

THE INCREASING OF STUDENTS ABILITY IN DRAWING MODEL OBJECTS SKETCH THROUGH PROJECTOR TREATMENT SLIDE ON THE FINE ARTS DEPARTMENT

Mesra

*Faculty of Language and Art, Medan State University
E-mail: mesra121@gmail.com*

Abstract: This paper is aimed to find out the success of students making sketch images after getting treatment, which was drawing with the help of electronic devices (digital cameras, lap top, projector, and screens). Treatment that was carried out was the display of a model object image on the screen as an appreciation material, before starting drawing, to control composition, proportion and perspective. The research hypothesis was that after following the treatment, students will be able to make sketch drawings with better results than using the old (conventional) method, so that there is an increase in students' ability to draw sketches than before. The results of the study are: a). There was an increase in students' skills in arranging the image object composition from 40% (based) to 70% after treatment. b. There was an increase in the skills of students applying proportions from 0% (based) to 55% right after treatment. c. There was an increase in the skills of students applying the perspective of the object image from 0% (based) to 10% right after the treatment. **Conclusion:** The use of electronic media (cameras, laptops, and infokus) as a treatment media for learning the practice of drawing could improve students' ability in drawing sketches of objects in realist. Impressions of model objects on the screen, could be a control tool in checking composition, proportion and perspective errors. It was suggested to students to familiarize appreciation activities, the forms of objects that would be modeled through live impressions (model objects are highlighted directly reflected on the screen). It was suggested to the lecturers of the drawing and model drawing subjects was to use this treatment method in the teaching and learning process.

Keywords: *Drawing Model Objects, Projector Treatment*

The main profile of graduates of the Fine Arts Department of Medan State University is to become a secondary school teacher. Art teachers must be able to transfer theoretical knowledge and practical skills to create artworks for their students. The teacher must demonstrate his drawing skills on the board, as well as on the student's drawing book. The aim is to prepare secondary school students to continue their education to universities in the Fine Arts Education Study Program, or Pure Art and Design.

The problem faced by universities has been the low drawing skills of prospective students. This was revealed in the special skills test to enter college, many of which were low. Nevertheless, the prospective students are still given the opportunity to be accepted, so that the Fine Arts Department still has new students who will be educated. Low quality input is a heavy burden for lecturers to train students to become skilled.

The unpreparedness of prospective students are to face special tests of drawing skills in college, due to lack of drawing guidance by teachers in secondary schools. It is suspected that the teacher rarely demonstrates drawing on the blackboard, in the picture book. Therefore, students as prospective teachers are given treatments in drawing exercises, so that they can quickly get drawing skills.

Students should really be able to draw sketches well, before taking part in other prekek courses, such as drawing shapes, model drawings, plastic anatomical drawings, illustration drawings, painting, and sculpture. But the problem is that the plastic shapes and anatomical images are taught in conjunction with the sketches, so the results are not maximized. In addition, sketch drawing learning is only one semester with a weight of 2 credits, it is considered inadequate time to be able to become skilled menket.

The method that has been used so far in drawing objects realistically is trial and error. This method is considered ineffective to obtain drawing skills quickly. Therefore, it is necessary to try a new method, which is to make impressions directly on the screen, objects that are modeled, along with the student process to tailor the object.

Problems Identification

- a. Picture Sketches of model objects with realist techniques made by students, most of which are not in accordance with the model being imitated.
- b. Weakness of sketch drawings are made by students, especially on the application of proportions, composition, and perspective.

The Problem of the Study

How is the improvement of students' skills in drawing sketches, after being given treatment using electronic media (digital cameras, laptops, and infocus) for live viewing on the screen?

The purpose of the study

The aim of the research is to find out the improvement of students' ability in drawing sketches, especially the application of composition, proportion and perspective.

The benefits of the study

- a. Theoretically, the results of this study are useful in increasing students' knowledge about the mastery of sketching skills in realist objects.
- b. Practically, the benefits of this research are: for students as study material and critique of real-world sketches of objects, for the lecturers as a basis for guiding students in drawing material sketches realistically, the Department of Fine Arts as a reference in improving graduate competencies.

LITERATURE REVIEW

Sketch

Sketches are design drawings that will still be continued or will be refined into a perfect drawing or painting work. An example is when someone will paint an object on a canvas, then he will make the sketch first, either in pencil or with other media. After that, it will be continued with coloring using a brush and paint so that it can display the desired object completely.

A good sketch can be seen from a minimalist line, but can represent the object shape proportionally. Furthermore, Ma'arof added that sketches other than simple scribes also reflected a sense of majesty to the Creator of the universe. So that it can find the essence of the line as a manifestation of the expression of dialogue, emotion and expression. Gupta (1980: 70) emphasizes that the expression of lines will be seen in spontaneous strokes made by a drawer because previously it has been digested well in the mind. The lines created no longer guess where they are going, and how they are sized, but as if the lines already exist in images on paper, then the confirmation is made again with a real line.

The sketch of the building must be more assertive in showing the shape of the form that looks precise, perspective, and solid, Walker (2000: 25). The sketch lines of the building look spontaneous and do not use a ruler tool. Fine and rough lines represent the perspective of objects that are seen near and far, while reflecting the direction of the dominant light so as to produce a shadow to a certain side.

Shape Pictures (still life drawing)

Drawing shapes is realist depictions of objects by not adding or subtracting from the imitated objects (Mesra, 2014: 12). The process of drawing shapes is almost the same as the photographic technique that is moving objects to the top of the drawing area exactly according to the model being imitated. The main requirement is to draw a form that provides a model object in front of the drawing. If the object is only in the imagination, it does not include the form image.

To start drawing the shape first through the sketch process. The success of image shapes is strongly influenced by the success of sketching the object. Some mensket requirements include; the contour lines of objects are drawn spontaneously without the aid of a ruler, the proportion of the drawing object must follow the emulated size of the original object, pay attention to the perspective

of the contour lines of the object and follow the principle of construction perspective, as well as structuring the image plane with a balanced composition.

The composition in an image can also be said to be the balance of the layout of objects in the image plane. The composition is said to be incorrect if the image object appears to be biased compared to the available image area (too heavy left, right, up, or down).

Proportion is the ratio of sizes between one part to another, therefore it is also called the principle of comparison. The principle of proportion relates to the ratio of small, wide-narrow, short-length, or high-low parts one with other parts.

Then the comparison is used to consider the area of the image with the object to be drawn. For example, to draw a group of geometric objects in the middle of the image field, compared to the available image fields. If the wide image area is filled with small image objects it is certainly not proportional. We often see this in the picture of elementary students, where they often display small objects in a wide area of images. For example, they depict schools, government offices, hotels, supermarkets, mosques, and churches all at once, but the drawing paper has only filled about one third of the area of the available image area.

Often the principle of proportion is confused with the principle of scale. This is especially the case in the work of art that represents real or real conditions.

The results of Mesra's research (2015: 40) show that some weaknesses in drawing art forms of art students include the proportion of objects not in accordance with the model being imitated, the direction of the sides of the cubistic object does not lead to a missing point according to the perspective principle, the composition of objects in Uneven image fields (left-right, oversized objects, small objects). After the results of the drawing work are finalized, it is suspected that the error originated from the sketch drawing stage. Sketches that are not yet representative of the form of the object being imitated, directly followed by the grading of the shading technique, so that the error in proportion (proportion) cannot be avoided.

Sketches that will continue into a complete picture or a painting must be analyzed first. Realist representation of objects is expected to pay attention to the reasonableness of the object's shape in the plane of the image must really represent the object being imitated. In addition, the proportion of objects in the image field is also a measure of the scale of the imitated object. This means how many times the magnification or reduction of the original object can be done consistently.

Model Pictures (Drawing Models)

Drawing model is the process of creating images using a model of living things. In this case the model used is "Human". The target of drawing a model is a perfect (representative) resemblance to humans who are used as models. If it is not similar to the results of the image with the model being copied, then the work is considered not useful and has no selling value. Therefore drawing a model must produce representative work.

The results of Mesra's research (2015: 75) explained that most of the model drawing works made by students do not match the model being imitated. In this case the imitated models consist of parents, adults, teenagers and children, with male and female sex. The level of similarity of the results of the image with the model being imitated is still low so it needs to be done repeatedly (trial and error) in order to achieve the expected results. Among the errors encountered in the results of the student model images are composition, proportion and similarity. The wrong composition is that the image object is not in the middle of the drawing area, the object is cut unnaturally, the image object is too large or too small, too heavy to the left, right, up, or down. Misrepresentation for example drawing children, but it looks like an adult who is reduced and given children's clothes. Comparison of head size with height, and shoulder width is not normal according to human anatomy theory, the location of the eye that is too up on the face so that it looks very narrow forehead, the ears are too small, the nose is too down so the distance between the lips and chin is too close. The general proportion of humans compares head height with height that is 1: 7, meaning that height is seven times the height of the head. Then the shoulder width is 2 to 2.5 times the width of the head. The width of the head is the distance between the two ears if the face is seen in front of it. Furthermore, the most decisive comparison in achieving the resemblance of human form is the size of the eyes, nose, mouth.

According to the theory of human face proportions proposed by Lowenfeld, the distance between two eyes is as wide as one eye when viewed right from the front. The distance also becomes the size of the nose width. Then the width of the mouth is the same as the distance between the retina of the left and right eyes. Head height is the distance from the top of the temple to the bottom of the chin. Then the eye line is at half the height of the head, and the bottom line of the nose is a quarter of the height of the chin. The theory of the proportion of human faces will experience a change when people's faces are seen not right from the front. The change that occurs is the proportion of human faces seen in perspective.

The application of perspective principles to human images will be seen on the face, body, legs and hands when objects are viewed from a slightly sideways direction. For example, the left and right eyes appear to be of the same size, as well as the low-lying position on the face image. The large size of the left and right hand also does not look the same in the picture, where the hand that is closer to the viewer's view appears larger than the other hand. Krah clothes / neck clothes worn by humans as a model also look different in size between left and right. This is the lack of attention for students in drawing models so far, so that the accuracy of the form in principle perspective is not achieved. Perspective errors in human images, for example, the height and magnitude of the ears remain the same, although seen from a rather sideways view. The hand still looks the same between left and right, even though the person is seen from the side.

Failure to draw models and paint realistically is also greatly influenced by the success of the sketch drawing. Sketches can be considered as the key to the success or failure of a picture or painting in a realist way. If the sketch fails to determine the correct proportions, the expected end result will deviate from the actual condition of the model object.

The Use of Electronic Equipment to Speed up Drawing Exercise

Electronic devices are used as a means to facilitate the achievement of image results similar to the model. If you do not use the tool, it takes a long time to achieve similarity. Therefore, electronic media (digital cameras, laptops, infocus) and screens / screens are used to display the shape of the model. The program will be one of the measuring tools for checking the proportion, composition and perspective.

The objects used as models look three dimensional, even though the work produced in two-dimensional form. Therefore, the display of photos of these model objects is a representation of the images that students will produce. Based on in-depth observations of the photos, students can match the actual conditions in front of them.

The difficulty of students in drawing models so far is the lack of control or benchmarks of the success of the images they make, in two-dimensional form.

RESEARCH METHODOLOGY

Experimental Method

Experiments were applied to students who are drawing manually, namely by using an electronic device to display photos of model objects on the screen. The tools used were digital cameras, laptops and projector whose life at the same time as *mensket*. These impressions are direct control of the composition of the object image, proportion (size accuracy), and the direction of the perspective line, as well as the darkness of objects and shadows.

Research Stages

First, the "Human" model was arranged in such a way before the drawing to make it look aesthetic. The drawer takes the right position to observe the model to be copied. Then the sketching process was done manually by observing the model object. The sketch results were as pretesting before making experiments.

The second stage was to do an experiment, which was manually stitching, but there was control through impressions on the screen. The broadcasting technique was a digital camera placed right next to the eye-high drawer, as if the same function with the drawer records the shape of the model object in front of it. Recordings are highlighted on the screen using projector (life).

Then the mensket process was done manually by the drawer (the screen is closed temporarily). Once the manual sketch is finished, then the screen on the screen was restarted, and

compared to the manual sketch and the display on the screen. Then a correction is made to the error. This treatment was carried out several times, so the sensitivity of the picture's taste was more appropriate. Finally, there was no need for treatment tools.

RESULT AND DISCUSSION

Research Results

1. Planning

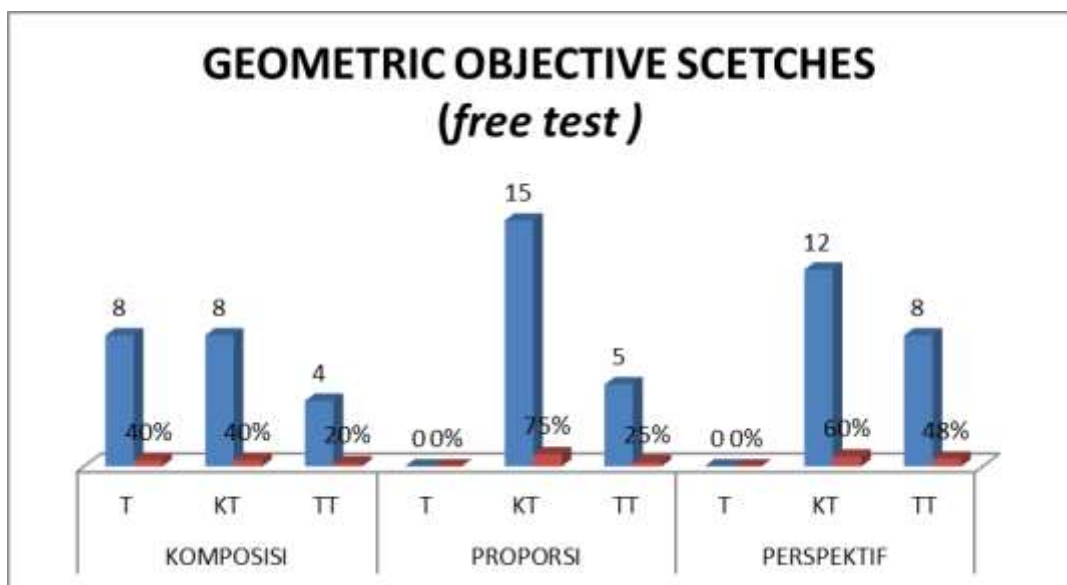
The results at this stage that students were able to understand the characteristics of good objects to be used as models, able to organize models aesthetically. Impressions on the screen could be good model setup controls.

Implementation

Menket activities are carried out twice:

a. Stage I: Students manually ordered geometric objects by looking at the model (as a free test within 30 minutes). The results achieved were that there were still many students who did not achieve the successful target of sketching. Observed indicators are composition, proportion, and perspective.

From the 20 images made by students, the "Composition" score was as follows: 8 (40%) right, 8 (40%) less precise, and 4 (20%) incorrect. Then the "Proportion" score is not right, 15 (75%) is not right, and 5 (25%) is incorrect. Furthermore, the "Perspective" score is also not the right one, 12 (60%) is less precise, and 8 (40%) is incorrect, then displayed in the graph as follows:

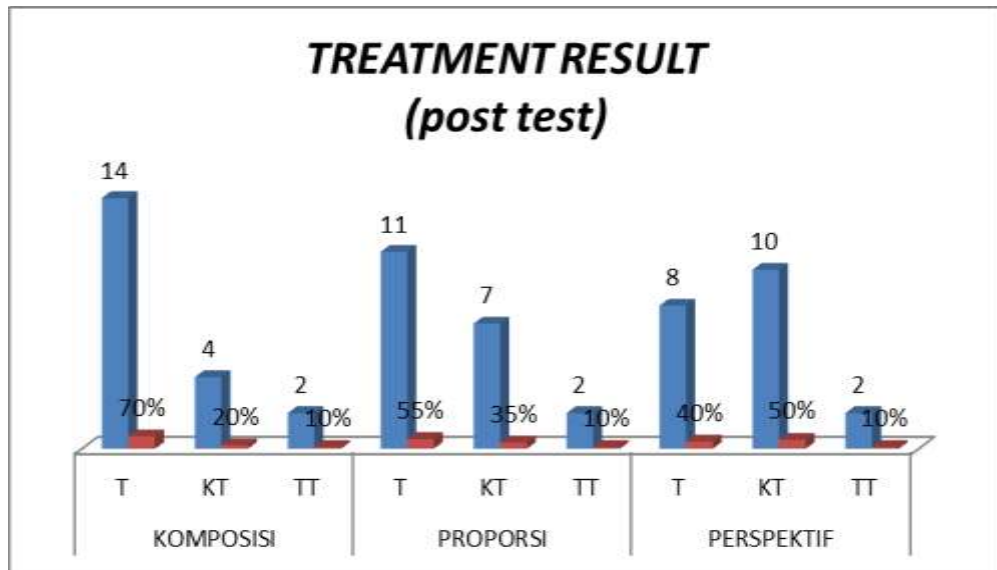


Graph 1. Value of Geometric Objects (free test)

b. Stage II: The second stage was to conduct treatment, i.e. the pre test results were previously corrected through a display on the screen (the recording of the camera on the model), so that the previous error level was known. After that, repeating the same object again (as a post test). Post test results as follows:

From the 20 images made by students, there are 14 (70%) exact "Composition" objects, 4 (20%) less precise, and 2 (10%) incorrect. Then in terms of "proportion" there are 11 (55%) right, 7 (35%) less precise, and 2 (10%) are not appropriate. Furthermore, in terms of "Perspectives" there are 8 (40%) right, 10 (50%) less precise, and 2 (10%) are not appropriate.

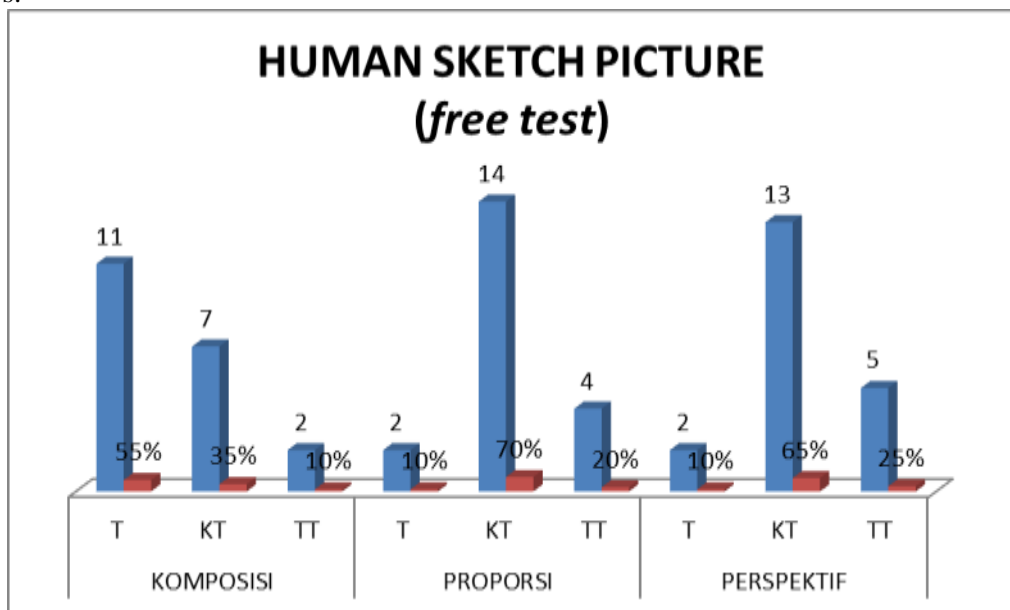
Obtaining scores on the sketch drawing of geometric objects with the treatment method could be displayed on the graph as follows:



Graph 2. Value of Geometric Objects Sketch Images (post test)

The results of the sketch drawing with the "Human" model indicated that most of the proportions and perspective errors occur. The composition of the results shows that most of them are correct. The acquisition score of the human sketch drawing in the first picture is as follows:

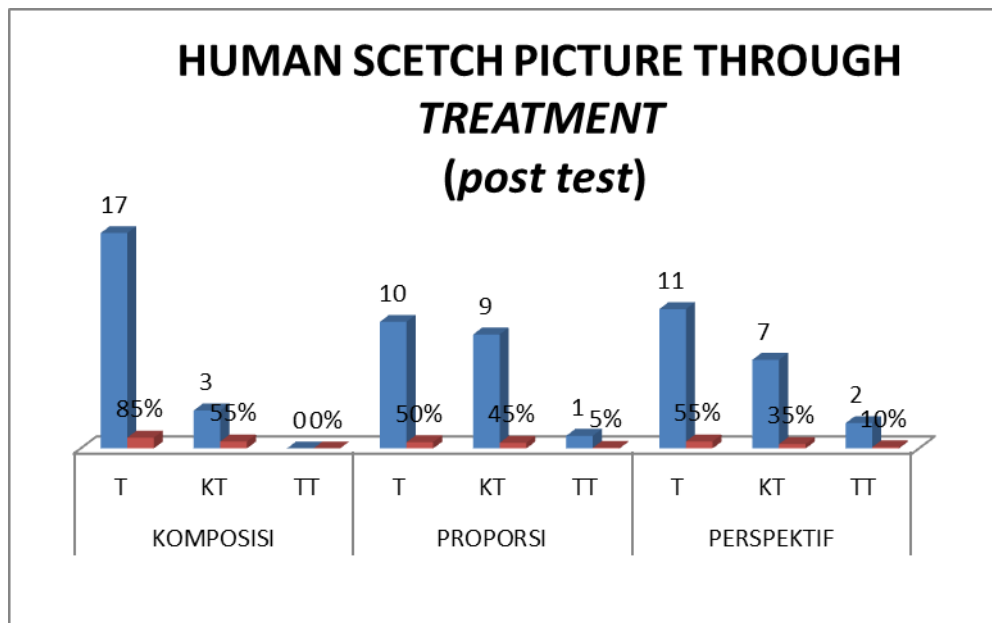
From the 20 images made by students, the "Composition" score was as follows: 11 (55%) right, 7 (35%) less precise, and 2 (10%) incorrect. Then the score "Proportion" 2 (10%) is right, 14 (70%) is not right, and 4 (20%) is not right. Furthermore, the "Perspective" score of 2 (10%) was correct, 13 (65%) was incorrect, and 5 (25%) were incorrect. Next can be displayed in the graph as follows:



Graph 3. Image Value of Human Model Sketches (free test)

The results of the image after treatment (post test) as follows:

From the 20 images made by students, obtained "Composition" scores as follows: 11 (55%) right, 7 (35%) less precise, and 2 (10%) incorrect. Then the score "Proportion" 2 (10%) is right, 14 (70%) is not right, and 4 (20%) is not right. Furthermore, the score of "Perspective" 2 (10%) is correct, 13 (65%) is incorrect, and 5 (25%) is incorrect, then it can be displayed on the graph as follows:



Graph 4. Image Value of Human Model Sketches (post test)

Discussion

After assessing the results of the first and second images, then comparing the score, it was known that there was a difference in the score between the two. The difference in scores indicates that there was an increase in the ability of students in the field to be positive. The first image as a free test was using the old method (conventional), and the second image was the result of the image after getting the treatment (post test). In the second picture there is an increase for each assessment indicator when compared to the first image.

Analysis of the increased results is that the work of drawing an object includes the collaboration between eyes, brain, and hands simultaneously. After the eye observes an object, it will be stored in the memory of the brain. The work of moving objects from the mind to the plane of the image by hand, was always controlled by the brain.

The role of laptop electronic deviced and projector to display two-dimensional shapes on the screen clearly helps students to digest the shape of objects and store them in brain memory. The shape of the image object in the impression in a two-dimensional form will be easier to move to the image field which is also in a two-dimensional form. So the results of the impressions on the image became an accurate reference to control the accuracy of the sketch images made by students.

The depiction of a human object was not as easy as an inanimate object, because there was a psychological problem between the drawing and the human being the model. The problem arises if the resulting image was not similar to the original person being copied. The drawer would feel ashamed for failing to make a similar image, and the person drawn does not want to accept the picture. From the 20 drawers, most of them might not be the same as the original.

Conclusions

The use of electronic media for cameras, laptops, and infocus, as well as screens / screens can accelerate the improvement of students' ability to draw sketches of objects objects in realism. Impressions of model objects on the screen can be used as a medium of appreciation, and are able to accelerate the capture of the complete model form.

Suggestions

It is recommended for students to make appreciation by airing directly on the screen and confirming the results of the manual sketch. It is suggested to lecturers in form and drawing drawing models to use electronic media to display model forms, so that it is easier to convey imaginary theory information to students especially regarding ways of time-effective mensket and proportion size accuracy.

References

- Guptill, Arthur I. (1980). *Freehand Drawing Self-Taught*. New York. Waston-Guptill Publications.
- Laseau, Paul. (...). *Sketsa Bebas Sebuah Pengantar*. Jakarta. Erlangga
- Mesra. 2014. *Menggambar Bentuk I*. Medan, Unimed Press.
- _____.2014. *Analisis Penerapan Teori Proporsi dan Perspektif Pada Gambar Bentuk Benda Kubistis Karya Mahasiswa Seni Rupa Fakultas Bahasa dan Seni Universitas Negeri Medan*, Jurnal Ilmiah “Bahas” No.88 TH XL 2014. Medan, FBS Unimed.
- Walker, Theodore D. (...). *Sketsa Perspektif*, edisi kelima. Jakarta. Erlangga