

A New Approach In The Professional Development Of Prospective Visual Arts Teachers: A Lesson Study Model

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Abstract

One of the most important skills for students to use, starting from the preschool period and throughout their lives, is art education. The quality of visual arts teachers, who aim to develop students' knowledge and skills in terms of art, is highly important in this process. It is believed that the knowledge and experience that prospective visual arts teachers before service will enable them to be more effective and successful teachers while serving. In this study, it was aimed to evaluate the professional development of prospective visual arts teachers within the framework of a lesson study. In this study, which was conducted as a case study with a qualitative research model, the participants consisted of 6 prospective visual arts teachers, which included 4 males and 2 females. Within the scope of the study, the data were obtained by using interview forms. Out of these data, codes and themes were obtained by using the content analysis method. As a result of this study, which covered a total period of 8 weeks, it was concluded that the professional development of prospective visual arts teachers was positively developed. It was observed that the lesson study model contributed to the knowledge and skills of prospective visual arts teachers in terms of lesson planning, method-technique, assessment-evaluation and cooperation. According to these results, suggestions, such as professional knowledge lessons that are practical, can be conducted within the framework of a lesson study, were presented.

Keywords: Visual Arts Teacher, Lesson Study Model, Professional Development, Art Education

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INTRODUCTION

Art education starts from preschool periods and continues throughout the educational lives of students. Within this period, the responsibility of visual arts teachers to transmit arts education to students effectively. Therefore, visual arts teachers are required to practice the teaching profession efficiently and productively. At the same time, art educators are required to own the same level of professional development as educators of other disciplines (Aalison, 2013). It is believed that being a fine artist is not solely enough to provide art education (Kırıçoğlu, 2002). This is because art education is a field where many values, definitions and approaches about both arts and education interact with each other (Heilig, Cole and Aguilar, 2010). Therefore, disciplines such as art history, art criticism, aesthetics and practice, can be expressed as mandatory and significant fields to consult to teach art in a more efficient and better way (Özsoy, 2003). For visual arts teachers to be successful, it is required of them to develop themselves in these fields.

The role of teachers is vital in shaping the future of societies. Training qualified teachers, which is one of the turning points for the change in this direction, has gained importance. Training teachers, who will shape future societies, depends on education faculties (Erdem, 2013). The main aim of the art teaching department within the body of education faculties is to train visual arts teachers. It is vital for prospective teachers who are trained in this department to learn teaching practice lessons efficiently in addition to receiving a qualified education (Özsoy, 1997).

The success of prospective teachers in their experiences increase their self-efficacy in conducting the teaching profession. Therefore, prospective teachers require successful experiences in terms of training qualified art educators (Evans-Palmer, 2016). Furthermore, cooperation-based practices positively affect the professional development of art educators (Lind, 2007). From this point of view, novel models, which enable prospective visual arts teachers to develop and follow themselves professionally and provide them with successful experiences while cooperating with other prospective teachers, are required. One of these models is the lesson study model, which greatly attracts the attention of education systems in recent periods.

The lesson study model is a professional development model that has been traditionally practiced mainly in Japan and other Eastern Asia countries for many years (Saito and Atencio, 2013). The recognition of this model in other countries than Eastern Asia countries occurred with the Ph.D. thesis written by Yoshida in 1999 and the emergence of videos prepared by Stigler and Hiebert at the same years within the framework of Japan's PISA and TIMSS exams (Saito, 2012; Takahashi and Yoshida, 2004). Since the beginning of the 21st century, the interest in the lesson study model has greatly increased in other regions of the world, mainly in America and Europe (Dudley, 2013). In recent years, it was observed that the lesson study model also gained a place in studies that were conducted within the framework of prospective teachers or the professional development of prospective teachers in Turkey (Aykan, 2019; Baki, 2012; Gözel, 2016; Kurt, 2016; Yıldız, 2013).

The lesson study model covers a cyclical process where a group of teachers or prospective teachers cooperatively conduct a lesson plan, observe the practice of a lesson, evaluate the lesson plan at the end of the lesson and rearrange the lesson plan and practice the lesson again (Fernandez, 2005; Fujii, 2014; Lewis, 2002; Norwich and Ylonen, 2015). In this process, teachers or prospective teachers come together and prepare a lesson plan. The prepared lesson plan is implemented in the classroom by a member of the group. During the implementation, the other group members conduct observations in the lesson and take notes. After the lesson, all of the group members come together and conduct an evaluation meeting. During the meeting, the suggestions of the group members are presented and the lesson plan is rewritten in line with the suggestions. The new lesson plan obtained is implemented again. This cyclical process can be maintained based on the volunteerism principle until the best lesson plan is obtained (Alvine, et al., 2007; Dudley, 2011).

For the educational activities to become successful, teachers who are qualified and continuously develop and renew themselves in professional terms are required. It is believed that one of the most significant ways to achieve such a teaching staff is to train prospective teachers to become

qualified individuals. In recent times, it is observed that countries, such as China, Singapore, Japan and South Korea, come to the forefront with gradually increasing success in international exams and provide professional development based on the lesson study model to prospective teachers and teachers in both preservice and in-service processes. It is understood that one of the most crucial elements in the successes of these countries that are successful in the international scene is the lesson study model. In Turkey, it is believed that the initiation of lesson study practices, especially for prospective teachers, will be a vital step in the way of achieving qualified teaching staff. It is believed that teaching the lesson study model to prospective teachers in each department of education faculties and the constant practice of this model will provide important contributions to them in professional terms. When national and international literature is examined, it was observed that there was no study conducted on the subject of lesson study practices to provide professional developments for prospective visual arts teachers. Therefore, the current study was designed with the basis of recognizing and implementing the lesson study model for prospective visual arts teachers.

METHOD

It is observed that a majority of the studies conducted within the framework of the lesson study model adopted qualitative research methods (Aykan and Kınca, 2015). This current study is also a qualitative study that investigates the roles of the lesson study model in the professional development of prospective visual arts teachers according to their perceptions of prospective teachers. In the study, the single case study design, which is one of the qualitative method designs, was used. The single case study model covers studies that a phenomenon, a program, an institution or a group with a prepared framework is investigated thoroughly (Creswell, 2007; Merriam, 2013). It is aimed to describe the researched phenomenon in the case study richly and intensely (Merriam, 2013).

Study Group

The study group was created from 6 prospective teachers, who studied at the 4th grade and received “teaching practice” lesson within the framework of the art teaching department in the Education Faculty at Van Yüzüncü Yıl University during the 2019-2020 education period. The participating prospective teachers included 4 males and 2 females. Each participant was chosen according to the volunteerism principle. The study group in this research was determined by adopting the purposive sampling method, which is commonly used in qualitative research. With this method, it was aimed to include the most suitable individuals in the study, according to the problem situation of the study.

Data Collection Tools

Based on the aim of the study, it was decided to conduct interviews with the prospective visual arts teachers before and after the education program design was implemented. Accordingly, it was decided to use the interview forms, which was developed by Aykan (2019) for prospective teachers who studied in the classroom teaching program. The chosen interview form was first presented for expert opinion by two visual arts experts. In line with the opinions of the experts, the required revisions were carried out and the form was conducted with the prospective visual arts teachers. Additionally, for the other forms used in the implementation of the lesson study model, the Ph.D. thesis of Aykan (2019) was utilized.

Data Collection Process

The determined interview forms were implemented at two different times during the study. Based on the aim of the study, the first stage of data collection was conducted before the lesson study model was introduced and implemented via semi-structured interview forms conducted with the prospective teachers. In this interview, the prospective teachers were asked about their perceptions towards professional development, lesson planning, method-technique, assessment-evaluation and cooperation. Then, at predetermined dates, the prospective teachers were introduced with the lesson

study model via a total of 3-hour lessons. After it was ensured that the prospective teachers obtained sufficient information about the subject, the lesson study model was implemented. Within the framework of the teaching practice lesson, each participant of the determined group was assigned topics at the 9th grade level with the cooperation of the instructor of the lesson and the responsible visual arts teacher in the school. The prospective teachers were asked to prepare lesson plans according to the determined subjects within cooperation. Then, within the framework of the determined lesson plan, the lesson study model was implemented 2 hours a week for four weeks. After the lesson study model was implemented, the data were collected from prospective teachers via semi-structured interview forms. In this interview, the prospective teachers were asked about the lesson study model, the model and designing lesson plans, the model and method-technique, the model and assessment-evaluation and finally, the model and cooperation. The data collection process was presented in detail in Figure 1 below.

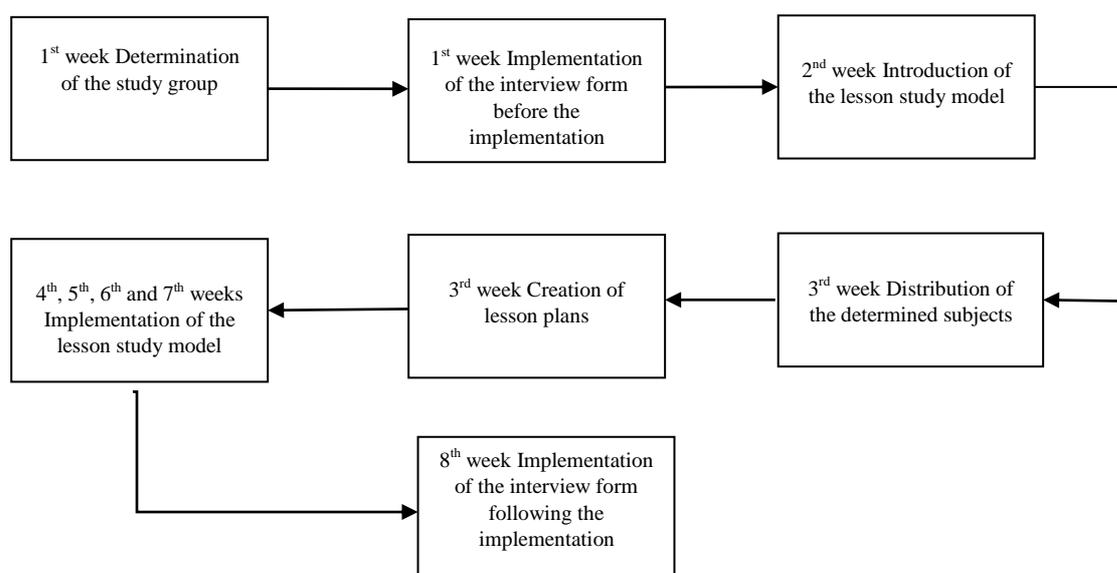


Figure 1: Data Collection Process

Data Analysis

The data collected in this study were analyzed by the content analysis method within the framework of qualitative research. The content analysis is conducted within four steps, which include coding the data, finding themes, arranging codes and themes, identifying findings and interpreting them (Yıldırım and Şimşek, 2011).

The real identities of the prospective teachers whose perceptions were obtained were kept confidential. Male prospective teachers were coded as PTM1, PTM2, etc. while female prospective teachers were coded as PTF1, PTF2, etc. Then, the collected data were separately analyzed by two experts. The experts classified the collected data under the research questions that were accepted as themes. In the next stage, similar studies in the literature, in line with the aim of the study, were examined and a draft code list was created. Then, the data text was read line by line and new codes were obtained based on inductive comprehension. The new codes obtained were compared with the old codes and the draft code list was revised accordingly. This process was led by two different coders. The code lists created by two coders were compared with each other and the coherent codes were determined. The codes were coded differently were discussed and a common conclusion was reached.

To ensure the reliability of the study, the inter-coder consistency was analyzed between coders. Accordingly, the formula developed by Miles and Huberman (2015) (reliability percentage =

[number of agreements / (agreements + disagreement) X 100]) was used. In the analysis of the interview before the lesson study, the ratio of coherent codes between the two coders was determined as 82% while this ratio was 83% after the lesson study. Additionally, to increase the validity of the data and ensure that the presented themes and codes are understood by readers, the expressions of the participants were asked and direct quotations were presented.

FINDINGS

The findings obtained from the interviews were presented in detail in Table 1 and Table 2 below. In Table 1 below, the findings obtained regarding the perceptions of the prospective visual arts teachers towards professional development, lesson plan, teaching method-technique, assessment-evaluation and cooperation were presented.

Table 1. Findings regarding the perceptions of prospective visual arts teachers towards professional development

Theme	Codes	Perception Frequency (f)
Perceptions towards professional development	Subject matter knowledge	7
	Approach to students	3
	Managing the education process	3
	Personal and professional development	2
Perceptions towards lesson plans	Knowing the levels of the students	5
	Knowing constructivism	4
	Using the time well	3
	Possessing subject matter knowledge	2
Perceptions towards method-technique	Conducting practices in the field	6
	Receiving education from experts	4
	Making effort personally	2
Perceptions towards assessment-evaluation	Receiving help from experts	5
	Conducting practices in the field	3
Perceptions towards cooperation	Conducting professional cooperation	5
	Receiving help via cooperation	4

When Table 1 was examined, the perceptions of prospective teachers towards professional development can be observed generally. It was recognized that the expression of the prospective teachers regarding professional development included a major emphasis on subject matter knowledge. Additionally, some of the expressions of the prospective teachers that emphasized approaches to students, the ability to manage the educational process and the importance of ensuring professional development personally are as the following: “(Teachers) *should develop themselves in their field*” (PTF2), “*It can be by conducting more research, developing themselves about their field*” (PTF1), “*At the same time, (teachers) should develop themselves about how to behave towards students and what to do in the lesson*” (PTM3).

When the perceptions of the prospective teachers towards lesson plans were examined, it was observed that they emphasized the necessity to lesson plans that are suitable to the levels of the students. The prospective teachers, who emphasized that the constructivist approach should be considered while preparing lesson plans and attention should be paid to time management, underlined that field knowledge should be possessed. Some of the example perceptions that expressed the thoughts of prospective teachers are as the following: “*At first, the determined subject should be prepared according to the class’s level*” (PTM1), “*On the other hand, plans that can keep the students in the lesson and activate them should be prepared*” (PTM2), “*At first, the teacher should master the subject to be taught*” (PTM4).

It was recognized that prospective teachers, who underline the importance of conducting practices in the field and receiving education from experts in their perceptions towards teaching method-techniques, emphasized the importance of personal effort. Within this scope, some of the expressions of the prospective teachers are as the following: “*To develop teaching methods and techniques, it is necessary to conduct one-on-one practices in the classroom environment*” (PTM1), “*I think, we can develop field-specific methods and techniques by receiving help from expert teachers in*

the visual arts lessons. It is necessary for us to frequently practice the knowledge we obtain from experts” (PTM3), “It is necessary to conduct more research and practice on this subject” (PTF1).

When the perceptions of the prospective teachers towards assessment-evaluation, it was understood that they emphasized on the importance of receiving help from experts as well as conducting practices in the field. Some of the example expressions provided by the prospective teachers within the framework of assessment-evaluation are as the following: *“We can benefit from the experiences of individuals with more experience by bringing them to classroom environments” (PTF1), “By benefiting from the teachers with more experience, I can develop my assessments and practices” (PTF2), “We can develop the theoretical information we receive in schools by practicing them in classroom environments” (PTM3), “To develop assessment skills, we can do this by gaining experiences in classroom environments first” (PTM1).*

When the expressions of the prospective teachers regarding cooperation were evaluated, it was understood that they emphasized the importance of cooperating with other prospective teachers or teachers and receiving help via cooperation within the framework of professional development. Some of the example expressions of the prospective teachers are as the following: *“At first, we unavoidably share information with other friends and teachers while preparing lesson plans. When our peers are not necessary on the subject, we cooperate with experienced teachers by consulting them” (PTM2), “To develop knowledge and skills about different methods and techniques, we can act more comfortably by cooperating” (PTM1), “We cooperate with our friends who are prospective teachers. We obtain results that are more efficient. While preparing lessons or teaching subjects, we first receive help from our friends” (PTF1).*

The data were collected by the semi-structured interview forms which were conducted with the prospective visual arts teachers who learned about the lesson study model and practiced it. The findings obtained from the analyses of the data were presented in detail in Table 2 below.

Table 2. Findings regarding the perceptions of prospective visual arts teachers towards the lesson study model

Theme	Codes	Perception Frequency (f)
Contributions of the model in terms of professional development	Provided contributions to personal and professional development	9
	Developed my cooperation skills	3
	Developed my skills to cope with difficulties	3
Contributions of the model in terms of lesson plans	Developed my skills to prepare lesson plans	6
	Developed my skills to implement lesson plans	3
Contributions of the model in terms of methods-techniques	Developed my knowledge about method-technique	6
	Developed my implementations of method-technique	6
Contributions of the model in terms of assessment-evaluation	Developed my assessment-evaluation knowledge	8
	Developed my lesson evaluation practices	6
Contributions of the model in terms of cooperation	I ensured my professional development via cooperation	5
	I learned about my deficiencies via cooperation	4

In Table 2, it can be observed that the prospective teachers emphasized the contributions of the lesson study model to professional development. When the expressions of the prospective teachers were evaluated in detail, it was understood that they emphasized the significant contributions of the model to both their personal development and professional development. Furthermore, the prospective teachers, who stated that the cooperation within the model affected their perceptions towards cooperation positively, expressed that they gained new knowledge and skills in professional terms via cooperation. Some of the example expressions of the prospective teachers are as the following: *“I think, it is a fine model. At least, by using this model, we can ensure an effective lesson practice of the visual arts lesson”. (PTM2), “We can learn from our mistakes and conduct better lesson presentations” (PTM4), “This model is a rather efficient one. It shows our deficiencies to us. With cooperation, it presents us with opportunities to correct our deficiencies in a more comfortable way” (PTF2).*

From the expressions of the prospective teachers, it was understood that the lesson study model contributed to their knowledge in preparing lesson plans and their skills to conduct lesson plans positively. The prospective teachers stated that they learned about the important points of preparing lesson plans during the implementation process of the model and they recognized their mistakes while implementing the plan. Some of the expressions of the prospective teachers within this scope are as the following: *“I believe that the professional development model provided positive contributions to our skills to plan lessons”* (PTM1), *“I believe that this model has a lot of contributions. How can we conduct a lesson most efficiently? Of course, we can do it by planning the lesson. See, this model teaches how to conduct lesson planning practically”* (PTM2), *“Thanks to the professional development model, we recognize the mistakes in a short time and we develop our skills on the subject by making a new plan right away”* (PTM3).

The prospective teachers, who stated that the lesson study model developed their knowledge and skills about teaching method-technique positively, emphasized that they also recognized the troubles that can be experienced during the implementation of methods-techniques thanks to the model. Some of the example expressions of the prospective teachers within this scope are as the following: *“While implementing the chosen method and technique in the lesson, certain troubles may emerge. In the next implementation, we can recognize our mistakes and choose more accurate methods and techniques via cooperation”* (PTM3), *“We learned about methods and techniques that we did not know about or could not remember via cooperation and conducted them in a better way”* (PTF2), *“We can practice how we can implement the methods and techniques during the lesson in a more efficient way by exchanging information with our friends”* (PTM2).

When the statements of the prospective teachers were evaluated, it was understood that the lesson study model provided positive contributions to their assessment-evaluation knowledge and evaluation practices. The prospective teachers, who stated that they observed different examples of how a lesson is evaluated in this process, also underlined that they recognized their deficiencies within this framework. Some of the example statements of the prospective teachers are as the following: *“In the lesson process, we theoretically learned about how the evaluation is conducted. Thanks to this model, we had a chance to see our deficiencies by conducting more practices”* (PTM1), *“With the lesson study professional development model, I believe it created a positive effect on our process to evaluate the lesson. We gained practical experiences”* (PTF1), *“We observe whether the students understood the subject and our deficient sides”* (PTF2).

When the statements of the prospective teachers were evaluated, it was understood that they emphasized the positive contributions of the cooperation within the framework of the lesson study model. The prospective teachers, who emphasized that the cooperation during the model provided contributions to their development, stated that they recognized their professional deficiencies in professional aspects via this cooperation. Some of the example statements of the prospective teachers within this framework are as the following: *“We conducted our presentations by considering different ideas. In addition to things that we know, when we considered our friends’ ideas, we recognized our deficiencies”* (PTM1), *“We cooperated with different individuals and we obtained information about how we can teach a subject in a better way”* (PTM2), *“Thanks to the cooperation, I recognized my deficient or weak points”* (PTM4).

DISCUSSION, CONCLUSION, RECOMMENDATIONS

The prospective visual arts teachers, in their statements regarding professional development, mentioned topics such as possessing subject matter knowledge, being careful about their approaches to students, managing their education process well and ensuring professional development personally. The prospective teachers who learned about the lesson study professional development model and practiced it emphasized that this model contributed to their personal and professional development, cooperation skills and their skills to cope with difficulties. The fact that the cooperation environment provided by the lesson study model contributed to the sharing of knowledge and skills is regarded as the most important factor in obtaining these results. Moreover, it was understood that the cooperation-based environment in this process provided opportunities for unity for the prospective teachers in

terms of overcoming the difficulties within the teaching activities. It is observed in the literature that many studies indicated that the lesson study model contributed to the professional development of prospective teachers (Aykan, 2019; Hall, 2014; Juhler, 2016; Lewis, 2009; Tan, 2014).

From the statements of the prospective visual arts teachers, it is understood that they emphasized the importance of knowing the levels of the students, constructivist approach and managing the time effectively in addition to the importance of possessing a comprehensive subject matter knowledge in preparing lesson plans. It was understood that the prospective teachers who learned about the lesson study model and implemented it emphasized that the model developed their skills to prepare lesson plans and implement the designed plans. The lesson study model provides an opportunity for the prospective teachers to prepare lesson plans cooperatively and observe these plans with a critical point of view. The prospective teachers, who attempted to render the lesson plan more efficient following the lesson with the implementation and observation, gained opportunities to improve their knowledge and skills about lesson plans in this process. When the literature was examined, it was observed that many studies obtained findings of the fact that the lesson study model contributed to the skills of prospective teachers and teachers to prepare lesson plans and implement these plans (Angelini and Alvarez, 2018; Aykan, 2019; Diem and Thathong, 2019; Leavy and Hourigan, 2016).

When the findings of the study were examined, it was understood that the prospective teachers conducted practices, received education from experts and conducted research with their effort to develop their knowledge about methods-techniques. It was observed that the prospective teachers who learned about the lesson study model and implemented it gained opportunities to develop their knowledge and practices about methods-techniques thanks to the model. The prospective teachers who come together with other prospective teachers and learn about different and novel teaching methods-techniques also observed the implementation styles of these methods-techniques. This interactive and cooperative environment, which was presented by the lesson study model, provides opportunities for the prospective teachers to benefit from each other's experience. It is observed that the literature contains studies which stated that the lesson study model contributed to prospective teachers and teachers in terms of teaching methods-techniques (Alvine, Judson, Schein and Yoshida, 2007; Aykan, 2019; Gonzalez and Deal, 2016; Larkin, 2017; Mitchell, 2017).

Regarding the findings of the study, it was understood that the prospective visual arts teachers attempted to develop their knowledge about assessment-evaluation by receiving help from experts and conducting practices in their fields. It was understood that the prospective teachers who learned about the lesson study and implemented it emphasized that their knowledge and skills about assessment-evaluation developed positively thanks to the model. It was observed that the prospective teachers who implemented the cyclical process of the lesson study model learned different ideas and suggestions about assessment-evaluation in this process. Additionally, in this process, the prospective teachers who gained opportunities to observe assessment-evaluation practices of other prospective teachers learn how to observe their practices critically as well. It is observed that the literature contains studies which concluded that the lesson study model contributed to the assessment-evaluation practices of prospective teachers and teachers (Akerson, Pongsanon, Rogers, Carter and Galindo, 2017; Aykan, 2019; Cohan and Honigsfeld, 2007; Mitchell, 2017).

When the statements of the prospective visual arts teachers were evaluated, it was understood that they emphasized that, although not frequently, they worked in cooperation to share their professional knowledge and skills and to receive help about certain subjects. From the statements of the prospective teachers who learned about the lesson study model and implemented it, it was understood that they emphasized that they ensured their professional development and recognized their deficiencies thanks to the cooperation in this process. It is thought that the fact that the lesson study model is cooperation-based provided opportunities for the prospective teacher who implemented the model to develop both their cooperation skills and to improve their professional development. When the literature was examined, it was observed that there were studies which concluded that the cooperative environment of the lesson study model provided significant achievements to prospective

teachers and teachers (Akiba, Murata, Howard ve Wilkinson, 2019; Aykan, 2019; Coenders and Verhoef, 2019; Collet and Greiner, 2020).

Based on the findings obtained in the study, it was understood that the prospective visual arts teachers in the study found the lesson study model positive. Accordingly, it is believed that it will be beneficial to practice the model within the teaching practice lesson, which is included in the education programs of education faculties. Additionally, opportunities for the visual arts teachers to learn about the lesson study model and practice it by in-service training activities. Furthermore, environments for the prospective visual arts teachers, visual arts teachers and experts to implement the lesson study model together can be created. Studies that investigate the contributions of the lesson study model to the professional development of visual arts teachers and students' achievement in visual arts lessons can be conducted.

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