

**ANALYSIS OF DRAWING METHODS AMONG
SELECTED HIGH SCHOOL STUDENTS IN
JORDAN**

ASMA' NAWAF ABDALLAH MAYYAS

UNIVERSITI SAINS MALAYSIA

2024

**ANALYSIS OF DRAWING METHODS AMONG
SELECTED HIGH SCHOOL STUDENTS IN
JORDAN**

by

ASMA' NAWAF ABDALLAH MAYYAS

**Thesis submitted in fulfilment of the requirements
for the degree of
Doctor of Philosophy**

March 2024

ACKNOWLEDGEMENT

IN THE NAME OF ALLAH, MOST GRACIOUS, MOST MERCIFUL

First and foremost, I thank God (SWT) for all of his blessings and guidance in carrying out this work. I am pleased to extend my sincere gratitude, sincere thanks, deep appreciation and deep gratitude to my supervisors, Dr Husaini Bin Yaacob and Dr Mohammad Khizal Bin Mohamed Saat for their supervision, constant encouragement, valuable guidance, advice, and for all the help and support they provided during my research work and the preparation of this thesis. I would also like to thank the School of Arts and the administrative staff at Universiti Sains Malaysia for all of the facilities and assistance in carrying out this research. I am also grateful to all of my friends for their assistance and encouragement during my studies. Finally, and most importantly, I want to express my gratitude to my mother for her unwavering love, prayers, support, encouragement, and sacrifices. My brothers and sister for their support. I dedicate this work to my father's soul; may God have mercy on him.

Asma' Nawaf Abdallah Mayyas

TABLE OF CONTENTS

ACKNOWLEDGEMENT.....	ii
TABLE OF CONTENTS	iii
LIST OF TABLES	vii
LIST OF FIGURES	ix
LIST OF APPENDICES.....	xii
ABSTRAK	xiii
ABSTRACT	xv
CHAPTER 1 INTRODUCTION.....	1
1.1 Introduction	1
1.2 Background of the Study.....	2
1.3 Problem Statement	5
1.4 Research Objectives	8
1.5 Research Questions	9
1.6 Significance of the Research	9
1.7 Research Limitations.....	10
1.8 Operational Definition.....	11
1.9 Outline	12
1.10 Summary	13
CHAPTER 2 LITERATURE REVIEW.....	14
2.1 Introduction	14
2.2 Drawing	15
2.3 Realistic Drawing.....	18
2.4 Drawing Creation	21
2.5 Drawing Practice in Context of Art Education in Jordan Schools	28

2.6	The Principle and Elements of Art	31
2.7	Photographic Imagery as a Visual Source.....	36
2.8	Usage of Memory in Drawing Creation	40
2.9	Drawing Pedagogy in Secondary School	41
2.9.1	Drawing Usage of Memory.....	47
2.9.2	Drawing referring to Photographic Imagery	50
2.10	Gender and Drawing	54
2.11	Theoretical Framework	57
2.12	Summary	63
	CHAPTER 3 METHODOLOGY	64
3.1	Introduction	64
3.2	Research Design	65
3.3	Population.....	68
3.4	Sampling Method	70
3.5	Research Variables	72
3.6	Research Instruments	73
3.6.1	Assessment Scale	73
3.6.2	Semi-Structured Interviews.....	75
3.7	Pilot Study	76
3.8	Validity and reliability	81
3.8.1	Validity of the Research Instruments.....	81
3.8.2	Reliability of the Research Instruments	81
3.8.3	The Internal Consistency	82
3.9	Data Collection Procedures	85
3.9.1	Quantitative Data Collection.....	87
3.9.2	Qualitative Data Collection.....	104

3.10	Data Analysis	106
3.10.1	Quantitative Data Analysis	106
3.10.2	Qualitative Data Analysis	107
3.11	Ethical Procedures.....	109
3.12	Summary	110
CHAPTER 4 RESULTS		112
4.1.1	Introduction	112
4.2	Sample Characteristics	113
4.3	Descriptive Statistics	114
4.3.1	Group Distribution	114
4.3.2	Students' Gender Distributions	115
4.3.3	Students' Grade Distributions	116
4.3.4	Cross- Tables.....	118
4.3.5	Normality Distribution Test	121
4.4	Quantitative Results	123
4.4.1	The Descriptive Statistical Analysis for the Scale	123
4.4.2	Test the Study Questions.....	126
4.5	Qualitative Result	138
4.5.1	Findings of Interviews	138
4.6	Summary	164
CHAPTER 5 DISCUSSIONS AND CONCLUSIONS		166
5.1	Introduction	166
5.2	Discussion on Findings	168
5.2.1	Discussion on Research Question	168
5.2.2	Discussion on Research Question Two.....	171
5.2.3	Discussion on Research Question Three.....	172

5.3	Implications of the Research	175
5.4	Recommendations	177
5.5	Conclusions	178
REFERENCES		181
APPENDICES		
LIST OF PUBLICATIONS		

LIST OF TABLES

	Page
Table (3.1) Participants' Distribution of Grades and Schools	72
Table (3.2) The sample for the pilot study	77
Table (3.3) The Mean Score and Standard Deviation	80
Table (3.4) The Results of ANOVA.....	81
Table (3.5) Reliability Statistics	83
Table (3.6) Main and sub-axis Correlations	84
Table (3.7) The correlation coefficients for the instruments' items and the parts of the artwork.....	84
Table (3.8) Drawings differences between referring to imagery and using memory	102
Table (3.9) The semi-structured interview guide	111
Table (4.1) Distribution group based on the Approach.....	114
Table (4.2) Students' Gender Distributions	115
Table (4.3) Students' Grade Distributions	116
Table (4.4) Gender * Grade Cross tabulation.....	118
Table (4.5) Approach * Grade Cross tabulation.....	120
Table (4.6) Tests of Normality	121
Table (4.7) Means and Standard Deviation of the Elements of artwork	124
Table (4.8) Means and Standard Deviation of Principles of artwork.....	125
Table (4.9) Testting the first question	127
Table (4.10) Descriptive Statistics Analysis based on gender	131
Table (4.11) Test of Between -Subjects Effects	132

Table (4.12)	Gender * Approach.....	133
Table (4.13)	Descriptive Statistics	134
Table (4.14)	Tests of Between-Subjects Effects	136
Table (4.15)	Qualitative participants demographic	139
Table (4.16)	Categories created based on research questions	140
Table (4.17)	Frequency and percentages for category	143
Table (4.18)	The frequency and percentage for the category.....	156
Table (4.19)	Frequency and percentage of Categories according to grade	157
Table (5.1)	Overview of the findings and implications.....	177

LIST OF FIGURES

	Page
Figure 2.1 Rania Ahmed, national flower, observation drawing, wooden color, 21 cm * 29 cm, 2019.....	17
Figure 2.2 Salma Daraisah, king's childhood, realistic drawing, charcoal on canson paper, 50 cm * 70 cm, 2020.....	19
Figure 2.3 Theoretical Framework.....	63
Figure 3.1 Research Design	67
Figure 3.2 The QUAN - QUAL Model.....	68
Figure 3.3 Drawing task for: referring to imagery and using of memory, female, ninth and tenth grade.....	90
Figure 3.4 Drawing task for: referring to imagery and using of memory, male, ninth and tenth grade.....	91
Figure 3.5 Students' drawings, ninth grade/ female/ drawing usage of memory	93
Figure 3.6 Students' drawings: tenth grade / female / drawing usage of memory	94
Figure 3.7 Students' drawings, ninth grade / male / drawing usage of memory	94
Figure 3.8 Students' drawings, tenth grade / male / drawing usage of memory	95
Figure 3.9 Students' drawings, ninth grade / female / drawing referring to photo	96

Figure 3.10	Students' drawings, tenth grade / female / drawing referring to photo	96
Figure 3.11	Students' drawings, ninth grade / male / drawing referring to photo	97
Figure 3.12	Students' drawings, tenth grade / male / drawing referring to photo	97
Figure 3.13	Drawing using photo.....	101
Figure 3.14	Drawing using memory	102
Figure 3.15	Diagrams of the assessment drawings by the judges.....	103
Figure 3.16	Diagrams of the assessment drawings by the judges.....	104
Figure 4.1	Sample in accordance with approach	118
Figure 4.2	Sample in accordance with gender	117
Figure 4.3	Sample in accordance with grade	118
Figure 4.4	Principle of Art	122
Figure 4.5	Elements of Art.....	122
Figure 4.6	Overall	123
Figure 4.7	Independent Samples Mann Whitney U Test (Elements of art) ..	128
Figure 4.8	Independent Samples Mann Whitney U Test (Principles of art). 130	
Figure 4.9	Referring to photo, wooden colors, 28*21 cm	145
Figure 4.10	Drawing usage of memory, wooden colors, 28*21 cm	148
Figure 4.11	Male drawing/ Referring to photo, wooden colors, 28*21 cm	150
Figure 4.12	Male drawing/ Usage of memory, wooden colors, 28*21 cm	152
Figure 4.13	Female/ Referring to the photo, Wooden colors, 28*21 cm	153
Figure 4.14	Female/ Usage of memory, Wooden colors, 28*21 cm	155

Figure 4.15	Referring to The Photo – Ninth Grade, Wooden colors, 28*21 cm	159
Figure 4.16	Usage of Memory – Ninth Grade, wooden colors, 28*21 cm	160
Figure 4.17	Referring to The Photo – Tenth Grade, wooden colors, 28*21 cm	162
Figure 4.18	Usage of Memory – Tenth Grade, wooden colors, 28*21 cm	163

LIST OF APPENDICES

APPENDIX A	QUESTIONNAIRE
APPENDIX B	SCALE JUDGING
APPENDIX C	SAMPLE OF EXPERTS' VALIDATION
APPENDIX D	SCALE OF DRAWING
APPENDIX E	VALIDITY EXPERTS OF THE MEASUREMENT AND THE INTERVIEW QUESTIONS
APPENDIX F	APPROVAL TO DO ACADEMIC RESEARCH
APPENDIX G	THE APPROVAL OF THE JORDANIAN MINISTRY OF EDUCATION TO CONDUCT THE RESEARCH
APPENDIX H	SAMPLES OF PHOTOS AS A REFERENCE AND VISUAL ASSISTANT FOR STUDENT
APPENDIX I	SAMPLE OF INTERVIEWS

ANALISIS KAEDAH MELUKIS DALAM KALANGAN PELAJAR SEKOLAH MENENGAH TERPILIH DI JORDAN

ABSTRAK

Lukisan, sebagai salah satu daripada domain pendidikan seni, menyumbang kepada pembangunan keupayaan dan kemahiran individu khususnya pelajar dalam semua peringkat pendidikan. Pengajaran lukisan di sekolah-sekolah di Jordan adalah berdasarkan kepada asas tradisional dengan bergantung kepada ingatan. Walau bagaimanapun, terdapat beberapa kajian yang menunjukkan kepentingan menggunakan alat bantu visual (imej fotografi) dalam lukisan. Kajian ini bertujuan untuk menyelidik perbezaan antara dua kaedah mencipta lukisan oleh pelajar. Data dan maklumat diperoleh melalui teknik pengumpulan data kaedah campuran (kuantitatif dan kualitatif). Sekolah telah dipilih secara rawak dari daerah Ramtha di Jordan melalui kaedah 'loteri'. Seramai 311 pelajar lelaki dan perempuan telah mengambil bahagian dalam kajian ini. Ujian lukisan telah dijalankan untuk pelajar dengan menggunakan dua kaedah: merujuk kepada imej fotografi dan menggunakan ingatan. Skala yang dibangunkan dalam kajian ini digunakan untuk menilai lukisan pelajar berdasarkan prinsip dan elemen karya seni. Selain itu, temu bual separa berstruktur dengan pelajar telah dijalankan. Data dianalisis dengan menggunakan teknik analisis statistik dan analisis kandungan. Hasil kajian menunjukkan bahawa mencipta lukisan merujuk kepada imej fotografi adalah lebih baik daripada menggunakan ingatan, mengikut prinsip dan unsur seni. Keputusan menunjukkan bahawa pelajar lelaki lebih cenderung menggunakan memori lebih daripada imej fotografi, manakala pelajar perempuan lebih cenderung menggunakan imej fotografi

semasa mencipta lukisan. Lukisan yang merujuk kepada imej fotografi itu lebih tinggi daripada lukisan yang dihasilkan daripada ingatan, sama ada untuk gred kesembilan atau kesepuluh. Dapatan kualitatif daripada temu bual pelajar kelihatan sepadan dengan dapatan kajian kuantitatif. Dapatan kajian ini mengesahkan dan menyumbang secara praktikal bahawa alat bantu visual dapat membantu pelajar mencipta lukisan mereka, dan menambah baik lukisan mereka. Kesimpulannya menarik perhatian kepada sifat pelbagai rupa penciptaan lukisan, memberi penerangan tentang peranan persepsi visual dan ingatan dalam membentuk pendekatan artistik individu.

ANALYSIS OF DRAWING METHODS AMONG SELECTED HIGH SCHOOL STUDENTS IN JORDAN

ABSTRACT

Drawing, as one of the art education domains, contributes to developing the individual's capabilities and skills, especially students, in all educational stages. Jordanian schools' teaching of drawing is based on traditional foundations that rely on memory. However, there are studies that indicated the importance of using visual aids (photography image) to create drawing. This study aims to investigate the difference between the two methods of creating students' drawings. Data and information were obtained through a mixed method data collection techniques (quantitative and qualitative). Schools were randomly selected by lottery method from the Ramtha district in Jordan. A total of 311 male and female students participated in the research. Drawing tests were conducted for the students using two methods: referring to the photograph and using memory. A scale developed by the researcher was used to evaluate the students' drawings based on the principles and elements of the artwork. In addition, semi-structured interviews were also conducted. Data was analyzed using analytical statistical techniques and content analysis. The results of the study showed that creating drawing referring to the photographic imagery is better than using memory, according to the principles and elements of art. As the results indicated that male students tend to use memory more than the photo, while female students tend to use the photo more when creating the drawing. Finally, there are no differences between the ninth and tenth grades within a single group, but the difference between the ninth grade in the drawing from memory and the ninth-grade drawing refers to the

photo. The drawing referring to the photo was higher than the drawing from the memory, whether for the ninth or tenth grade. The qualitative findings from the student interviews appear to correspond with the quantitative findings of the study. The findings of this study confirm and practically contribute to that visual aids can help the students to create their drawings, and improve their drawings. The conclusions draw attention to the multifaceted nature of drawing creation, shedding light on the roles of visual perception and memory in shaping individual artistic approaches.

CHAPTER 1

INTRODUCTION

1.1 Introduction

Since art education was first offered in Jordan in 1955 under the term of drawing, there has been a genuine interest in the subject, albeit there are still significant gaps that have an impact on student progress. Even though the Ministry skipped art education in the secondary level in order to meet its goals, the lessons pupils learn are somewhat sequential (Al-Saud, 2010). In Jordanian schools, drawing is taught as a basic art education skill. Drawing is one of the main topics in the school's art education curriculum, starting from the first grade and ending with the tenth grade. However, plans for study give insufficient weight to the arts since students still do not have access to the artistic culture that they should (Al-Anani, 2007). Teaching in Jordanian schools depends on the student's freedom of expression. Amr (2002) pointed out spread of visual illiteracy among school students due to traditional teaching of drawing. Studies noted that what happened in teaching drawing represents a misunderstanding of the principles of art education from an applied standpoint. Freedom of expression does not mean that students should be left to do whatever they want. They must be helped in gaining experiences that enable them to mature and reach the comprehensive formation of the individual (Basiouni, 1985). Students must learn the theoretical foundations of drawing before embarking on practical art.

1.2 Background of the Study

Art education is one of the art fields that helps people see better and more beautifully (Eleyagutu, 2016). It includes a variety of areas that assist the individual in honing his skills and creativity, the most important of which is the field of drawing. Which allows the individual to express himself and develop aesthetic values through various drawing methods (Kozbelt, 2017).

In art education, perhaps there is no influential saying more than saying "Do not let the child copy" which is attributed to Lowenfeld (Wilson & Wilson, 1977). This view has spread and has resonated widely among teachers of art education in the world and they followed these theories which show that copying affects students' creativity and restrict them (Mortazavi, 2001). Accordingly, students in art classes are not allowed to try to imitate or copy other pictures or drawings while drawing.

The field of art education in the Arab world lacks empirical studies, while studies devoid of objective evidence and indication are common. Drawing from memory is the basis for teaching drawing at various stages in school, where the effects of the spread of ancient theories can be seen in Arab schools and curricula (Amr, 2001). Similarly, studies in Jordan have revealed that students' work is traditional and lacks innovation, and art education teachers in Jordan use the majority of traditional teaching methods (Albib, 2022). Therefore, one of the prominent phenomena in the field of art education is the spread of visual illiteracy through the different stages of education (Amr, 2001). This indicates that art education teachers in Jordan were influenced by such sayings and followed the traditional methods of teaching drawing and thus reflected on the students.

Therefore, the spread of this view could cause students with fewer skills, less equipped and having an inability to produce artworks in their own artistic way (Al Atoum, 2013).

Previous research has shown that the student's need for visual references is a starting point for the ability to express, and that the physical medium as a technical means develops the student's vision and expands his mental capacity (Mortazavi, 2001; Van de Windt, 2008). However, recent studies show that visual ideas are not prevalent among art teachers, who are not prepared to teach visual ideas and, as a result, do not allow the use of photographs (Vianna, 2009). Furthermore, some art educators disregard visual means, despite the fact that these tools are available and play an important role in supporting students' art education. As a result, it is assumed to be a convincing motivation behind why teachers do not value the use of advanced media to teach drawing (Agyeman, 2015).

In the same context, some Jordanian studies have highlighted the importance of using images as resources in the teaching and learning process, as well as using educational materials, such as visuals, that reflect the reality of students' lives as closely as possible and encourage them to interact with and recreate these images, which makes cognition effective in art education (Alsaggar & Al Atoum, 2019). It works to increase the student's visual inventory and knowledge of aesthetic artistic values, thereby assisting him in enhancing his artistic abilities.

Al Atoum (2020) mentioned that many art educators in schools of Jordan still employ outdated instructional strategies that fall short of student expectations, that left him unable to address contemporary issues in accordance with global trends, which have an advantageous and useful effect on students. The new trends in art education emphasize

developing students' abilities in areas such as visual communication, aesthetic sensibility, sensory perception, emotional and intellectual development, and critical judgments towards objects of various types and from various cultures. Artistic production is the direct experience of creating and making art. It represents an essential way to know and understand issues related to aesthetics, art criticism, art history, artistic production and creative fields. It is learner's experience through the direct use of the senses and engage both feeling and reason or thought (Al-Amri et al., 2016).

Thus, the basis of visual arts is to train students to organize their ideas in the production of objects using any available material and the appropriate technique, thereby eliminating visual illiteracy (Ecoma, 2016). The practice of drawing allows the student to analyze, concentrate, compare, and create; therefore, the student must be given the opportunity to become proficient in drawing, as a person cannot create something if he lacks artistic ability (Mitchell, 2014). In addition, there is an urgent need to consider the education of art education teachers in order to determine the best practices and their relationship to visual culture in order to bring about the necessary change in art education (Balkir, 2009). Consequently, it can be stated that teaching drawing requires the instructor to guide the student in the acquisition and development of various skills. This is accomplished by diversifying the methods used to teach drawing in order to increase the student's technical level, rather than relying solely on the student's art and instinct.

1.3 Problem Statement

In art education, drawing is one of the basic and important fields for the individual, and the development and improvement of his artistic skills are of paramount importance to him (Chorpining, 2014). Studies indicated needing art education for theoretical and practical implementation, to eliminate visual illiteracy, which is prevalent among most students and leads to poor results in artworks (Westraadt, 2016; Lin, 2008). Meanwhile, studies had indicated the importance of using visual aids in drawing (Bunch, 1995; Ecoma, 2016; Lin, 2008; Gao, 2015). Perhaps, one of the means of improvement is the use of pictures and graphics in teaching drawing. However, based on old beliefs, the teachers in school Jordanian have been focusing on urging the students to draw using just their memory (Amr, 2001). Drawing instruction is based on traditional foundations, which has resulted in students' artistic weakness and low level (Al Atoum, 2013). Some teachers believed in the student's freedom of expression without any interference or guidance, until the student reached middle school age and faced problems and obstacles in the drawing process, such as repeating symbols and not developing them, and the formations became without formative foundations that the student could understand, which led to the student's low level of drawing and understanding of the art foundations (Saud, 2010).

According to the findings of Alashran's study (2021) art education teachers should be encouraged to adopt the method of incorporating images and graphics into their lessons. Similarly, Al-Amri's (2016) study results recommended the need to develop the teaching of art education in accordance with contemporary trends in arts education, such as images and drawings, in order to develop arts education curricula and methods. This indicates a

disregard for visual aids in the teaching of drawing in Jordanian schools. If the gap persists in relying on memory and avoiding aids, it may be difficult to achieve the required drawing skills for the students. Therefore, it is important to investigate the difference in drawing creation between using memory and referring to the photo. In response to this problem, this study proposes to study the difference between using memory and referring to photographs to create drawings based on elements and principles of art. The literature review made by the researcher revealed no study addressing the difference between using memory and referring to photographs to create drawings based on elements and principles of art. As a result, this research was motivated to examine this problem with a population from Jordanian schools.

In context of gender studies supported drawing by referring to photographs, indicating that boys and girls may have different emotions and ways of creating objects when drawing images (Cherney et al., 2006). Studies have shown that there are differences between male and female drawings. However, research has not studied the differences between males and females in creating drawings based on the principles and elements of art. Nevertheless, research has not examined gender differences in drawing creation. It is important to know whether there are different learning abilities in drawing creation according to gender, so that different techniques can be applied in teaching art.

From the grade point of view, in a study conducted by Amr (2002), he confirmed that there are no individual differences between students at different levels of education, as students' drawings are generally characterized by simplicity. The curricula for preparing art education teachers focused on children's arts through freedom of self-

expression. Childish expression methods spread and differences between students at different levels of education disappeared, except in the cases of individual. The difference in drawing creation is not being examined. So, the current study chose the ninth and tenth grades because they are the last two grades that receive drawing lessons in Jordanian schools. After completing these classes, students join higher education, where they are expected to possess the required skills and knowledge so it will be checked whether there is a difference in creating drawings depending on the class.

The researcher observed a growing sense of the problem through teaching experience in schools. Teachers were avoiding the use of photographs and urging students to rely only on their memory for drawing. However, the photograph has multiple potentials in the visual field and could be an effective means to enhance visual awareness around us (Bunch, 1995). Furthermore, there is a stigma attached to individuals who use photography as an optical reference, as some individuals perceive this approach as a weakness (LeBlanc, 2008). Hence, it is necessary to examine the contrast between drawing from memory and drawing with reference to photographic imagery in the drawings of students.

The researcher conducted an exploratory study to further reinforce why the current study was conducted, based on the foregoing. The study aimed to identify the attitudes of teachers towards the use of photographs in teaching drawing. All art education teachers in the Directorate of Education of the Ramtha District of Jordan were included in the sample. The researcher used the descriptive-analytical approach and collected data using a tool that they constructed. Please refer to Appendix (A) for more information. The sample

comprised 45 teachers. Means, standard deviations, and ANOVA were calculated. The study showed that teachers had low attitudes towards using photographs for teaching drawing. The results indicated that there were no significant differences in the attitudes of the teachers towards using photographs in teaching drawing, with respect to the variables of the study, namely gender, education, experience, and specialization. The low attitudes of teachers towards using photographs in teaching drawing could indicate and confirm the negative view towards the use of visual aids in the field of art education, particularly in drawing (Mayyas & Yaacob, 2020). So, the current study aimed to investigate if there is deference between using memory and referring to photographic imagery in drawing creation.

1.4 Research Objectives

The purpose of this study is to determine the disparities in drawing creation when referencing photographic imagery versus relying on memory:

- 1.4.1 To explore the differences of drawing creation between referring to photographic imagery and the usage of memory.
- 1.4.2 To identify the differences of drawing creation between referring to photographic imagery and usage of memory according to gender.
- 1.4.3 To analyze the differences of drawing creation between referring to photographic imagery and usage of memory according to grade.

1.5 Research Questions

The study aims to investigate the difference in the drawing creation between referring to photographic imagery and usage of memory. Thus, the research questions are as follows:

1.5.1 Does drawing creation different between referring to photographic imagery and usage of memory?

1.5.2 Is there a difference in drawing creation between referring to photographic imagery and usage of memory according to gender?

1.5.3 Is there a difference in drawing creation between referring to photographic imagery and usage of memory according to grade?

1.6 Significance of the Research

This study aims to provide guidelines on the difference between teaching drawing with photographs as a visual aid and drawing without visual aid to develop students' drawing skills. Drawing is done from memory in schools, and students are not encouraged to use visual aids because it is widely assumed that this negatively affects students' drawings. The study will identify the difference in creating students' drawings for two teaching types: referring to photographic imagery and usage of memory, and recommends using the appropriate method that enables the student to improve his drawings. The study looking at areas that people in the discipline in Jordan haven't looked at before. The researcher designed tool to conduct the study, the researcher did not find a suitable tool

for evaluating drawings based on the principles and elements of the artwork. It contributes to the field of art education in Jordan, with the hope of addressing the issue of a lack of visual aids, means, and forms of art instruction in classrooms. The study includes quantitative data, however qualitative data was included to validate what was discovered in the quantitative phase. The study has the potential to improve our understanding of cognitive processes, artistic practices, educational tactics, and many interdisciplinary viewpoints. The findings may have consequences for theoretical knowledge as well as practical applications in art, psychology, and education. It is to inform decision-makers in education policy and curricula about the opinions of the students involved in the matter, as well as their preferences for the ways they see fit for them to create their drawings. In addition, it is anticipated that the findings of this study will aid educational supervisors in educating art education teachers about the role of visual aids in teaching students to draw.

1.7 Research Limitations

This section condenses some of the aspects that need to be acknowledged. The population addressed by the current study involved ninth and tenth grade students in sixteen male and female classrooms within the Directorate of Ramtha District Education. So, the results from this study would be limited from generalizing for all other Arab students (Bawaneh, 2011). Moreover, the study focused on ninth and tenth grade students, but not other educational levels. The results may not generalize to students in higher or lower grades who may display different behaviors or characteristics.

Accuracy of results generated by this study would be limited by the validity and reliability extent of instruments and methods used for gathering data. Taking into account

that this study used a mixed method approach, combining quantitative and qualitative data can increase overall the reliability of the study (Creswell 2009a).

Finally, the scope of this study is limited to examining differences in drawing created using photographic imagery and memory only in the drawing area, relying on art principles and elements. Other topics are not within the scope. This allows for a more in-depth analysis of the chosen variables, which may provide better understanding of the phenomenon being studied (Gay, Mills & Airasian, 2012).

1.8 Operational Definition

For greater comprehension and clarity, the following terms of study were used in this thesis writing:

- 1.8.1 *Drawing*: The student's expression of the reality surrounding him using paper, pencil and colors (Tachie-Menson, Opoku-Asare, & Essel, 2015).
- 1.8.2 *Drawing creation*: Use art elements to create drawings of reality that are organized according to art principles (Ocvirk, Stinson, Wig, Bone & Cayton, 2012).
- 1.8.3 *Photographic imagery*: an optical source of learning that is created via the process of photography and freezes time and space while reflecting reality (Acar & Kavuran, 2016).
- 1.8.4 *Drawing usage of memory*: The student recalls objects from his memory using his visual memory in the drawing (McManus et al. 2010).

1.9 Outline

After Chapter 1, the structure of this thesis is outlined as follows:

1.9.1 Chapter 2 – Literature Review

This chapter provides a review of related literature for the current study, which includes theories of visual perception and art education that were used in this research. It gives a brief description of the drawing and focuses on drawing creation, photographic imagery, memory, art elements and principles. It also examines the literature on the variables of gender and grade. Furthermore, the theoretical framework for the current study is defined at the end of this chapter.

1.9.2 Chapter 3 - Methodology

Here, the chapter describes the research design used in this study. Design a mixed-method approach that collects both quantitative and qualitative data about the same period. This approach involves using an assessment scale for drawings and conducting semi-structured interviews with students. It also discusses the selection of participants. The chapter describes data collection and data analysis towards its end.

1.9.3 Chapter 4 - Results

This chapter presents the results of the data analysis and discusses the findings of the quantitative and qualitative data in order to answer the research of the current study.

1.9.4 Chapter 5 – Discussion and Conclusion

Finally, this chapter discusses the outcomes of the study's main objective, questions, followed by the conclusion. The researcher compiles the study's contributions at the end of the chapter and then writes the recommendations.

1.10 Summary

This study seeks to address an important problem in art education among students, specifically in the area of drawing, which is the lack of visual aids and reliance on memory alone. The current study also aims to investigate the difference in drawing creation between referring to a photographic image and using memory, with students' gender and grade acting as moderator variables as secondary independent variables. In short, the primary purpose of this study is to compare the use of photographic imagery and memory in the creation of a drawing; ultimately, the gender of the student and the grade are the intermediate variables that were studied as secondary independent variables.

CHAPTER 2

LITERATURE REVIEW

2.1 Introduction

The current study aims to determine the difference in students' drawing creation by comparing two drawing methods: referring to photographic imagery and using memory. The study also aims to learn about students' perspectives on drawing creation in both methods, as well as the extent to which each method influences the elements and principles of art in students' drawings. This research draws on visual perception and art education theories to determine the difference in drawing creation between referencing a photograph and using memory. Where memory is used to teach drawing and visual sources are ignored. The study relied on visual perception principles to find out the differences in order to investigate this problem.

The purpose and questions of the study were determined using the principles of visual perception theory. The findings of the present study are interpreted in light of visual perception theory based on a top-down, bottom-up strategy and art education theory based on concept art making. Therefore, the theory of visual perception may link the independent variables to the dependent variable, which may represent the study's design and methodology. In this chapter, we use the work of Gibson and Gregory to argue that students' drawings require a visual stimulus as an aid to drawing, and that the use of memory requires a visual stock. Gibson and Gregory's emphasis on visual stimulus and prior experiences in visual perception is useful for the current study because it allows reflection on how drawing is constructed and a comparison of the two approaches. To this

end, Gibson and Gregory's conception of visual perception and art making concept of art education is generative an understanding of the difference between referencing a photograph and using memory in creating a drawing.

Instead of a chronological history, the following literature review includes previous research that was analyzed and evaluated with a focus on those that are relevant to the current investigation. This chapter discusses drawing as one of the areas of art education, the basics of creating drawings for students, and realistic drawing. The chapter then goes over previous studies that dealt with the elements and principles of art in the creation of drawings. The chapter then demonstrates the importance of the photograph as a visual source. The chapter then reviews prior research on drawing teaching methods, with a particular emphasis on photographic imagery and memory use. Then, as secondary independent variables, students' gender and grade level were addressed. Finally, the chapter discusses the theoretical framework for the current research.

2.2 Drawing

Many studies of literature have appeared that addressed drawing and its various styles and methods as an important aspect of art, particularly in art education (Acar & Kavuran, 2016). Drawing is one of the fields of art education that can be described in a variety of ways; there are numerous definitions of it. Drawing is not only a foundation for art, but also for a variety of occupations, according to studies, which emphasize the importance of providing students with practical skills through drawing (Duncum, 2019).

For instance, but not limited to Elsamanoudy and Abdelaziz (2020) emphasised the importance of drawing in the field of design, as well as the need to understand the rules and foundations of drawing. Students are introduced to the fundamental concepts of the design process. Furthermore, drawing is a skill that the student learns through repetition, observation, and continuous execution. As a result, he can learn to draw and use it in a variety of situations.

Although they are similar, there are several ways to determine what drawing means in the studies. Drawing, as defined by Tachie-Menson, Opoku-Asare, & Essel (2015), is the art of creating pictures or designs with a drawing medium such as a pen or pencil. The authors also stated that hand-drawn illustrations and the use of lines to depict shapes on a surface to produce pictures are both examples of drawing.

Drawing is described as the act of creating significant traces on a two-dimensional surface by a human being. This behavior is often on paper with pencil-like tracing devices (Frisch, 2010). Chorpining (2014) identified drawing as a tool creative for the student. However, Kozbelt (2017) defined drawing as the ability to possess the knowledge and skill to convey a set of information that has an impact on a flat surface in a way that supports the evidence and conclusions of the artist and others. See Figure (2.1)



Figure 2.1 Rania Ahmed, National Flower, Observation Drawing,
Wooden Color, 21 cm x 29 cm, 2019

The current study's focus on children's drawings is seen as a step forward from scrabble to reality (Brooks, 2009). Unsworth (2001) believed that drawing is a necessary means of expression, develops in the student with practice, and it is the responsibility of the visual education teacher to guide the student to look and see and record what he sees through the drawing. Unsworth believes that for an accurate drawing, the student should ignore what he knows and try to draw what he sees in front of him. Drawing is seeing and perception; thus, when the teacher gives the student confidence that he can draw and focus on seeing, the student produces thoughtful drawings.

2.3 Realistic Drawing

Many people confuse the naturalistic trend with the realistic trend in art to the point that some people think that it is one artistic school. The difference between the two trends is clear by simply considering each of them. The natural thing is that which is attributed to nature in that it has not been affected by the factors of refinement and development carried out by man for the benefit of society. That is, it is nature that has not yet been subjected to the refinement and embellishment that humans do in order to control it so that it suits needs, beautification and taste. Natural art is the art that depicts rough scenes and landscapes that are not affected by these acquired factors. As for realism, if it confronts the depiction of what is natural, it presents it in a way that incites the viewer to refine it and pushes him to react in order to develop it, present it, express it, and change it. Realistic art has a position, while we see natural art as negative and neutral before nature. It depicts things as they are and is content with It amazes and astonishes the viewer with the accuracy of its depiction (Aziz, 2021).

Naturalist drawing aims to capture nature as it is. We might argue that a naturalist drawing is an aesthetic endeavor to create truthful representations of the external environment. Naturalist painters employ a variety of techniques, tools, and approaches, which might alter with the periods, individual experience, and preference. Over time and across various styles, the terms "naturalism" and "realism" have both been used and interpreted in a wide variety of ways to describe paintings (Bray, 2012). The realist school focused and paid attention to the objective direction and made objective logic more important than the subjective. The painter depicted daily life with complete sincerity and

honesty without including his personal self in the subject. Rather, the painter abstracted from the subject in conveying it as it should be. Therefore, he addresses society's problems through his daily life and also preaches solutions (Aziz, 2021).

Realistic drawing is a type of drawing. This is the type of drawing that is being dealt with in the current study. The pupil learns a range of skills that include realistic observation of facts and learning how to draw correctly. These skills have been favorably expressed in various fields, as stated by Watts (2010). Please refer to Figure 2.2.



Figure 2.2 Salma Daraisah, king's childhood, realistic drawing, charcoal on Canson paper, 50 cm x 70 cm, 2020

Graphical presentation of realism involves considering various aspects that can enhance the drawing, including cultural drawings, motor functions, social experiences, and the perceptual system. This is particularly important when observing objects in the environment. (Cohn, 2012). Lowenfeld and Cizek believed that drawing from reality and involving the student in the process may lead to the loss of their ability and innocence in art (Mortazavi, 2001). Researchers were concerned about the early development of creative skills in young children and the apparent decline in both interest and ability as children progressed through primary school. School administrators were concerned about the steps taken to help students improve their drawing skills (Liu, 2007).

despite the fact that realistic drawing is either prohibited or completely ignored in the classroom (Clare, 1983). This could be due to the widespread belief that realism kills creativity and has a negative impact on students' personalities. Many children want to master their realistic drawings accurately, so they need the help of their teachers and know-how. At the same time, it is the teacher's responsibility to improve the child's drawings by suggesting different approaches (Watts, 2010). For example, if a teacher focuses on a child's drawing, he can learn how the child interacts with his environment and how the child learns to draw as a result of this interaction (Frisch, 2006). On the other hand, it is possible to believe that teaching children to draw realistic drawings is not considered a limitation of a child's creativity, but rather similar to learning the proper principles of creative writing. Thus, increasing the knowledge and information that children receive increases their ability to produce and innovate.

The language of drawing not only specifically for fine art or design purpose, but it's also covering some others disciplines such as architecture. One of the most important aspects of an architect's education is the teaching of freehand drawing (Białkiewicz, 2019). Białkiewicz (2019) confirmed the importance of teaching drawing since it has an impact on architecture students' achievements, highlighted challenges surrounding the usage of drawings in architect education, and concluded that drawing is a form of communication that helps students comprehend and develop perspective.

Children's drawings become more realistic over time as their mental operations progressed, that is the transition from intellectual realism, where children draw what they know, to visual realism, where they draw what they may see (Duncum, 2019). In order to share the artwork with others and the surrounding environment, the student needs to transform the idea of the artwork from a mental concept into a visual and tangible form through a method that facilitates this transformation (Riley, 2018). As a result, they require visual stimuli to expand their visual inventory and thus assist them in drawing.

2.4 Drawing Creation and Students in School

In general, drawing is created through memory, observation and imagination. Brooks (2009) considered that the creation of drawing is the result of memory, imagination, observation, and experience at the same time. Integrates, to become the child part of his drawing produced. According to Brooks (2009) making a drawing is a difficult experience. Both of the child's previous and current impressions, as well as intuition and emergent creativity, go into the making of a drawing. Memory, experience, creativity, and

observe all play a role in the drawing. Therefore, the integration of these elements is required for the development of a drawing. Furthermore, many students are dissatisfied with their ability to draw mental imagery correctly and may lack diagrams that allow for full representation of their intended meanings (Cohn, 2012). As a result, it is necessary to be familiar with various aspects of students' drawings and drawing abilities.

On one hand, Numerous studies have examined children's drawings and revealed various aspects related to their drawing. One of these aspects is visual memory. Perdreau & Cavanagh (2015) showed in their study that having a superior visual memory is an important contributor to the ability to draw. McManus et al. (2010) designed a study to assess art students who struggle with drawing. They wish to learn to draw but are unable to do so. McManus et al. linked the inability to draw with dyslexia in art students. They investigated the relationship between visual memory and the ability to draw, as well as the copying of angles and proportions. A questionnaire was distributed to 277 art students for the study. Then, in a stratified design, students were chosen from those who had participated in the previous stage of the study, with a control group of non-art students. An investigation into the development and use of memory in children aged 5 to 12. They were given a test. McManus, et al. concluded that there is a relationship between drawing ability and visual memory. And when visual information is stored in memory, the student can retrieve it when necessary.

In a separate study, Osugi & Takeda (2013) investigated short-term visual memory by retrieving the complex contour shape of an object in three separate experiments. Comparing the state of memory to the state of copying in young adults, they examined the

accuracy of memory for a complex contour. The participants drew from memory an image that was displayed, studied, and then removed, whereas, in the copying condition, the image remained in front of the participants. The results showed that low-frequency information is retained in memory while high-frequency information is lost. These findings, however, cannot be generalized because the memory strategy may vary depending on the characteristics of the visual stimulus.

While Cherney, Seiwert, Dickey & Flichtbeil (2006) examined the relationship between visual realism of children's graphic images and the underlying cognitive processes behind them during two separate types of children's drawings, including drawings of the family and other drawings of the school; to see if drawings related to their memory abilities. The study analyzed the drawings of 109 children aged 5 to 13. The findings revealed that as children grow older, their ability to create more complex drawings improves by adding detail. These findings indicate that older children's drawings are more realistic. As a result, the student must be taught to see the details of the object to be painted in order to produce realistic drawings (Tachie-Menson et al., 2015).

On the other hand, many academics have studied the role of vision in a child's drawing process. For example, Cohen (2005) found that a person can improve his drawing's accuracy by increasing looking to the topic to be drawn. During the creation of the drawing, several changes in attention are required between the object and the drawing, and in turn the visual memory helps to compare the object and the drawing via these shifts of gaze (Perdreau, & Cavanagh, 2015). In addition, providing a student model is a crucial and effective method of fostering his growth in various drawing techniques. Therefore, it

is essential that instructors motivate students to observe their surroundings and draw models. As helpful tools for the development of their drawing skills (Lamme & Thompson, 1994).

Pariser (1979) conducted a study in which he examined two different methods of teaching drawing. The blind contour method that focuses on perception through perceptual cues derived from a three-dimensional object in front of the student, was applied to students fourth, fifth and sixth grade students. And a copying method that focuses on traditional drawings through graphic conventions given to first, second and third grades. The results showed that the contouring exercises improved the students' cognitive-motor abilities. Furthermore, the transcription activity revealed new symbols in their drawings. Pariser's research revealed that copying is not supposed to result in the weaknesses in the student's drawings that Lowinfield feared. His research also revealed that the visual medium assists the student in drawing and increasing his visual memory stock, thereby developing his drawing skill.

According to these studies, paying attention to the visual image as a means and a visual stimulus in the field of drawing would aid the student in learning and developing his drawing skills. In general, children's normal drawing output is based on imitation (Cohn, 2012). Through the foregoing, visual arts lessons can be viewed as a catalyst in the development of students' diverse talents for all forms of expression. As a result, it is critical to consider (Nachit, 2016).

Drawing from observation is a difficult task, and its difficulty lies in the fact that it does not appear on the developmental stage of the individual, and thus the need to