

Effectiveness of the Project Based Learning Model in Increase the Quality of Collage Work and Creativity of Class X Students of SMA Negeri 1 IV Koto, Agam Regency

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ABSTRACT

Objective: This research aims to analyze the effectiveness of the implementation of Project Based Learning (PjBL) in improving the collage work outcomes of Class X.E3 students at SMA Negeri 1 IV Koto, Agam Regency. **Method:** The research used a quantitative approach with a pretest-posttest design. Data were collected through observation, documentation, and work assessment. Data analysis was carried out descriptively using average scores and learning completeness percentages. **Results:** The research results show a significant improvement after the implementation of the PjBL model. The average score of students increased from 13.8 to 18.61, while learning completeness increased from 46.87% to 93.75%. In addition, there was an improvement in creativity, responsibility, technical ability, and the aesthetic quality of the collage works produced by the students. **Novelty:** The findings show that the PjBL model is effective for collage learning because it is able to encourage active student involvement, develop creative thinking skills, and improve the quality of visual art work outcomes.

INTRODUCTION

Education has role strategic in form source Power capable human being adapt with change social, cultural and developmental knowledge knowledge. According to Constitution Number 20 of 2003 concerning National Education System, education aim develop potential participant educate to become individuals who are faithful, knowledgeable, creative, independent and responsible answer. The purpose confirm that the learning process No only mastery - oriented knowledge, but also on development skills and character.

In context education art, creativity is competence main thing that is needed developed. Creativity allows participant educate produce idea new, solve problem in a way innovative, as well as express experience and imagination through visual works. Fono explains that learning art give room for participant educate For develop ability think divergent through activity creation works that are personal and contextual [1].

One of material art appearance that has potential big in develop creativity is collage is work two - dimensional art created through the process of compiling and pasting various material so that form a complete visual composition. Destiana stated that activity collage capable practice motor skills, accuracy, sensitivity aesthetics, and ability blend visual elements become meaningful work [2].

Although This, the practice learning art appearance at school Still often dominated by methods conventional teacher- centered learning model like This tend limit room exploration participant educate so that creativity and ability work No develop optimally. Conditions was also found in participants educate class X.E3 SMA Negeri 1 IV Koto which shows quality work relative collage low, good from aspect composition, creativity, and aspect aesthetic.

As alternative solution problem, Project Based Learning (PjBL) is looked at relevant For implemented in learning collage. Thomas defines PjBL as a learning model that places participant educate in situation Study based project so that they involved active in the process of investigation, planning, implementation, and evaluation [3]. Larmer, Mergendoller, and Boss added that PjBL capable increase motivation learning, skills think critical, and ability collaborative participant educate [4].

Various study previously show that PjBL influential positive to creativity and results Study in learning art culture [5]. However Thus, research that is special study effectiveness PjBL on material collage at level school medium on Still relatively limited. Therefore that, research This done For analyze influence application of the Project Based Learning model to quality work collage participant educate class X.E3 SMA Negeri 1 IV Koto, Agam Regency.

RESEARCH METHOD

Study This use approach quantitative with pretest- posttest design. Approach quantitative chosen Because allows researchers obtain objective data through measurement results Study before and after application of learning models.

Study held at SMA Negeri 1 IV Koto, Agam Regency in the even semester year academic year 2025/2026. Subject study is participant educate class X.E3 who participated learning art culture in material collage.

Research data obtained through observation, documentation, and assessment work. Observation done For know level participation, creativity, and involvement participant educate during the learning process ongoing. Documentation used For obtain supporting data in the form of Photo activities, devices learning and results work participant education. Assessment work done use rubric that includes aspect creativity, quality product, responsibility answer, work the same, and ability apply elements art appearance.

Data analysis was performed in a way descriptive quantitative. The average value is used For know trend results Study participant educate, whereas percentage completeness used For determine level success learning. Comparison between pretest and posttest results used For identify influence application of the Project Based Learning model to results work collage participant educate.

RESULTS AND DISCUSSION

Results

1. Initial Learning Conditions

Before implementation of Project Based Learning, learning process collage Still dominated method conventional. Teachers play a role as source main information, whereas participant educate tend follow instructions given without Lots do exploration of ideas [6]. Conditions the impact on low creativity and quality the work produced.

Assessment results beginning show that part big participant educate Still experience difficulty in determine draft work, choose appropriate materials, as well as compile visual composition in harmonious. The resulting work tend simple and less show individual characteristics.

2. Implementation Learning Based Project

Implementation PjBL implemented through a number of stages, namely identification project, planning, implementation, monitoring, presentation results, and evaluation [7]. At this stage beginning participant educate given freedom For determine the idea of the work in accordance the set theme. Next they compile design, choose materials, and develop draft work in a way independent and group.

During the process, the teacher functions as facilitator who provides direction and guidance. Participant educate seen more active in discuss, explore ideas, and finish problems that arise during the manufacturing process collage.

Results work collage student can seen in the image below This:



Figure 1. Work 1: Decorated Female Figure.

This work display level very high complexity and neatness. Form face, accessories, hair, and clothes formed very clearly and precisely. Use color red light, red, gold, and blue arranged with very fine gradation, showing ability student understand mark beauty

and balance. Attachment technique done very closely so that No seen gap empty even a little bit.



Figure 2. Work to 2: Tigers in the Wild.

Theme of the work These are wild animals, especially the tiger depicted is at in the environment forest. The dominant colors used are orange, black, white, blue, and green, adjusted with color original animals and the environment surrounding areas. Seeds with size A little varies used For differentiate texture body tiger and background behind plant as well as sky. Compilation done with differentiate density attachment For create depth effect, part background behind more loose, whereas part object main more meeting. This work highlight beauty of fauna and richness nature.



Figure 3. Work to 3: Village View.

This work show mastery excellent composition and spatial arrangement. Form house, road paths, trees, and sky arranged with harmonious. Students succeed differentiate color bright For sky and color land For streets, creating atmosphere peaceful and beautiful scenery. The shape building seen proportional and neat.



Figure 4. Work to 4: Deer and Flowers.

In the deer work, the form horns, body, and flowers around it formed very detailed and alive. Use color background contrasting back make object main looks very prominent and artistic.



Figure 5. Work to 5: Silhouette Figure Wearing White.

Details of face, hat and tie looks very clear and firm. Use color dark and light give effect extraordinary dimensions and depth usual. Neatness attachment and clarity the line shape shows level very high accuracy.

3. Improving Learning Outcomes

Analysis results study show existence significant improvement after implementation PjBL. Average value of participants educate increase from 13.8 at stage beginning to 18.61 after implementation learning based project. Percentage completeness learning also increases from 46.87% to 93.75% [8].

Observation Result Score Data Indicator Initial Attitude and Creativity (pretest)

Table 1. Observation Results of Students' Self-Confidence and Persistence

No	Aspects observed	Meeting 1	Meeting 2	Average score	presentation
1.	Believe self	1.05	1.63	1.56	39%
2.	Not easy give up	1.38	2.13	1.75	44%
	Average	1.44	1.88	1.66	41%

Based on results assessment at the stage initial (pretest), indicator believe self get an average score of 1.56 with percentage of 39%, while indicator No easy give up get an average score of 1.75 with percentage 44%. In general overall, average score indicator attitude and creativity student reached 1.66 with percentage of 41%. The results show that attitude and creativity student Still is in the category start growing. Most of student Still not enough believe self in put forward ideas and not yet show optimal persistence when face difficulty in the manufacturing process work collage. Therefore Therefore, more learning strategies are needed student - centered For increase confidence self, creativity, and perseverance in work [9].

Table 2. Comparison of Pretest and Posttest Results on the Observed Aspects

Observed Aspects	Pretest	Posttest	Improvement
Self -confident	39%	77%	38%
Not easy Give up	44%	86%	42%
Image Shapes and Objects	45%	84%	39%
Use of Color	59%*	83%	24%
Overall Average	43.5%	82.5%	39%

Based on results assessment at the stage posttest, ability art appearance student experience very significant improvement compared to with condition beginning. Indicator shapes and objects picture increase from 45% in the pretest to 84% in the posttest. The increase This show that student has capable form object in a way more proportional, clear and appropriate with specified theme [10]. In addition, the neatness as well as accuracy placement materials in the work collage is also visible the more Good.

On the indicator use color, percentage achievements increase from 59% to 83%. This result show that student the more capable blend color in a way harmonious, creating gradation attractive colors, as well as utilise color experience material collage For strengthen mark aesthetics work [11].

In a way overall, average ability art appearance student increase from category start developing at the pretest stage to become category progressing very well in stages posttest. Improvement the show that effective implementation of the Project Based Learning (PjBL) model in develop skills technical and aesthetic students on the material collage [12]. Through learning based project, students get chance For plan, explore, and complete work in a way independent so that produce more works creative, neat, and valuable art tall [13].

Discussion

Research result show that Project Based Learning has significant contribution to improvement results work collage participant education. Findings This in line with Thomas stated the view that learning based project give chance to participant educate For build knowledge through experience direct [3].

Improvement creativity discovered in study This can explained through characteristics main PjBL which provides room freedom to participant educate For determine ideas and problem-solving strategies project. Freedom the allows emergence various idea new that is not found in learning conventional. With Thus, the learning process become more meaningful Because participant educate involved in a way active in every stage creation work [14].

From the perspective theory constructivism, improvement results Study happen Because participant educate get chance For build understanding through activity real. They No only accept information in a way passive, but also doing exploration, experimentation, and reflection to results obtained. Activities the strengthen understanding conceptual at a time increase skills practical [15].

Findings research also shows existence improvement in aspects character. Participants educate become more responsible answer to the tasks given, more believe self in convey ideas, and more independent in finish work. This result strengthen Larmer et al.'s opinion which states that PjBL No only increase achievements academic, but also developing competence social and character participant educate [4].

From the side aesthetics, the work produced show improvement visual quality. Participants educate capable organize elements of line, color, shape, texture and space in a way more harmonious. They also show more capabilities Good in utilise material natural and material artificial as a medium of expression artistic.

In a way overall, improvement average value from 13.8 to 18.61 and completeness Study from 46.87% to 93.75% proves that the Project Based Learning model is effective implemented in learning collage. This model capable create experience active, creative, and contextual learning so that impact positive to quality work participant educate.

CONCLUSION

Fundamental Finding : Application of Project Based Learning in learning collage in class X.E3 SMA Negeri 1 IV Koto is proven effective in increase quality results work participant learn. Learning model This capable change pattern previous learning teacher-centered becomes participant - centered learning educate. Improvement quality learning seen from increasing creativity, participation, responsibility responsibility and ability technical participant educate in produce work collage. In quantitative, the average value increases from 13.8 to 18.61, while completeness Study increase from 46.87% to 93.75%.

Implication : With Thus, Project Based Learning can recommended as an effective learning model in learning art appearance, especially in material collage, because capable develop ability work at a time form character participant creative, independent and responsible students answer. **Limitation :** This study was limited to one class (X.E3) at SMA Negeri 1 IV Koto and focused only on collage learning. Therefore, the findings may not be generalizable to different schools, grade levels, art materials, or broader educational contexts. **Future Research :** Future studies are recommended to examine the implementation of Project Based Learning across different schools, educational levels, and visual arts topics using larger samples and longer observation periods to evaluate its long-term impact on students' creativity, learning outcomes, and character development.

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