai Muaro Jambi," demonstrated that academic supervision can enhance teachers' ability to compile assessment administration in learning at SDN 31/IX Sei Landai by 26.2% (Sudiah, 2021). Furthermore, a study entitled "Pedagogical Competence of Madrasah Ibtidaiyah Teacher Education Students in Designing Learning" found that students have good competence in understanding the characteristics of students, curriculum development, planning and implementing learning, utilizing technology, and evaluating learning outcomes (Hairunnisa et al., 2023).

The success of developing pedagogical competence among teachers at Madrasah Ibtidaiyah in MI Darul Ulum Ngaliyan is indicated by their improved ability to plan, organize, implement, and supervise formative assessments. This improvement is demonstrated by their increased capacity to design comprehensive assessment strategies, implement assessments systematically, conduct targeted assessments, and effectively supervise the assessment process. These developments lead to higher quality and sustainable feedback for student learning and development.

## METHODS

This research method is descriptive qualitative, which produces descriptive data, namely visible behavior and sentences or oral speech from people (Magdalena, Ina. Oktaviani, Siti Nurani. Octaviana, Putri. & Ningsih, Pingkan Ayu., 2020). The data validity check is an essential measure of judgment in checking qualitative data (Moleong, Lexy J., 1993). The Miles and Huberman data analysis method used includes data condensation and presentation, drawing conclusions, and checking the report's accuracy (Sugiyono., 2012).

Indicators of formative assessment management used to develop the pedagogical competence of Madrasah Ibtidaiyah teachers include a formative assessment plan integrated into the annual learning plan, with clear objectives and assessment methods. Formative assessment is carried out regularly and according to a schedule, using various assessment instruments. Data from formative assessments are analyzed in depth to identify student progress and areas for improvement. Feedback is given to students regularly and used for learning improvement, and teachers conduct follow-ups based on assessment results.

The following is a description of the steps taken by researchers to analyze the data:

1. Data condensation, collecting data from classroom observations, teacher interviews, and document analysis related to formative assessment. Selecting data on teachers' ability to plan, implement, and supervise formative assessments.

2. Data Presentation, compiling tables that show the formative assessment methods applied by teachers and the frequency of their use. It compiled descriptive narratives summarizing teachers' abilities in planning, implementing, and supervising formative assessments.

3. Conclusions: analyzing themes that emerge from the data, synthesizing findings, and interpreting the results of developing pedagogical competence of Islamic Elementary School teachers through formative assessment management.

4. Verification is done using triangulation by comparing data from observations, interviews, and documents. Member checking asks teachers to review and confirm the research findings.

The subject of this research is a fourth-grade teacher at Islamic Elementary School, Darul Ulum Ngaliyan Semarang City. The researcher chose the fourth-grade teacher because the teacher preparing the evaluation used the Merdeka curriculum. He had prepared an evaluation using the 2013 curriculum in the previous school year. This is very useful for researchers to describe the development of teachers' pedagogical competence in managing formative assessments using the 2013 curriculum into the Merdeka curriculum.

The research used observation, interview, and documentation methods. Observations made by researchers include observing the implementation of formative evaluations when taking place in class IV. Interviews conducted by researchers were structured and in-depth to find information from sources on how to prepare formative evaluation management from beginning to end to the stage of managing data on children's learning outcomes. The documentation that researchers collect is asking for student score documents and teacher handbook evaluation books.

The quality of teachers' pedagogical competence development in managing formative assessment can be measured using techniques such as observation, interviews, and documentation. This research uses the Miles and Huberman data analysis method, which consists of four stages: data collection, data reduction, data display, conclusions, and verification ((Maulidina, Linda. Mardiana, Tria. & Supriyatna, Ari. (2021)). The study's results can also be used to evaluate the benefits and disadvantages of applying formative assessment to teacher competency development.

## RESULTS

The classroom observations show that teachers actively implement formative assessment strategies that are varied and appropriate to the learning objectives, reflecting improved pedagogical skills. Interviews with teachers revealed that they feel more confident and competent in designing and implementing formative assessments thanks to their training. Documentation of formative assessment results showed significant improvements in students' understanding and learning outcomes, which were in line with the assessment and feedback provided by teachers.

### a. Formative Assessment Planning

At the beginning of each year, MI Darul Ulum Ngaliyan Semarang City teachers gather to plan lessons. Decisions reached in this early-year meeting include

the curriculum that will be implemented at the school in 2023/2024. The Merdeka curriculum will be implemented for first grade and grade IV, while the 2013 curriculum will be implemented for grades II, III, V, and VI. In addition, they will implement the Takhasus Curriculum and the Diniyah Takmiliyah Awaliyah Curriculum, which are the hallmarks of the madrasah. The Deputy Head of Madrasah for Curriculum reminded teachers to create learning tool documents that include assessment tools that are appropriate to their respective tasks.

Mrs. Dewi said that formative assessment planning is carried out after learning or completion of each sub. The form of implementation of the sub-program: if there is an oral, then use oral. If the planning is written, then I provide LKPD. If I plan a group, then there is also a group assessment. So it adjusts each planning per sub material."

The development of teachers' pedagogical competence through formative assessment planning carried out by MI Darul Ulum Ngaliyan Semarang City teachers is:

1. Identify the curriculum that will be implemented during the school year.
2. Develop lesson plans for the 2013 curriculum and teaching modules for the Merdeka curriculum.
3. Formulating assessments, including assessment techniques (attitude assessment, knowledge assessment, and skills assessment), then compiling the form of assessment instruments.
4. Make a grid of assessment questions (see Table 1).
5. Formulating the assessment score.

   $$\text{Score} = \frac{\text{Earned Score}}{\text{Maximum Score}} \times 100$$

6. Make an assessment rubric.
7. Making an attitude assessment journal.
8. Having a scorebook.
9. Has a student remedy and enrichment book (see Table 2).
10. Has a grade analysis book.
11. Has a question bank book.

**Table 1** Table Lattice of Daily Test questions

Subject:

Grade:

Semester:

Time: … minutes

| Basic Competencies | Material | Problem Indicator | Question readings | Form | No. |
|---|---|---|---|---|---|
|  |  |  |  |  |  |

**Table 2** Improvement and Enrichment Programs

Minimum completion criteria:

Class/semester:

Standard competencies:

| No. | Name | Value | Complete | | Follow-up | Implementation | Value after remedy |
|---|---|---|---|---|---|---|---|
|  |  |  | Yes | No |  |  |  |
|  |  |  |  |  |  |  |  |

Knowing,
Classroom,

Semarang, April 8, 2023 Principal
Teacher,

(_____)

(_____)

**Table 3** Table Repeat Results Analysis Program

Sample Report

Repeat Results Analysis Program

Name of Madrasah Ibtidaiyah

| No. | Name | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 | Value | Information |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 2 |  |  |  |  |  |  |  |  |  |  |  |  |  |

Mengetahui
Kepala Sekolah

Semarang,…………
Guru

(_____)

(_____)

**Table 4** Table Repeat Results Analysis Program

Madrasah......................

School Year:

Subject / KKM       : ................/70.........

KD /CP            : ..............................

Semester         :..............................

| No. | Name | 10 | 20 | 30 | 40 | 50 | 60 | 70 | 80 | 90 | 100 | Value | Information |
|-----|------|----|----|----|----|----|----|----|----|----|-----|-------|-------------|
| 1 | | | | | | | | | | | | | |
| 2 | | | | | | | | | | | | | |
| 3 | | | | | | | | | | | | | |

Mengetahui                        Semarang,.............

Kepala Sekolah                Guru

(_____)              (_____)

In the 2013 curriculum, the format of the score list consists of title, madrasah name, semester, number, student name, subject, class, and knowledge (KI.3), which consists of daily tests per KD and block Tests. Skills (KI.4) consisting of performance/practice, portfolio, and assignments/projects, as well as report card grades and information. The filling of grades in the curriculum 2013 uses numbers/letters according to the description.

In the Merdeka curriculum, the format of the score list consists of title, madrasah name, semester, number, student name, subject, class, final summative assessment (ASA) material that contains assessments per end of CP, semester ASA that contains non-tests, tests (PTS, PAS), formative assessments consisting of assignments/projects, portfolios, and observations, as well as report card grades (number grades), information. Summative assessment score filling: using numbers, formative assessment using letters: BB (not yet developed), MB (starting to develop), BSH (developing as expected), and SB (very developed).

The development of pedagogical competence carried out by MI Darul Ulum Ngaliyan teachers in Semarang City is in line with research conducted by Miftahul Jannah, whose findings are the development of the Pedagogical Competency Profile Includes mastery of educational science, understanding and

developing the potential of students, planning and implementing learning, and learning evaluation systems (Miftahul Jannah, Na'imah. (2022).

## b. *Organization of Formative Assessments*

The organization of formative assessment in the madrasah, either the 2013 or the Merdeka curriculum, is left to each class teacher. In the 2013 curriculum, the organization of formative assessment is daily assessment/repetition per KD (basic competency). Meanwhile, the Merdeka curriculum is an assessment and formative assessment at the end of the CP (learning outcomes).

Organizing formative assessment shows that classroom and subject teachers have the autonomy to organize formative assessment, depending on the ability and understanding of educators to provide feedback to find out the strengths and weaknesses of learners.

## c. *Implementation of Formative Assessment*

The implementation of formative assessment in madrasah is left to each teacher. Teachers have the freedom to formulate the assessment and when to give it to students. The formative assessments conducted by the majority of teachers in the madrasah in Semarang City are knowledge assessment, skill assessment, and affective assessment. Knowledge assessment conducted by MI Darul Ulum Ngaliyan teachers include:

**1. Knowledge Assessment**

a) Written Test (multiple choice, essay, and description)

b) Homework

c) Oral Test

d) Daily Test

e) LKPD

**2. Skill Assessment**

a) Performance/practice

b) Portfolio

c) Task/Project

d) LKPD

**3. Affective Assessment**

a) Teacher observation

b) Peer observation

c) Attitude recording

### d. Formative Assessment Supervision

The supervision of formative assessment in MI Darul Ulum Ngaliyan Semarang City is done through internal supervision and external supervision. Internal supervision is carried out by the Head of the Madrasah, senior teachers, and or teachers who understand the material to observe the teacher teaching, then write in the supervision journal and provide input.

The time of internal supervision is carried out once a month, or if there is a busy leadership, it is done once every two months. At every meeting at the beginning of the month, the madrasah head reminds and appeals to teachers to improve their competence always.

Meanwhile, external supervision is carried out by madrasah supervisors, namely checking the administration of learning devices, which includes assessment tools, then the teacher's handbook, the process of teachers conducting learning, and supervisors providing input on which teachers need to be improved.

## Discussion

### a. Formative Assessment Planning

Good curriculum planning is a rigorous and continuous process to maintain the quality of learning and ensure that the materials match the learning objectives and the needs of society ((Rosdiana et al.., 2021). What to do, why to do it, how to do it, where to do it, and when to do it are five issues that must be resolved in the design process because the right design will help carry out the vision and mission of the institution (Nur Khikmah, (2020).

Mrs. Dewi said that formative assessment planning is carried out after learning or the completion of each sub. The form of implementation is from the sub-program. If there is an oral, then use oral. If the plan is written, I will provide the LKPD (Learner Worksheet). If I plan a group, there is also a group assessment. So, each plan is adjusted per sub-material. Gathering information, making plans, making initial product forms, and conducting initial tests, revisions, and trials are some of the ways that can be used to develop formative assessment models ((Ediyanto. (2016)).

Planning also includes building student readiness, designing lesson plans/teaching modules, using assessment methods, media, learning resources, time allocation, and formative assessment ((Wahid Hasim, Kusen Kusen, Hartini Hartini, Mirzon Daheri, (2021)). The most important formative assessment planning is designing the curriculum that will be used in the school and then creating assessment tools and assessment books.

The development of teachers' pedagogical competence through formative assessment planning that has been carried out by MI Darul Ulum Ngaliyan teachers is in the form of a question analysis book because in addition to the numbers that must be stated in the students' learning outcomes book, teachers must also make a description of the formative assessment of students using letters: BB (not yet developed), MB (starting to develop), BSH (developing as expected), and SB (very developed).

Formative assessment planning is a crucial step in developing teachers' pedagogical competence as it determines how assessment will be conducted to support effective learning processes. Formative assessment is designed to provide continuous feedback to students and teachers during the learning process, which helps improve teaching methods and increase student understanding. At MI Darul Ulum Ngaliyan, careful planning ensures that formative assessment can be implemented with clear objectives and appropriate strategies.

Teachers develop learning objectives based on the applicable curriculum, with an emphasis on the competencies to be developed through formative assessment. For example, objectives may include improving reading skills or understanding math concepts. Teachers design varied assessment instruments, including short quizzes, group tasks, and oral tests, which are relevant to the teaching materials and are able to measure students' understanding thoroughly.

Teachers create a formative assessment schedule that is aligned with the lesson plan. This schedule includes the frequency and types of assessments to be conducted during the learning period. Teachers set assessment rubrics that outline the criteria and standards of achievement for each assessment instrument, making it easier for students to understand expectations and improving the quality of feedback.

Feedback from formative assessments is used to adjust teaching methods, improve areas that need more attention, and design additional activities that support student learning. Based on the evaluation results, teachers make adjustments to the formative assessment plan to address the identified shortcomings and improve the strategies implemented.

Formative assessment planning at MI Darul Ulum Ngaliyan is a key element in developing teachers' pedagogical competence. With good planning, teachers can carry out formative assessments effectively, provide constructive feedback, and support continuous improvement of student learning. Regular evaluation and adjustment ensure that planning remains relevant and responsive to student's needs and the changing learning context.

### b. *Organization of Formative Assessments*

The process of planning, organizing, and coordinating human and non-human resources in an organization to achieve organizational goals effectively and efficiently is known as organizing ((Nur Khikmah, (2020)). Organizing formative assessment in schools involves educators' understanding, planning, implementation, and appropriate use of technology. This understanding can help in the design and implementation of formative assessments that suit the needs and characteristics of the school community (Rati, Dasri. Suryanef. Montessori, Maria. (2019).

The organizing stages include (1) knowing the goals of the institution, (2) determining the activities needed to achieve the goals of the institution; (3) determining the types of activities that are gathered in one work unit; (4) determining the functions, duties, authorities, and responsibilities of each work unit; (5) determining the personnel (number and expertise) of each work unit; and (6) establishing working relationships between work units ((Nur Khikmah, (2020)).

The organizing process that has been carried out at MI Darul Ulum Ngaliyan is that each class teacher and subject teacher has the duty and responsibility to make formative assessment instruments from each subject to measure the strengths and weaknesses of students and then follow up on improvements by finding the right formula in implementing learning strategies and reporting to the head of the madrasah.

Organizing formative assessment is a key step in ensuring that assessment can be implemented effectively and supports learning objectives. At MI Darul Ulum Ngaliyan, organizing formative assessment involves various aspects, from the administrative structure to the practical implementation in the classroom. The following is a discussion of the organization of formative assessment and its impact on developing teachers' pedagogical competence:

1. Formative Assessment Organizational Structure: Develop a work plan that includes individual responsibilities, an assessment schedule, and a mechanism for reporting assessment results.

2. Administration and Documentation: Organizing administration and documentation is important to ensure formative assessments are conducted in a structured manner, and assessment data is well managed. Manage documents related to formative assessment, such as assessment rubrics, assessment reports, and supervision notes.

3. A high administrative workload can reduce the time available to focus on formative assessment. MI Darul Ulum Ngaliyan teachers should develop a realistic schedule and prioritize administrative tasks to ensure focus on organizing formative assessments.

The organization of formative assessment at MI Darul Ulum Ngaliyan is an important aspect of developing teachers' pedagogical competence. With a clear structure, good administration and effective implementation, formative assessment can support the learning process and provide constructive feedback for students. Periodic evaluation and adjustment help ensure that formative assessment remains relevant and effective in achieving learning objectives.

### c. Implementation of Formative Assessment

It is the activity of mobilizing the minds and energies of human resources, both involved and uninvolved, to work together in carrying out planned activities to enable organizations to achieve their goals effectively and efficiently. This is one of the many stages of the management function. The mobilizing and executing function is also known as motivating; directing; influencing; and commanding ((Siagian, S. P. (2012)).

Learning is the process of developing the potential and character building of each learner as a result of the cooperation of education in schools, families and communities. This process provides opportunities for learners to develop their potential into attitudes (spiritual and social), knowledge, and skills needed for themselves to live and prosper ((Peraturan Menteri Pendidikan Dan Kebudayaan Republik Indonesia Nomor 103 Tahun 2014).

This is in accordance with the three domains of educational assessment, namely:

1. Cognitive Domain: This domain discusses the assessment of student learning outcomes related to their cognitive abilities. Assessment in this domain focuses on assessing student learning outcomes, especially those related to cognitive abilities.

2. Affective Domain: Attitude assessment is part of the affective domain. This assessment aims to assess students' attitudes towards something or a particular situation.

3. Psychomotor Domain: Assessment of students' physical skills or movements is the subject of the psychomotor domain. The purpose of this assessment is to find out how well students can perform physical actions or movements ((Ramadhani, Raja Hulan Dari. Ramadan, Zaka Hadikusuma. (2022)).

In the implementation of formative assessments, it is crucial for teachers and school authorities to ensure that formative assessments are conducted using appropriate assessment tools. This also allows them to use technology to track the implementation of formative assessments and conduct accurate and fit-for-purpose evaluations to achieve the best results for students ((Dudi Kurnia, Asep. (2022)).

The implementation of the formative assessment conducted by MI Darul Ulum Ngaliyan teachers has been adjusted to achieve the three domains of educational assessment, namely the cognitive, affective and psychomotor domains. In addition, the assessment instrument has also been well designed and implemented during learning to measure strengths and weaknesses and improve subsequent learning.

The implementation of formative assessment at MI Darul Ulum Ngaliyan is an important step in developing teachers' pedagogical competence. This process includes implementing planned assessment strategies, collecting assessment data, and using feedback for learning improvement.

Implementing formative assessment strategies involves implementing the designed assessment instruments and adjusting the assessment methods to the learning needs in the classroom. Assessment data collection involves the process of recording and storing information on student assessment results for further analysis. Store assessment results in an organized and accessible format, such as digital records or scoring tables, to facilitate monitoring and evaluation. Maintain documentation on assessment methods used, frequency of implementation, and student responses to assessments.

The use of feedback from formative assessment is an important part of the continuous improvement process in teaching. Then, analyze the feedback given to students to identify areas of strength and weakness in learning. Based on this analysis, adjust teaching strategies and materials to meet the identified needs of students.

The implementation of formative assessment at MI Darul Ulum Ngaliyan is an important element in developing teachers' pedagogical competence. By implementing effective assessment strategies, collecting and using assessment data well, as well as evaluating results and providing constructive feedback, teachers can improve the learning process and support students' continuous development. Continuous evaluation and improvement in the implementation of formative assessment helps ensure that this method remains relevant and effective in achieving educational goals.

## d. Formative Assessment Supervision

Supervision as an effort to ensure what is being done by assessing the results or achievements achieved, and making immediate improvements if there are deviations from predetermined standards so that all results or achievements achieved are in accordance with the plan ((Handayaningrat, S. (2007)).

Principal Supervision: The principal is responsible for ensuring that educational activities are directed toward the set goals. Principals can supervise through various monitoring and control activities that improve the performance of

teachers and education personnel ((Al-Fatih, Muhammad. Aisaura, Ezra. Dkk., (2022)).

Academic Supervision of School Supervisors: In addition, school supervisors are responsible for carrying out academic supervision. They are responsible for helping educators improve their ability to manage the learning process effectively and efficiently. The purpose of school supervisors' academic supervision is to help educators improve their ability to manage the learning process effectively and efficiently ((Iswanto. Mubarok, Ramdanil. (2022)).

This is in line with the supervision activities that have been carried out at MI Darul Ulum Ngaliyan where internal supervision is carried out by the madrasah in observing the learning process, examining certifying the assessment documents that have been made by teachers and providing input. External supervision is carried out by madrasah supervisors, namely checking the teacher's handbook, observing the learning process and providing some input from the findings obtained.

Formative assessment supervision is an important aspect in ensuring that assessments are conducted in accordance with established standards and provide maximum benefit to students. At MI Darul Ulum Ngaliyan, formative assessment supervision involves various activities to monitor, evaluate and improve the quality of assessment implemented by teachers.

The purpose of formative assessment supervision is to ensure that the assessment process is conducted in a consistent, fair and effective manner. Supervision aims to improve the quality of assessment and student learning outcomes, and support the development of teachers' pedagogical competencies.

The supervision mechanism involves various activities carried out to monitor and evaluate the implementation of formative assessment, including direct observation in the classroom to see how formative assessment is carried out by teachers. Checking assessment documents such as rubrics, assessment results, and feedback notes to ensure that the assessment is carried out in accordance with predetermined criteria. Providing constructive feedback to teachers regarding their assessment practices, including aspects that need improvement and strengths that need to be maintained.

Supervision of formative assessment at MI Darul Ulum Ngaliyan plays an important role in improving teachers' pedagogical competence. By implementing effective supervision mechanisms, conducting regular evaluation and feedback, and planning and implementing necessary improvements, the school can ensure that formative assessment is well implemented and provides maximum benefit to student learning. Systematic and constructive supervision also supports teachers' professional development and helps in creating a more effective learning environment.

## CONCLUSION

The results show that the development of teachers' pedagogical competence through formative assessment management of MI Darul Ulum Ngaliyan is shown by:

a. Formative assessment planning: 1) Identify the curriculum that will be implemented during the school year. 2) Making lesson plans (learning implementation plans) for the 2013 curriculum and teaching modules for the merdeka curriculum. 3) Formulating assessments, including assessment techniques (attitude assessment, knowledge assessment, and skills assessment), then compiling the form of assessment instruments. 4) Make a grid of assessment questions. 5) Formulate assessment scores. 6) Make an assessment rubric. 7) Make an attitude assessment journal. 8) Have a score book. 9) Have a student remidi and enrichment book. 10) Have a score analysis book. 11) Have a question bank book.

b. Organizing formative assessment: the organization of formative assessment in madrasah, either the 2013 curriculum or the merdeka curriculum, is left to each class teacher. In the 2013 curriculum, the organization of formative assessment is a daily assessment per KD (basic competency). Meanwhile, the merdeka curriculum is an assessment per CP (learning outcome).

c. Implementation of formative assessment: the implementation of formative assessment in madrasah is left to each teacher. Teachers have the freedom to formulate assessments and when to give them to students. Formative assessments conducted include: 1) Knowledge Assessment: written test (multiple choice, essay, and description), homework, oral test, daily test, and LKPD. 2) Skill Assessment: performance/practice, portfolio, task/project, and LKPD. 3) Affective Assessment: teacher observation, peer observation and attitude recording.

d. Fomative assessment supervision: internal supervision is carried out by the Head of Madrasah, senior teachers and or teachers who understand the material to see, observe the teacher teaching, then write in the supervision journal and provide input. Internal supervision is conducted once a month, or every 2 months. External supervision is conducted by madrasah supervisors.

## REFERENCES

Adella, Maryanti, Dwi Setyo. Rifai, Rizkania Fauziyah. (2020). Analisis Evaluasi Formatif dalam Pembelajaran IPA di Kelas 4 SDN 07 Pagi Tegal Alur. FONDATIA, 4(1), 141-149. https://doi.org/10.36088/fondatia.v4i1.457.

Al-Fatih, Muhammad. Aisaura, Ezra. dkk., (2022). Optimalisasi Peran Kepala Sekolah Dalam Pelaksanaan Supervisi Pendidikan Di SD 1 Mardiatul Islamiah Medan.

JOURNAL ANALYTICA ISLAMICA: Vol. 11 No. 1. 68-78. : http://dx.doi.org/10.30829/jai.v11i1.11705.

Amri, Mukh Saeful. (2022). Peningkatan Kompetensi Pedagogik Guru Dalam Menyusun Administrasi Penilaian Berbasis K-13 Melalui Supervisi Akademik. DWIJA Cendekia: Jurnal Riset Pedagogik. 6(3). 601-611. https://doi.org/10.20961/jdc.v6i3.68843.

Chaerunnisa, Luq Yana. (2022). Penilaian Formatif Berbasis Karakter Saat Pembelajaran Daring DI MI Miftahul Akhlaqiyah Bringin Semarang. Faktor : Jurnal Ilmiah Kependidikan, 9(2). ISSN 2355-5475 (Electronic) │ISSN 2355-5467 (Print). 9(2), 132-138. http://dx.doi.org/10.30998/fjik.v9i2.12125.

Chairawati, Fajri. (2014). Evaluasi Pembelajaran di IAIN Ar-Raniry, Fakultas Dakwah. Jurnal Al-Bayan, Vol. 20, No. 29, 15–32. Bersumber dari: https://doi.org/10.22373/ALBAYAN.V20I29.113.

Dewi, Lathifa Utami. Irwandi, Dedi. Bahriah, Evi Sapinatul. (2021), Pengaruh Media Penilaian Formatif Online Quizizz Terhadap Hasil Belajar Siswa Materi Sistem Periodik Unsur. Jurnal Riset Pendidikan Kimia (JRPK), 11(1), 19 - 26. https://doi.org/10.21009/.

Dudi Kurnia, Asep. (2022). Implementasi Penilaian Formatif Dalam Pembelajaran Bahasa Inggris Tatap Muka Terbatas Untuk Meningkatkan Motivasi Belajar Siswa. STRATEGY : Jurnal Inovasi Strategi Dan Model Pembelajaran, 2(1), 67-77. https://doi.org/10.51878/st.

Ediyanto. (2016). Siklus Prapembelajaran Model Penilaian Formatif Web Based Pada Pembelajaran Fisika Materi Suhu dan Kalor Untuk Siswa SMK Kelas X. Jurnal Pendidikan Fisika Indonesia. Vol.12 No.2. 126-136. https://doi.org/10.15294/jpfi.v12i2.5906.

Firmansyah. (2022). Pentingnya Penilaian Pendidikan Karakter Anak Usia Dini. Jurnal Ilmiah Mandala Education. Vol.8 No.3. 2550-2554. http://dx.doi.org/10.58258/jime.v8i3.3827.

Hairunnisa. Rowayati, Mega. Winarti, Sri. (2023). Kompetensi Pedagogik Mahasiswa Pendidikan Guru Madrasah Ibtidaiyah Dalam Merancang Pembelajaran. 3(2). 165-180. https://doi.org/10.37680/basica.v3i2.4552        .

Handayaningrat, S. (2007). Pengantar Studi Ilmu Administrasi dan Manajemen. Jakarta: Bina Aksara.

Hitu, Jehan Ananda Aliyah Kapitan. Isnaini, Muhammad. (2017). Pengaruh Bentuk Tes Formatif dan Sikap Belajar Terhadap Hasil Belajar Membaca Bahasa Arab. Arabi: Journal of Arabic Studies. Vol. 2 No.1. 48-53. https://doi.org/10.24865/ajas.v2i1.25.

Iswanto. Mubarok, Ramdanil. (2022). Fungsi Supervisi Kepala Unit Taman Pendidikan Al Qur'an (TPQ) Terhadap Kinerja Guru Al Qur'an. Tarbiyah Wa Ta'lim: Jurnal Penelitian Pendidikan dan Pembelajaran. Vol.9 No.1. 29-40. https://doi.org/10.21093/twt.v9i1.3940.

Kamil, Ahmad Insan. Basuki, Sunarno. Sofyan. (2022). Tingkat Pemahaman Guru PJOK Mengenai Penilaian Formatif Pada Tingkat SD Negeri Se-Kecematan Batang Alai Selatan. Stabilitas: Jurnal Pendidikan Jasmani dan Olahraga. Vol. 3 No.3, 13-16. https://doi.org/10.20527/mpj.v3i3.1523.

Konsolina. (2022). Meningkatkan Kompetensi Guru Dalam Menyusun Administrasi Penilaian Melalui Penerapan Supervisi Akademik di SD Inpres XXXVII Kota Uneng. Inspirasi Dunia: Jurnal Riset Pendidikan dan Bahasa. 1(4). 1-12. https://doi.org/10.58192/insdun.v1i4.171.

Lestari, P. D. J. P., Bahrozi, I., & Yuliana, I. (2023). Kompetensi Pedagogik Guru dalam Pelaksanaan Kurikulum Merdeka. Jurnal Review Pendidikan Dasar : Jurnal Kajian Pendidikan Dan Hasil Penelitian, 9(3), 153–160. https://doi.org/10.26740/jrpd.v9n3.p153-160.

Magdalena, Ina. Oktaviani, Siti Nurani. Octaviana, Putri. & Ningsih, Pingkan Ayu.(2020). Menganalisis Pelaksanaan Evaluasi Formatif Siswa di MI Nurul Huda Kota Tangerang. NUSANTARA, 2(3), 487-495. Retrieved from https://ejournal.stitpn.ac.id/index.php/nus.

Maulidina, Linda. Mardiana, Tria. & Supriyatna, Ari. (2021). Analisis Metode Pembelajaran IPA Dalam Pembelajaran Jarak Jauh Saat Wabah Covid-19 Di Sekolah Dasar. Khazanah Pendidikan, 15(1), 42-50. https://doi.org/10.30595/jkp.v15i1.9838.

Miftahul Jannah, Sukiman, Na'imah. (2022). Kajian Sistem Penilaian Portofolio Berdasarkan Kompetensi Pedagogik Guru. Aulad: Journal on Early Chilhood. Vol. 5 Issue 1. 105-110. https://doi.org/10.31004/aulad.v5i1.273.

Moleong, Lexy J. (1993). Metode Penelitian Kualitatif. Bandung: PT Remaja Rosdakarya.

Nurdin, S. M., Azizah, V., & Veronica, Z. (2023). Hubungan Antara Kompetensi Pedagogi Guru Sekolah Dasar dengan Implementasinya pada Penerapan Kurikulum Merdeka Belajar di Sekolah Dasar dan Sekolah Penggerak. JIIP - Jurnal Ilmiah Ilmu Pendidikan, 6(6), 4077-4084. https://doi.org/10.54371/jiip.v6i6.2133.

Nurjannah. (2017). Efektivitas Bentuk Penilaian Formatif Disesuaikan Dengan Media Pembelajaran, Jurnal Pendidikan Universitas Negeri Jakarta (PARAMETER). ISSN:0216-261X. Vo. 29 No.1. 75-90 https://doi.org/10.21009/parameter.291.08.

Nur Khikmah, (2020). Manajemen Sarana Prasarana Untuk Mengembangkan Mutu Pendidikan. JAMP: Jurnal Administrasi dan Manajemen Pendidikan. 3(2). 14-21. http://dx.doi.org/10.17977/um027v3i22020p123.

Peraturan Menteri Pendidikan dan Kebudayaan Republik Indonesia Nomor 103 Tahun 2014 tentang Pembelajaran Pada Pendidikan Dasar dan Pendidikan Menengah hlm. 2.

Purwatiningsih, Nunuk. (2020). Meningkatkan Kompetensi Pedagogik Guru Melalui Supervisi Akademik. Faktor Jurnal Ilmiah Kependidikan. 7(3). 221-228. http://dx.doi.org/10.30998/fjik.v7i3.7722.

Putri, Cindy Ayuna. AR, Amirul. (2023). Pengaruh Asesmen Formatif, Peran Guru, dan P5 Dalam Kurikulum Merdeka Terhadap Hasil Belajar Siswa AKL. Edunomia: Jurnal Ilmiah Pendidikan Ekonomi. Vol.4 No.1. 81-87. https://doi.org/10.24127/edunomia.v4i1.4877.

Rahayu, Hira Sopiyani. (2013). Penerapan Penilaian Portofolio Pada Pembelajaran IPA Materi Cuaca SDN Buahbatu Kabupaten Bandung Barat. Universitas Pendidikan Indonesia. repository.upi.edu.

Ramadhani, Raja Hulan Dari. Ramadan, Zaka Hadikusuma. (2022). Implementasi Penilaian Ranah Sikap Dalam Kurikulum 2013 Pada Mata Pelajaran Pendidikan Agama Islam Di Sekolah Dasar. Mimbar PGSD Undiksha Volume 10, Number 1, Tahun 2022, pp. 17-25 P-ISSN: 2614.

Ramadhanti, Mutiara Purnama. Musringudin, (2022). Evaluasi Pembelajaran Dalam Jaringan di Sekolah Dasar. Indonesian Gender and Society Journal, 3(2), 47–52. https://doi.org/10.23887/igsj.v3i2.49838.

Rati, Dasri. Suryanef. Montessori, Maria. (2019). Pelaksaan Penilaian Formatif Dalam Pembelajaran PPKN Di SMP N 2 LENGAYANG. Journal of Civic Education, 2(1), 106-115. https://doi.org/10.24036/jce.v2i1.106.

Ratnawati Susanto. (2021). Pengembangan Aplikasi Penilaian Profil Kompetensi Pedagogik Berdasarkan Matriks Peta Diri Berbasis Web. JPPI (Jurnal Penelitian Pendidikan Indonesia. Vol.7 No. 2. 172-180. https://doi.org/10.29210/020211167.