

Enhancing the Quality of Learning “Teacher Leadership” Through Lesson Study Activity

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Abstract: The main purpose of this research is to elaborate the enhancement of the quality of learning teacher leadership by implementing the Problem Based Learning Model using teacher leadership video. The research was conducted based on the procedures for the Lesson Study consisting of the acts to plan, do, and see. The research took place at the Faculty of Teacher Training and Education, Universitas Pakuan, in November 2015. The research subjects were the first semester students of Bachelor Degree Program majoring in Primary Teacher Education Program. The data were collected through documentation, observation, and formative test. The instruments were observational and formative test sheets. The data collected from observation and tests were analyzed descriptively to figure out the form of teaching learning process which then was used for improving the learning on teacher leadership. The research finding shows that the quality of learning teacher leadership has significantly enhanced after applying the lesson study activities which are evidenced by some indicators such as successfully- achieved objectives, the good quality of learning process, and active participation from the students. The research finding also recommends that applying lesson study is effectively beneficial in teaching and learning process.

1 INTRODUCTION

Preparing themselves to be teachers and effective leaders, particularly during their teaching, the students of Primary Teacher Education Program (PGSD) should understand and master the right concept of teacher leadership. Being powerless and ineffective teachers would give negative influences to not only their students, but also the overall results of education.

Teacher leadership is becoming the key to student success. Therefore, the understanding on teacher leadership should be able to help teacher to achieve the objectives. Through the understanding of the teacher leadership concepts, how it brings benefits, what makes it ineffective, and the strategies to overcome the ineffective teacher leaderships, teacher can do the teaching professionally.

1.1 Theoretical Background

1.1.1 Teacher Leadership

Teacher leadership has existed since the teaching profession existed (Schools, 2015), all educators

have a positive view of teacher leadership (de Villiers and Pretorius, 2011), teacher leadership is the key to achieving school improvement (Harris, 2017).

The teacher leadership is not only about the teacher's performance, but also about the choice of profession which affects the education reform and students' ways of learning (Suwaidi and Schoepp, 2015). As a matter of fact, it can effectively motivates the students to learn (Al-Jabari et al., 2014), as the teacher's ability to generate some influences when teaching (Lowery-moore., 2016).

1.1.2 Lesson Study

Lesson study is teaching about learning how to learn (Isoda, 2010), to improve teachers' professionalism through the learning and the students' learning method (Rock et al., 2005). Lesson study is used to develop teacher knowledge and improve teaching (Cerbin and Kopp, 2006).

Lesson Study is recognized as a successful methodology in improving learning (Pjanić, 2014), Lesson Study is a popular approach to teacher professional development that was originally used in Japan (Richard and Felix, 2016), Lesson Study

provides a forum for teachers to collaborate and engage in new pedagogical practices (Suilleabhain, 2015).

1.1.3 Problem Based Learning (PBL)

PBL is a framework for integrating cooperative learning and problem-based learning (Yusof et al., 2012), schools must adapt the PBL because of its benefit (Argaw et al., 2017), PBL is an efficient learning strategy, especially in the context of science learning (Gorghiu et al., 2015).

In implementing the PBL there are 9 steps: Set goals and objectives, Conduct content specification, Select PBL problem, Conduct PBL problem affordance analysis, Conduct correspondence analysis, Conduct calibration processes, Construct reflection, Examine inter-supporting relationships (Hung, 2009), the implementation of PBL has proven to be self-directed way, involving technical, organizational and social skills (Chounta et al., 2017), students are more active, initiative and interactive in discussion (Lei, 2016).

2 RESEARCH METHODOLOGY

This research tried to reveal whether the implementation of *lesson study* activity which portrays the learning situation on teacher leadership subject matter using *problem based learning* (PBL) model. The Video aid was used as a media to improve the students' learning. In addition, students consider the cause of the ineffectiveness of teacher leaderships and figure out the solutions. The *lesson study activity* was conducting to observe and improve the learning in the Primary Teacher Education Program (PGSD) of Faculty of Teacher Training and Education (FKIP) of Universitas Pakuan in 4 cycles.

The respective cycles carried out the steps of *lesson study* i.e.: *Plan, Do and See*. Each cycle comprises three steps: First, introduction which consists activities conducted in 10 minutes. Second, the core activity which consists of video playing and *Problem Based Learning* application. The third step was closing session, conducted in 15 minutes where the exemplary lecturer provides a formative test to figure out the students' level of comprehension. The steps were conducted in 4 cycles by evaluating and improving the quality of learning "teacher leadership" in each cycle.

The implementation of *lesson study* was conducted on 23 and 24 November 2015 during the

course of primary education management on the topic of *teacher leadership*. This research applied descriptive method while the data was collected through documentation, observation and formative sheet test.

3 RESULTS AND DISCUSSION

3.1 Cycle 1 Results

Each cycle was conducted in three different steps. First: Introduction; at this stage student were provided with knowledge about leadership criteria such as firm, smart, nationalist, and creative.

Second: The core activities consisted of several activities such as the exemplary lecturer's explanation about teacher leadership, teacher leadership video playing, group discussion, and group presentations.

To conclude the explanation on teacher leadership, the exemplary lecturer asked the students to read the *slides* from the projector and figure out the meaning. Students show the enthusiasm for such questions. Based on their responses, it was clear that the students successfully gained understanding and knowledge about the concept of teacher leadership and the positive impacts of teacher leadership on students.

After watching the videos for 2 times along with the students, the exemplary lecturer asked the students to explain how the teacher leadership might bring negative influence on the students. Regarding the less effective teacher leaderships, a representative of each group voluntarily expressed their opinion and what prompted them to say it.

The exemplary lecturer in the group discussion asked the students to figure out the reasons behind the effectiveness of teacher leaderships and the exemplary lecturer asked every member of the groups to state an argument. Among several causes coming into the stage, the lecturer then asked the group to select one, which was identified as the main cause and the reasons behind it. Afterwards, the chairman of each group presented the result of their discussion.

Third: Closing; the exemplary lecturer administered a formative test to figure out the students' level of comprehension, and concluded the meeting by asking the students to prepare a conclusion. The results of test were overall good and the students were able to conclude the materials.

The stage of *see* or reflection in the research was conducted immediately after the *open lesson*. The

exemplary lecturer, observers and students jointly evaluated the learning process. The conclusion of the *see* stage of cycle 1 is as follow: overall, cycle 1 was successfully conducted and this was evidenced by the high appreciation from the observers, moderator, and the minutes of the exemplary lecturer as well as the students who participated in the learning. However, some drawbacks were also found:

First: During the learning process, there were many books and bags on the table which might disrupt. Second: When discussing video, the exemplary lecturer allowed any high-spirited student to express their opinion which accordingly hampered the lecturer to measure the other students' competence who might be reluctant to express their ideas. Third : The presentations were only performed by the chairmen. Thus, when other groups raised some questions, the presenting group was not able to provide immediate response as the presenter stood at a distance from his group. All these drawbacks of the learning process in cycle 1 would be taken into account for improvement in the cycle 2.

3.2 Cycle 2 Result

The stage of *plan* was due to the recommendation in the reflection of cycle 1. The team tailored the lesson plan by reflecting all drawbacks in cycle 1. The following is the point of learning stages carried out by the exemplary lecturer in the *open lesson* of cycle 2.

First: Introduction, where the exemplary lecturer started the lesson in a similar way to that of cycle 1. However, the exemplary lecturer of cycle 2 asked the students to clear the table from all stuff, and to have a seat in a relaxed manner. This preliminary activity resulted in the students' understanding of several criteria of the nation leaders that being a leader required one to be authoritative, intelligent, assertive and religious.

Second: The core activity (85 minutes) where the exemplary lecturer carried out several activities similar to those in cycle 1 which consisted of the exemplary lecturer's explanation of the material regarding teacher leadership aided by slides and projector, video watching on the topic, the group discussion figuring out the cause of the ineffectiveness of teacher leadership and the group presentation.

To conclude the explanation on teacher leadership, the exemplary lecturer asked the students to read the *slides* from the projector and figure out

the meaning. At this, the lecturer directly assigned a student to read the slides and express his opinion about the content. In the case that the student failed to see the intended meaning, the exemplary lecturer would assign another to provide different idea.

After watching the videos 2 times with the students, the exemplary lecturer asked the students to explain how the teacher leadership might bring negative influence. In contrast with cycle 1, regarding the less effective teacher leaderships, a representative of each group voluntarily expressed their opinion and what prompted them to say it.

During the group discussion on the solutions for the main cause, the exemplary lecturer asked each member of the group to state one solution. Each group then presented the results of their discussion, whereas other group questioned the effectiveness of the solutions.

Third: Closing (15 minutes): the exemplary lecturer provided a formative test to figure out the students' level of comprehension, and concluded the meeting by asking the students to prepare a conclusion.

After the stage of *do*, the next stage was to perform *see*. The stage of *see* or reflection in the research was conducted immediately after the *open lesson*. The exemplary lecturer, observers and students jointly evaluated the learning process. The result of the *see* stage in cycle 2 was as follow:

First: There were some students who took notes during the learning, whereas noting was not required. Second: Some members of the group did not understand the lesson as they for example, were not engaged in active discussion and did not express their opinion. This happened because the problem based learning was applicable for students with relatively homogeneous ability. Third: There were some students who when appointed directly felt shocked and responded nervously. This happened because of their distinctive mental preparedness and prior knowledge. All drawbacks in the learning process of cycle 2 were taken into account for the improvement in the cycle 3.

3.3 Cycle 3 Result

The stage of *plan* of cycle 3 was due to the recommendation in the reflection of cycle 2. The team tailored the lesson plan by reflecting all drawbacks in cycle 2.

First: Introduction, where the exemplary lecturer started the class the way exemplary lecturer did in cycle 2. The lecturer asked the students to clear the table from any stuffs and make no notes during the

lesson. He, then, carried out the apperception and motivational encouragement by prompting questions regarding the name of the characters of the groups.

Second: The core activity, where the exemplary lecturer performed some activities similar to those in cycle 1 and 2. To conclude the explanation on teacher leadership the exemplary lecturer asked the students to read the slides from the projector and figure out the meaning. During this activity, the exemplary lecturer both assigned the students directly and asked the students to voluntarily read and figure out the meaning of what they read.

On watching the video twice, the exemplary lecturer both assigned the students directly and provided them with opportunities to figure out the meaning of negative teacher leaderships and expressed their opinion voluntarily.

During the group discussion, the exemplary lecturer carried out the same procedure as that of cycle 1 and 2 by asking the students to figure out the reasons behind the ineffectiveness of teacher leaderships and by asking every member of the groups to state an argument. Among several causes coming into the stage, the lecturer then asked the group to select one, which was identified as the main cause and what were the reasons behind it.

Third: Closing, the exemplary lecturer provided a formative test to figure out the students' level of comprehension, and concluded the meeting by asking the students to prepare a conclusion.

After the stage of *do*, the next stage was to perform *see*. The stage of *see* or reflection in the research was conducted immediately after the *open lesson*. The exemplary lecturer, observers and students jointly evaluated the learning process. The result of the *see* stage in cycle 3 was as follow:

First: Providing many opportunities to respond voluntarily only engaged only few students.

Second: The less homogeneous students caused other students to be less adaptive to the problem based learning approach. Third: The class room was too big and less conducive, causing several students studied in an unfavourable atmosphere. All drawbacks in the learning process of cycle 3 were taken into account for the improvement of the cycle 4.

3.4 Cycle 4 Result

The stage of *plan* of cycle 4 was due to the recommendation in the reflection of cycle 3. The team tailored the lesson plan by reflecting all drawbacks in cycle 3. The following is the point of

learning stages carried out by the exemplary lecturer in the *open lesson* of cycle 4:

First: Introduction, where the exemplary lecturer did activities similar to cycle 1, 2, and 3. The results of the stage were overall good and successful.

Second: The core activity, where the exemplary lecturer carried out several activities similar to those in cycle 1, 2, and 3 which consisted of the exemplary lecturer's explanation of the material regarding teacher leadership aided by slides and projector, video watching on the topic, the group discussion regarding the cause of the ineffectiveness of teacher leadership and the group presentation.

To conclude the explanation on the teacher leadership, the exemplary lecturer asked the students to read the slides from the projector and figure out the meaning. During this activity, the exemplary lecturer both assigned the students directly and proportionally and asked the students to voluntarily read and figure out the meaning of what they just read. This combination resulted in a more conducive atmosphere for studying.

On watching the video, the students only watched the video once as they said they have understood the content of the video. Afterwards, the exemplary lecturer proportionally assigned students directly and provide the students with room to figure out the impact of the negative teacher leaderships on the students. During the group discussion, the exemplary lecturer did activities similar to those of cycle 1, 2 and 3 i.e. asking the students to figure out the underlying reasons of the less effective teacher leaderships. As he did in cycle 2 and 3, after the group discussion, the exemplary lecturer asked a group as well as all members to present the results of the group discussion.

During the group discussion on the solutions for the main cause, the exemplary lecturer asked each member of the group to state one solution. As they did in cycle 2 and 3, the group presented their results whereas others questioned whether those solutions were appropriate to overcome the main cause.

Third: Closing, the exemplary lecturer provided a formative test to figure out the students' level of comprehension, and concluded the meeting by asking the students to prepare a conclusion.

After the stage of *do*, the next stage was to perform *see*. The stage of *see* or reflection in the research was conducted immediately after the *open lesson*. The exemplary lecturer, observers and students jointly evaluated the learning process. The result of the *see* stage in cycle 3 was as follow:

First: The room for responding and the direct assignment should be given proportionally to

support a conducive learning atmosphere which encouraged all students to learn. Second: The problem based learning approach should be applied based on the understanding that students were relatively homogeneous. Third: There should be a room of good atmosphere to facilitate students' comfort in learning

3.5 Discussion

This research has proved that *lesson study* through the application of *problem based learning* using video aid in the course of education management on the topic of teacher leaderships was well-implemented. The indicators of this *lesson study* consisting of *plan*, *do* and *see* have been well satisfied. The implementation of this *lesson study* would be very beneficial for the learning process in universities.

Based on the purposes of the *lesson study* above, it is evident that the *lesson study* is beneficial for the foregoing 4 issues. As an example, several notes about the students that were recorded by the observers during this *lesson study* may help other lecturers who were directly or indirectly involved in the *lesson study* improve their teaching method. Importantly, the lesson study has proven that to improve their skills, lecturers may learn from the way students learn.

The implementation of lesson study was a success as the team of *lesson study* and the observers cooperated well in the project. The ability of the lesson study team, the observers and the institution to cooperate will draw a better academic atmosphere in universities. Therefore, the Lesson study would facilitate the establishment of a learning community which is essential.

This research has revealed that the students' learning result was good. Based on the 4 cycles in the lesson study, the students were able to understand more than 90% of the all materials regarding the teacher leaderships. Therefore, it is evident that the *problem based learning* (PBL) approach with video aid is appropriate to use during the course of teacher leadership for PGSD students of semester one.

The research finding is in line with a research stating that Problem-Based-Learning (PBL) has ability to improve Physics result study (Atan, Sulaiman, and Idrus 2005), it effectively leads teachers to analyze problems, discuss alternative solutions, and offer alternative ways for teachers to teach in any real conditions (Wulandari, 2014), it also helps the students to improve their academic

performance in understanding the concepts of gas. (Bilgin et al., 2009), improving the education system is a priority in Indonesia (Hidayat and Patras, 2013)

4 CONCLUSIONS

Based on the foregoing learning process, it can be concluded that the quality of learning teacher leadership has significantly enhanced after applying the lesson study activities which are evidenced by three major indicators: First, the implementation of the *lesson study* is evidently effective for the learning process in the course of education management on the topic of teacher leadership conducted in the PGSD, where in each cycle the learning improves and shows significant progress on the understanding of teacher leadership. Second, in general, the *lesson study* was well-implemented and successful as indicated by the fact the exemplary lecturer team, observers, and the results of the integrated learning were successfully achieved. Third, the *lesson study*, based on the reflection (*see*), has encouraged the team of the exemplary lecturer and the observers to improve their professionalism through the learning and the students' learning method. The research finding also recommends that applying lesson study is effectively beneficial in teaching and learning process.

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