Table Of Content

ISSN 2598-991X (ONLINE)

IJEMD

INDONESIAN
JOURNAL OF
EDUCATION
METHODS
DEVELOPMENT

UNIVERSITAS MUHAMMADIYAH SIDOARJO

Originality Statement

The author[s] declare that this article is their own work and to the best of their knowledge it contains no materials previously published or written by another person, or substantial proportions of material which have been accepted for the published of any other published materials, except where due acknowledgement is made in the article. Any contribution made to the research by others, with whom author[s] have work, is explicitly acknowledged in the article.

Conflict of Interest Statement

The author[s] declare that this article was conducted in the absence of any commercial or financial relationships that could be construed as a potential conflict of interest.

Copyright Statement

EDITORIAL TEAM
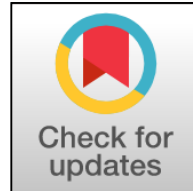
Complete list of editorial team (link)

Complete list of indexing services for this journal (link)

How to submit to this journal (link)

Article information

Check this article update (crossmark)

Check this article impact (*)

Save this article to Mendeley

(*) Time for indexing process is various, depends on indexing database platform

Effect Program Educational Based on According to Raigloth Expansion Theory in Teaching Post-Modern Arts for Students of the Institute of Fine Arts

Pengaruh Program Pendidikan Berdasarkan Teori Ekspansi Raigloth dalam Pengajaran Seni Rupa Post-Modern untuk Mahasiswa Institut Seni Rupa

Hussein Jabbar Mohammed, dr.hussein.j.m@uomustansiriyah.edu.iq, (1)

Mustansiriya University - College of Basic Education - Department of Art Education, Iraq

[1] Corresponding author

Abstract

General Background: The evolving landscape of postmodern art necessitates innovative educational approaches to equip students with the skills and knowledge required to navigate this complex field. **Specific Background:** This research investigates the impact of an educational program grounded in Reigeluth's expansive theory on the teaching of postmodern art at the Institute of Fine Arts in Baghdad. Prior studies have highlighted the need for effective instructional designs that engage students and enhance their cognitive achievements. **Knowledge Gap:** Despite the proliferation of educational theories, there remains limited empirical evidence on the effectiveness of expansive instructional design in the context of postmodern arts education. **Aims:** This study aims to assess the effectiveness of an expansive educational program on students' cognitive achievement in postmodern art compared to traditional teaching methods. **Results:** Utilizing an experimental design with two equivalent groups, the findings reveal statistically significant differences ($p < 0.05$) in post-test scores favoring the experimental group that engaged with the educational program based on Reigeluth's theory. **Novelty:** This research contributes to the literature by demonstrating that an expansive instructional approach can significantly enhance students' understanding and appreciation of postmodern art. **Implications:** The results underscore the necessity for art education curricula to incorporate innovative instructional designs that foster deeper cognitive engagement and mastery of complex artistic concepts. By bridging the gap between theory and practice, this study offers valuable insights for educators seeking to improve instructional effectiveness in the rapidly evolving domain of postmodern art.

Highlights:

1. Impact of expansive design on cognitive achievement in postmodern art.
2. Controlled study shows significant differences in student performance outcomes.
3. Innovative teaching methods enhance student engagement and understanding.

Keywords: postmodern art, educational program, Reigeluth's theory, cognitive achievement, instructional design

Published date: 2024-10-18 00:00:00

Introduction

The philosophy of modern education emphasizes developing the individual's mental and educational abilities to confront scientific development by relying on self-efforts in education, and raising the level of educational performance to achieve educational goals, making the learner the focus of his attention. The educational process and providing him with the experiences, attitudes and knowledge that will help him succeed, and this does not happen through indoctrination and recitation. Rather, it is by providing experience that allows him to continue his education while acquiring the cognitive and performance competencies that the learner needs and to perform his role successfully and effectively (Al-Hadithi, 2003, p. 64).

As a result of the scientific and technological development that the world is witnessing, it is necessary to keep pace with the times through educational programs and their preparation in order to raise the level of academic achievement in the subject of post-modern arts, as this is done by using certain methods, methods and principles within the contents of educational programs that achieve this goal.

Because plastic art is an individual and subjective product and not a collective one, the individual self-learning method is the most appropriate for teaching post-modern arts, especially since there is a tangible deficiency in artistic performance through the students' weak ability to create a work of art. A postmodern painting that expresses some artistic concepts. This is what the researcher sensed by conducting an exploratory study on a sample of students from the Institute of Fine Arts to find out the needs and requirements that would constitute an obstacle to the process of developing their abilities in creating post-modern plastic artwork. It was found that some students lack the skills and mechanisms of creativity and reading. Beautiful postmodern artwork. The reason for this is that they do not have previous experiences that might lead them to create post-modern works of art. However, if the student is directed to the ideal method of teaching using the educational program built according to the expansionist theory of (Raigluth), it may be easier for him to create and read post-modern plastic artistic works, as well as informing the researcher of previous scientific studies and research that dealt with these concepts in their topics. , which prompted the researcher to address this problem by choosing some post-modern artistic trends to teach to students through the program. The educational program was prepared according to solid scientific and educational foundations that take into account modern scientific theories in the field of teaching methods and is based on providing the learner with the opportunity to learn according to his ability so that he can achieve the level that qualifies him to learn these trends.

1.1 literature review

There are Several Studies that have related to Rageloth expansionist theory:-

Abdel Aziz, (2022) conducted study effect of teaching reading texts according to the Regloth expansion model on the acquisition of linguistic patterns and retention of learning among third-grade students in Jordan ,The study aimed to identify the effect of teaching reading texts according to the expanded Rageloth model on the acquisition of linguistic patterns and retention of learning among third-grade students in Jordan from the academic year 2020-2021, where the experimental method and members were used. The research sample consisted of (60) third-grade students at Naqra Basic School for Boys, affiliated with the Qasaba Irbid Education Directorate, and they were divided equally into an experimental group and a control group. To achieve the objectives of the study, two tools were prepared to test linguistic patterns and to test learning retention after verifying their validity and reliability. The results showed that there were statistically significant differences in the pattern acquisition test. Linguistic and in the learning retention test between the two groups, in favor of the experimental group that studied the cognitive content according to the Reigluth expansion model compared to members of the control group.

There are Several Studies that have related to post-modern arts:-

Al-Rubaie (2010) Indicated study to Aesthetic concepts in postmodern art to build a curriculum in the history of fine arts for the Department of Art Education)

The aim of the current research is to Revealing the aesthetic concepts of post-modern art schools. , Building a proposed curriculum for art education in the subject of the history of plastic art in light of aesthetic concepts in post-modern art. The researcher used the descriptive approach, and the research sample consisted of aesthetic concepts in postmodern art (painting) of the art schools (abstract expressionism/popular art/visual art/conceptual art/hyperrealism (Sobrialism)). For the historical period (1945-2008). As for the research tool, a study model was built dedicated to teaching arts in general, and teaching art history in particular .Finally, the fourth chapter included a number of findings, recommendations and proposals. Among the results reached by the researcher are the following ,The multiplicity of concepts of beauty and their impact on post-modern arts, through concepts that characterized the era of fragmentation, difference, superficiality, and the fall of the sacred. Documenting the moment that canceled prior planning and describing it as the moment of collapse that characterizes Abstract Expressionist artists with their individual, momentary style.,The widespread use of various materials and techniques, which eliminated prior planning, so she was described as having an improvisational nature in her dealings with color and technique. And The reliance of popular art on the outputs of popular culture circulated through the media with a new vision that is more influential on the recipient. Adopting visual art, hyper-realism, and the concept of optical illusion.

The research problem can be formulated through the following main question: (Does the educational program based on

Rageloth expansionist theory have an impact on teaching postmodern arts to students of the Institute of Fine Arts(?

Research objective: The current research aims to identify ,The impact of an educational program based on Rageloth expansionist theory in teaching postmodern arts to students of the Institute of Fine Arts. This is achieved through:, Building an educational program for teaching post-modern arts in light of Rageloth expansionist theory. And Measuring the impact of the educational program in teaching post-modern arts by applying it to an experimental sample.

Research Importanc The current research may be useful in identifying post-modern arts and how they are taught by subject teachers ,The current research benefits students of institutes of fine arts and students of preliminary studies in colleges of fine arts because of its importance in learning about postmodern arts. ,The current research may constitute a scientific addition to Iraqi and Arab libraries due to the uniqueness of the research on the subject of Rajelot's expansionist theory in teaching post-modern arts .,The results of the current research may contribute to forming a scientific vision about the extent of the impact of the educational program built according to the expansionist theory in teaching post-modern arts.,The results of the current research may lead to a change in education administrators, researchers, and teachers in developing teaching through adopting educational programs that may contribute to increasing student achievement at various cognitive, skill, and artistic levels.

Methods

2.1 Research methodology

The current research is determined by the following:

1 .Spatial boundaries: Institute of Fine Arts - Baghdad, Al-Rusafa Al-Awal

2 .Time limits: Academic year 2022-2023

3 .Human Frontiers: Fourth Year Students, Department of Fine Arts.

4. Thematic Boundaries: Tutorial, Expansive Rageloth Theory, Postmodern Arts (Abstract Expressionism - Popular Art - Conceptual Art)

2.2.Hypothesis test

1 -There are no statistically significant differences at the level of significance (0, 05) between the average grades of the students of the experimental group who studied according to the educational program based on the expansion theory of (Rageloth) and the control group that studied. According to the usual method in the post-achievement test.

2- There are no statistically significant differences at the significance level (0.05) between the average scores of students in the experimental and control groups in the size of the effect of the educational program based on the expansionist theory on the achievement test in the post-modern arts subject after the test.

2.3 Research variables

2.3.1 Search terms:-

-1 Impact:

It was stated in the Philosophical Dictionary: The effect is the result of a thing, and it has four meanings: the meaning of the result, which is what results from the thing, the meaning of the relationship, which is the characteristic indicating the thing, and the meaning of the thing. The news, which refers to the sayings of the predecessors and not to their actions, is what results from a thing, which is what is called, according to the ruling according to the jurists, the effect produced by an action called an act that occurs on its behalf. For something else, which is, in a sense, synonymous with the meaning or cause of the thing (Saliba, 1982, p. 37).

He defined it (Ibrahim, 2009): "It is the ability of the worker who is the subject of the study to achieve a positive result, but if that does not exist and is not achieved, the factor may be one of the direct causes of the negative repercussions." (Ibrahim, 2009, p. 30).

The researcher defines the effect procedurally as:

(The size of the change resulting from the independent variable (the educational program) in the dependent variable (students' achievement in post-modern arts) and knowing who is the superior group, the experimental group, or the control group, as this is measured through the post-test.)

2-Educational program-:

Rageloth (1983) defined it as: - An integrated set of rules, suggestions and strategies provided by educational theory within

the framework of the determination to achieve educational goals according to the individual's abilities, needs and interests by working according to limited directives and guidelines and making progress. With them in successive steps towards achieving the set goals and then ensuring that they are achieved. The learner obtains the required learning at the end of the program. (Regeluth, 1983, pp. 55-68)

Kemp (1985) defined it as: the set of knowledge, experiences and values that constitute the academic content of the curriculum and determine the nature and directions of the teaching and learning processes carried out by the teacher and learners to implement the proposed educational purposes. And goals. (Kemp, 1985, pp. 10-11)

The researcher defined the educational program procedurally as follows:

The procedural definition of the educational program: - (A group of experiences prepared for the purpose of teaching students of the Institute of Fine Arts (research sample) in an interconnected manner through the characteristics of the educational work, and containing the basic elements, which are the objectives, content, educational activities, educational tools and methods, readings, and evaluation that aim to create a positive impact. In achievement: These units depend on the individuality of teaching and self-learning.

-3 Postmodern arts:

Alain Touraine, (1998) defined postmodern arts as: "a movement that thus pushes to the extreme to destroy the modernist concept of the world - it rejects the functional difference between the spheres of social life (art/economics/politics) and social life." The use of performative reason by both of them, and it completely rejects this separation of higher culture, social and political as well as aesthetic, that culture that tends to the guarantees of the social order behind society, reason, history, modernization. Or the liberation of the working class, and collective culture... He points out that this depends on the media, technology, and the market within the world of symbols. "The information giant that ended the great libertarian narratives" (Alain Touraine, 1998, pp. 233-234).

Mohamed, and Al-Aali, (2007) defined postmodern arts as: a style in culture that reflects something of this historical change, in an art without depth, center, or foundation, an art that is deductive, self-reflective, playful, playful, and poetic. Derivative, eclectic and pluralistic, it blurs the boundaries between culture (just as it blurs the boundaries between art and everyday experience, and what remains in dispute is the extent of this culture's dominance or spread, that is, whether it has come full circle) or whether it represents only a specific scope in contemporary life." (Muhammad, Al-Aali, 2007, p. 10).

While Al-Mashhadani, (2003) stated that postmodern arts are the artistic products that came after World War II and are a mixture of traditional art, anti-art, and the art of chance (Al-Mashhadani, 2003, p. 32)

A practical definition of postmodern arts

(The various artistic trends that emerged after World War II, which were characterized by rapid change, were directly linked to matter, technology, experimentation, and what chance provides, as they cast their shadows on all components of life in general and education in particular. Therefore, they can appear in the productions of students of the Institute of Arts Al-Jamila (research sample) after being taught through an educational program based on the expansionary theory of Rageloth .

2.3.2 educational design:

It is known that the word design is derived from the verb "design", meaning to solve the problem and proceed with it after careful study of matters from all their aspects, and anticipating results of various kinds and to varying degrees to achieve the desired goals. As for the concept of design, from a technical standpoint it means engineering something in some way according to certain standards or process. Situation engineering and educational design is a logical process that deals with the procedures necessary to organize, develop, implement and evaluate education in accordance with the cognitive characteristics of the learner. (Ramadani, 1993, p. 25)

In this era in which technology has leapt and the gap between educational and teaching theories has widened, attention must be given to educational design to transform education from a theoretical framework that relies on memory and memorization only, to an applied form where learners feel within themselves the effectiveness of applying what they have learned in their lives.

Instructional design is the main field of educational technology and is based on various and multiple scientific concepts and principles, the most important of which is "general systems theory," where education has come to be viewed as a scientific system that imposes the application of systems when designing methods, other educational resources, lessons, units, courses, curricula, and even the entire educational process. (Al-Khafaf, 2018, p. 15).

The use of educational design theories and models in content design depends on two successive pillars (Darwaza, 2000, pp. 20-25)

First: Analysis of educational content. A method that identifies the sub-tasks required of the learner to achieve the educational aim. This includes several stages:

1 -Identify the components of educational content (the content usually consists of four main pillars: procedures, concepts, principles, facts).

2- Identify the relationships that govern these four pillars so that they can be controlled.

3-Learn how to analyze content.

4-Actual participation in analyzing the content and its topics.

That is, analyzing educational content is a process through which the author of the educational material identifies its contents, on the one hand, and the mental characteristics of the individual learner, his cognitive ability, previous experiences, and how he learns, on the other hand. On the other hand, with the aim of creating the ideal way for him to learn. The process aims to identify the knowledge and information contained in the content and then organize it in a way that is compatible with the characteristics of the individual learner.

Second: Organizing educational content: It includes the following stages:

- 1 The sequence that starts from general to specific.

2 -The sequence that starts from easy to difficult.

- 3 The sequence that starts from the familiar to the unfamiliar, and this depends on the student's cognitive background.

4- The sequence that starts from the most important to the least important. Importance means the degree of connection between the learned concept and the desired educational goal on the one hand, and the degree of its connection with the learner's reality and environment on the other hand.

2.3.3. Instructional design theories:

Interest in educational design theories dates back to 1971, when the American body supervising curriculum development formed a scientific committee that collected ideas and theories that create specific educational and educational programs. This committee worked to draw attention to educational design theories based on scientific foundations, and to define and employ them with the aim of becoming a standard. Evaluating teaching and learning theories

In 1977, modern educational theories appeared and imposed themselves in education under the name of educational design theories. These theories are concerned with engineering the educational environment, including:

Extended Rageloth Theory:

A theory of instructional design, in which the content of an academic subject is organized at the expanded level, which is the level that deals with the organization of a set of concepts, principles, procedures, facts, and information that constitute the content of a unit of study or the curriculum that is taught in a year, semester, or month.

The expansive theory emerged from the concepts of cognitive theory in psychology, such as the concepts of the Gestalt school, which believes that learning takes place through the whole and not the part, and the concepts of the world (Ospel) about advanced organizations, in which the most important ideas, principles, and general concepts contained in the academic subject are arranged from Public to private. In a hierarchical manner, the advanced organizer forms a foundation that helps integrate the new information it learns with previous information in a meaningful way. It begins by presenting the introduction, which is one of the main general ideas that represent the content of the study material. Then he begins detailing the contents of this comprehensive introduction and the extent of the material learned. Then the detailing stages are followed by summarizing and compiling the detailed material in a sequence from simple to complex and from general to more detailed. (Al-Darwaza) (2001, p. 58(.

Johnson and Faw (1989) were able to arrive at four foundations for this theory after studying the logical structure and procedures used in its implementation:

-1 Hierarchical learning according to the Gagné and Burgess model, which focuses on the development of learning from guidance to problem solving.

-2The spiral model, which focuses on the importance of building links between the new concept and previous concepts.

3- Cognitive Embedding Model: - Ozbel emphasized that new experiences can be acquired if they are meaningful and linked to other parts that include what has been learned, by organizing the experiences in the learner's memory in a hierarchical manner at the beginning.

4 -Cognitive schema theory, which includes the idea of representing knowledge in memory, especially declarative knowledge. The cognitive structure schema represents our understanding of objects and events as a set of labels within concepts called events or objects that lead to understanding, guidance, and learning inferences.

The expansive theory of educational design here revolves around selecting, composing, summarizing, and organizing the content of the academic material sequentially from simple to complex or from general to specific, starting with the main ideas represented by the introduction consisting of general ideas that represent the content of the academic material, then it begins with detailing the material and its size. Then summarizing and compiling. For detailed materials.

This theory is based on three models that depend on the type of educational content to be designed:

a. Conceptual content design model.

b. Conceptual content design model.

c. Procedures content design model (Al-Hila, 1999, p. 53).

Content means academic material that can be relied upon more than the judgments of the teacher himself, including a number of concepts, ideas, and generalizations (Abdel-Mawjoud, 1981, p. 106).

Or it can be defined as "the information and knowledge contained in the educational material that aims to achieve the desired educational objectives. This information and knowledge is presented to the student in print in the form of symbols, shapes, pictures, or equations, or it may be presented to him in audible or audio-visual form (Al-Heila, 1999, p. 127).

2.3.4. Post-modern arts

Postmodern arts witnessed a number of transformations in the path of art and art schools, as art left the traditional means and paved the way for this artistic transformation, the change in materials, techniques, methods and visions as a result of the changes that occurred in thought, and this change in the artist's vision, no matter how much of a role it played, was reflected in his artistic production and led to Demolishing and destroying all that came before, and reconsidering the formal systems, intellectual contexts, and their expressive patterns. It has become necessary for art as a whole to keep pace with the transformations and fragmentations of the era.

2.3.4. 1. Abstract Expressionism

It is one of the artistic movements that emerged in New York in the forties of the twentieth century. It was described as a mechanism to avoid censorship and rationality, and it began to be described with names such as smudges in reference to the dots and spots that accompanied the products of the pioneers of this movement. It was called kinetic photography because it embodies the energy of movement, and lyrical abstraction because it contains the power of emotion and spontaneous movement. It is distinguished by being the art of formlessness and subjectlessness because it is not linked to its general concept with a form or sign as much as it is linked to color and how it is used to express direct emotions. (Al-Qara Ghouli, 2011, p. 205(

It must be noted that this trend has two types: The first type: represented by (Jackson Pollock, Yves Klein, and De Kong), whose productions were characterized by vitality and emotionality, while the second type is represented by the artist (Rothko), who was more abstract and serene, as Rothko's works excelled. With sobriety, his horizontal lines of enormous size and magnitude have become a rule followed in abstract expressionist painting (Smith, 1995, p. 33).

Figure 1. *Mark Rothko, Purple Green and Red, 1951*

It is necessary to point out the works of the American artist (Jackson Pollock 1912-1967), who is considered a fundamental pillar of the trend of abstract expressionism. Pollock was interested in using raw materials in artistic work and sought to express them using new techniques that suit the style of their implementation, in order for Pollock to achieve his goal. This is done by expressing what he called (pictorial sensations), that is, reaching the expression of the subconscious with plastic signs that have nothing to do with the visual perception of the external world. That is, he sought to isolate pictorial sensations, free them from visual memory, and then introduce them into the expressive style of his works, which is essential for Pollock. In order to find his own style that met and embodied these feelings, he began using tools such as trowels, sand, crushed glass, and liquid colors. The method is by pouring or distilling without using a brush or traditional methods. This technique requires the artist to throw the color through a can with a perforated bottom that the artist passes through. A piece of cloth that is usually furnished and of relatively large sizes (Imhaz, 1996, p. 321)
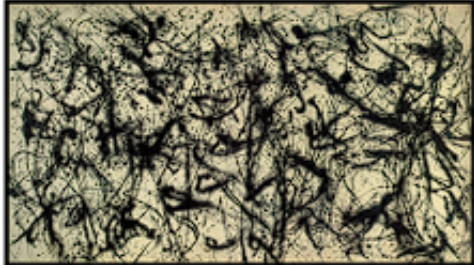
Figure 2. *Jackson Pollock, Untitled, 1950*

2.3.4.2. Popular Art

Pop art emerged as a trend that opposes Abstract Expressionism, aiming to change society, as it created a special way of seeing life for the artist and producing works that present social themes that do not deny the spirit of the times. This artist expressed the hidden feeling of a group of artists who wish to change and criticize inherited and fixed values. Consumer capitalist society. (Al-Bahnasi, pp. 18-19)

The artist Rauschenberg inserted real objects, such as a stuffed eagle or a chair, to make them a stand-alone subject, as in Figure (3). By using and recomposing these fragmented elements of real pain, he wanted to emphasize the importance of existence, and that we are part of a reality we live in, where being becomes an event rather than a symbol. His oil paintings are filled with different types of materials, including newspapers, covers, bags, pieces of rope, a radio, large clocks, and canvas. And many everyday things. Here, Rauschenberg asserts that "a painting is more realistic if it consists of elements from the real world" (Emhas, 1981, pp. 264-266).

Figure 3. *The Valley painting by artist Rauschenberg*

While we see the artist Roy Lichtenstein (1923 - 1997) occupying the highest position among others, especially in his prejudice against the word (art), as he said that organized perception is the goal of art and added that looking at the drawing has nothing to do with any external form that the drawing takes, but rather He must strive to build a unified vision system. Lichtenstein's works were based on cartoon serials, and even the spots that appeared due to cheap color printing were reproduced with intentional precision (Smith, 1995, p. 109), as in Figure (4), The World Drowned. Girl, by Lichtenstein.

Figure 4. *Painting of the Drowned Girl by Lichtenstein.*

2.3.4.3.Conceptual art

Conceptual art emerged from special postmodern intellectual and cognitive sources that attempted to integrate art with life, fight rigid and loose academic traditions, and break free from social and cultural restrictions, systems, and patterns, and even from art itself and its traditional culture. Its manifestations, methods of consumption and reception. Reality becomes the primary field of aesthetic encounter, shortening the distance to the greatest extent. A degree between art and life, and the artist is freed from all means and goes directly to discovering himself and the world, and goes towards direct work with the material of the world, to present a new awareness of existence and a new concept of art. In other words, resistance and rebellion against presenting it as a commodity that can be used by selling it in the art market, so the idea or concept turns

into a machine that creates art. (Imhas, 1981, p. 299).

As for the works of the artist (Joseph Kosuth), in his painting (One Chair and Three Chairs - 1965), which consists of a folding wooden chair, a picture of a chair, and an enlarged picture of what the word chair means in the dictionary. The artist asked his viewers the following question: In which of these three choices can the identity of a thing be determined: in the thing itself? Or what does it represent? Or in the verbal description of it? Or if it can be identified in any of them at all (Smith, 1995, p. 232) (Figure 5). Daniel Wheeler comments on Kosuth's work that conceptual theory can break the visual barrier and penetrate beyond the object or transcend the object into the immaterial space of language and thus be used as a basis for art.

Figure 5. *One chair and three chairs designed by Kosuth*

2.3.5. Theoretical framework indicators

-1 Educational programs are one of the basic elements of the educational process, which must be constantly updated and developed to help achieve good education on the one hand, and meet the needs of society on the other hand.

-2 The expansion theory includes selecting the content of the educational material, composing it, licensing it, and organizing it sequentially, from simple to complex, and from general to more detailed.

-3 The expansive theory was developed to help the learner develop his mental abilities at the level of knowledge, understanding, analysis, synthesis, application and evaluation.

-4 Postmodernism is an open movement that accommodates all the multiple and diverse points of view related to all fields and areas, from the present and the past, the new and the old.

-5In Abstract Expressionism, the artist abandoned some traditional concepts, such as prior design and preliminary study, so that the artist became only interested in what was generated during the work, depending on the primary material and the way it was used or tested.

-6The emergence of popular art (Pop Art) was linked to the development of photography methods, scientific vision methods, and the use of collage and assembly techniques, through which the artist was able to reformulate the forms of reality in new ways.

-7 The interaction of black and white spaces and what their contrast leaves in the eye of the viewer are among the goals of visual art

3.1. Research Methodology and Procedures:

3.1.1. Research methodology:

The researcher adopted the experimental method in designing his research procedures because it is the most appropriate scientific method to achieve the research objectives and hypotheses.

3.1.2. Experimental design:

The researcher adopted an experimental design with two independent and equal groups with two self-tests (pre and post), as the reason for choosing this type of experimental design was for the purpose of controlling the paths of the experiment. As shown in Table (1)

Dependent variable	Posttest	Independent variable	Statistical equivalence	Pretest	The group
-Measuring academic achievementinpost-modern arts	-Cognitive achievement test	Tutorial according to Rageloth expansion theory	-Chronological age -Intelligence -The academic achievement of mothers and	Cognitive achievement test	Experimental

		The usual method	fathers -Previous experience		Female officer

Table 1. *shows the experimental design*

The table is prepared by the researcher

3.1.3. The research community:

The current research community consists of students from the Institute of Fine Arts in Baghdad Al-Rusafa Governorate, first and fourth stage, numbering (178) students distributed among (6) scientific departments. The researcher obtained the necessary data for the components of the research community through the Registration Division at the Institute of Fine Arts in Baghdad Al-Rusafa Governorate. the first. As shown in Table (2)

No.	Department	Number	Stage
1	Fine art	40	Fourth
2	the design	35	
3	Audio and visual	30	
4	Calligraphy and decoration	23	
5	Music	26	
6	The stage	24	
Total		178	

Table 2. *shows the research community*

The table is prepared by the researcher

3.1.3. Research sample:

The research sample was randomly selected from the students of the fourth stage, Institute of Fine Arts, Rusafa I, Department of Fine Arts, and consisted of (40) students, with (20) students representing the experimental group and (20) students representing the experimental group and the control group, and Table (3) shows this.

Number of students	the group	Stage	department	Institute
20	Experimental	Fourth	Fine art	Al-Rusafa First Institute of Fine Arts
20	The female officer			

Table 3. *shows the research sample*

The table is prepared by the researcher

3.1.4 .Research variables:

The variables of the current research were as follows:

-1 The independent variable: The independent variable represents the educational program built according to Rageloth expansion theory and applied through a set of educational units applied to the experimental group, and hidden from the control group taught in the usual way.

-2 The dependent variable: It is represented by showing the results of cognitive achievement among students in the two groups (T, Z), and is measured by the post-application of the achievement test.

-3 Measuring the impact of the educational program on the achievement of students in groups (T, Y) in the post-modern arts subject

-4Extraneous variables (non-experimental(

1- Subject teacher: This variable was controlled by the researcher presenting methods content of the educational program himself to the students (research sample) in groups (T, Z), in addition to the test prepared for this purpose.

2- Time period: The teaching plans were implemented in the 2022-2023 academic year for the first semester, and the implementation period took (6) weeks, with one lecture per week. The first week was for the pre-achievement test, and the last week was for the post-test.

3.1.5 Equivalence of the two research groups:

Equality of the experimental and control groups: Table No. (4)

D.F	The significance level is 0.05	T. Value		SD.	MA.	number	the group	variable
		Tabular	calculation					
38	Not Function -	2,000	0,72	13,11	201,5	20	Experimental	Chronological age
				55,12	200,7	20	Female Officer	
38	Not Function -	2.000	05,1	33,4	8,32	20	Experimental	IQ test
				96,3	5,30	20	Female Officer	
38	Not Function -	2,000	1,65	3,38	14,45	20	Experimental	Pre-achievement test
				2,56	13,55	20	Female Officer	

Table 4. *Equality of the experimental and control groups*

The table is prepared by the researcher

It is clear from Table No. (4) that there are no statistically significant differences between the experimental group and the control group. This means that the two groups are equivalent in terms of chronological age, the intelligence variable, and the pre-achievement test.

3.1.6. Educational attainment of fathers to mothers:

The Group	Sample	T. Value	DF	Parents' Academic Achievement				Significance level
		Calculated		primary	medium	Preparator school	Bachelor's degree or above	
Experimental	20	5,43		2	3	6	9	Not statistically significant
Female officer	20			1	3	7	9	
The group			DF	Parents' Academic Achievement				Significance level
	Sample number	calculated		Primary	medium	Preparator school	Bachelor's degree or above	
Experimental		6,38		1	3	5	10	Not statistically significant
Female officer				1	2	6	11	

Table 5. *results of the chi-square test on the academic achievement of parents of students in the two research groups*

3.2.Search tool

3.2.1 Cognitive achievement test:-

The researcher built a cognitive achievement test according to the educational content of the learning program. This test included two questions, the first consisting of multiple choice items and the second consisting of true and false items. Each question includes (11) objective paragraphs, so the total number of items becomes (22). In the initial form, the content of this test dealt with the cognitive aspects about (the subject of postmodern arts), and the process of constructing its paragraphs was based on the indicators resulting from the theoretical framework, needs, requirements, and related sources. Postmodern arts, taking into account the behavioral goals included in the educational content. For the tutorial.

Validity of the test: - Apparent validity: - After the researcher completed the cognitive achievement test, he presented it in its initial form to a group of experts specialized in the field of art education, teaching methods, measurement and evaluation, as shown in the appendix. (1) For the purpose of identifying the validity of the test components. To achieve the goal for which it was developed and the extent of its linguistic accuracy, some paragraphs were modified and (2) paragraphs were

deleted, bringing the final number of paragraphs to (20). The items received almost complete approval from the experts, taking into account the experts' opinions about the content of the test and the arrangement of some of its items. Thus, the achievement test in its final form can be used to measure the extent of the goal that it was designed to measure.

Exploratory experiment: The experimental test was conducted on an exploratory sample of (100) male and female students who were randomly selected from the students of the fourth stage of the First Rusafa Institute of Fine Arts from the remaining research community. The survey sample students' answers to the cognitive achievement test were corrected, and the difficulty and discrimination factor was determined. Test items according to the following indicators:

A- Difficulty factor indicators:-

The degree of difficulty of the cognitive achievement test was calculated, and it appeared to range between (33% - 60%), so this test is a good indicator of the validity of the cognitive achievement test.

B- Discrimination index for test items:

The discrimination coefficient was used, and it was found that the discrimination coefficient ranged between (32% - 63%). These indicators are considered good, as it has been shown that the items of the cognitive achievement test are clear and characterized by the ability to distinguish between students of the target group from the two groups (higher and lower).

3.2.2. Reliability of the cognitive achievement test:

A- Test and retest method:-

The researcher retested the exploratory sample consisting of (20) male and female students using the Pearson correlation coefficient after a period of two weeks. The stability coefficient calculated in this way was (87.0).

Cronbach's Alpha Method: The reliability coefficient of the Cronbach method was (0.89), which is a high reliability coefficient.

The final test:

After the procedures that were achieved in the previous steps, the test became in its final form ready for application, consisting of (20) items divided into two questions, the first multiple choice and the second true and false questions, and the answer score became (1) for the positive item and (0) for the negative or camouflaged item. . Thus, the highest score on the scale is (20), and the lowest score is (0).

3.3.1. Stages of preparing the educational program:

The researcher adopted the educational program according to the expansion theory of Rageloth , which is a theoretical framework based on the mechanism of designing the educational content of the educational units that were applied to the experimental research group, while the usual method was adopted in designing the plans that were applied to the control group. Below is a detailed description of the unit design steps.

3.3.2. Determine the needs of learners:

It is considered one of the basic steps in building the educational program, as an open survey questionnaire was distributed in which the researcher directed the students studying post-modern arts in the fourth stage with a set of questions to reveal the needs of the learners. Through the various answers, the researcher learned about the type and extent of the problems facing the students and who is among them. (Weakness of the cognitive aspect in terms of concepts and terminology related to the subject of post-modern arts, as well as a lack of educational means and modern technologies in some cases).

3.3.3. Determine the educational content:-

The researcher took the first step in designing the educational program by reviewing the educational content, which includes the vocabulary of the post-modern arts subject, in proportion to the level of learners' abilities at this stage, taking into account the clarity of the content in terms of educational and behavioral objectives and the educational steps for the skills, and limiting them to simple sentences that can be understood. the students. .

Based on the above, the researcher designed (4) educational units for the post-modern arts subject according to the educational program based on the expansion theory of (Rageloth) for the experimental group, and he also designed study plans for the control group. .

3.3.4.Determine educational objectives:

(4) Educational objectives were identified that can be analyzed into behavioral objectives that can be observed and measured as outcomes of the educational process, and were distributed among the topics included in the educational content of the program.

3.3.5. Determine behavioral goals:

The educational objectives were analyzed into behavioral objectives that can be observed and measured. These goals amounted to (24) behavioral goals. The first unit included (6) behavioral objectives that were presented to experts and arbitrators in the field of art education, measurement, evaluation, and plastic arts. Some of them (4) behavioral objectives from each educational unit were modified and deleted, to become (20) behavioral objectives in each educational unit (5). Behavioral objectives in their final form.

3.3.6. Application of the educational program:

After completing the design of the educational program and the cognitive achievement test, it was applied to the basic research sample.

Ninth: Statistical methods: The researcher used statistical methods, including: (t-test, Pearson correlation coefficient, difficulty coefficient, discrimination coefficient, and Cronbach's alpha equation(

Result and Discussion

4.1.1. Results

Since the current research aims to identify the impact of the educational program based on Rageloth expansionist theory in teaching postmodern arts to students of the Institute of Fine Arts, and to achieve the goal of the current research, the following null hypotheses have been formulated:

1-There are no statistically significant differences at the level of significance (0, 05) between the average grades of the students of the experimental group who studied according to the educational program based on the expansion theory of (Rageloth) and the control group that studied. According to the normal method of testing.

To verify the validity of the hypothesis, the sample members of the experimental and control groups were subjected to a post-cognitive achievement test, where their scores in the test were corrected and the arithmetic mean and standard deviation were calculated.

The researcher used the T-test equation for two correlated samples to extract the calculated (t) value and compare it with the theoretical score for the purpose of identifying the differences between the scores of the experimental and control group in the cognitive post-achievement test, as shown in Table (6)

Significance level Statistics	SD	AM	Sample Number	T. Value			Significance level Statistics 0,05
				Tabulation		Calculated	
Statistically significant	20	30,75	6,55	11,65	2,000	38	Experimental
	20	21,56	4,22				Female officer

Table 6. *shows the calculated and tabulated t-test values at the significance level (0.05) for the t-test results for two independent samples for the two research groups for the post-cognitive achievement test.*

The table is prepared by the researcher

It is clear from Table (6) that the calculated value of the t-test is equal to (11.65), which is greater than the tabulated value (2000) at a significance level of (0.05) and with a degree of freedom (38). Thus, the null hypothesis is rejected and accepted. The alternative hypothesis states that there are statistically significant differences at the level of significance (0, 05) between the average grades of the experimental group students who studied according to the educational program based on the expansion theory of (Rageloth) and the average grades of the experimental group students who studied according to the educational program based on According to Rageloth expansionist theory. From the control group that studied according to the usual method in the achievement test. after that. This is because the arithmetic mean of the control group in the post-test of cognitive achievement was (21.56) with a standard deviation of (4.22), while the arithmetic mean of the experimental group in the post-test was (6.55) with a standard deviation. Deviation (6.55).

2-There are no statistically significant differences at the level of significance (0.05) between the average scores of students in the experimental and control groups in the size of the effect of the educational program based on the expansionist theory on the achievement test. On the subject of post-modern arts after death.)

To achieve this hypothesis, the researcher used the eta square equation to extract the effect size of the educational program on the basis of expansion theory. It turned out that the effect size was (76.0), as shown in Table (7).

The group	The number	T-squared value	Calculated T-value	the level	Effect size	AM.	SD.
Experimental	20	135,72	11,65			30,75	6,55
Frmale officer	20			Big	0.77	21,56	4,22

Table 7. *Results of the size of the effect of the differentiated education strategy on cognitive achievement*

The table is prepared by the researcher

From the table above it is clear that there is an effect of the educational program based on the expansionist theory on the cognitive achievement test.

4.1.2. Discussing the results:

1-The results showed that the students of the experimental group outperformed the students of the control group, to whom the content of the educational program was applied according to the expansionist theory that dealt with topics from the post-modern arts subject, in their answers to the items of the cognitive achievement test - the post-test, in favor of the post-test. The reason is due to the process of organizing educational experiences. The educational program is enhanced with artistic displays, educational activities and events

2- It was found that the size of the impact left by the educational program designed according to the expansionist theory among the students of the group that underwent the experiment was (0.77), which represents a high indicator indicating the extent of the educational program's impact. In teaching postmodern arts to fourth-year students, Department of Fine Arts, Institute of Fine Arts.

Conclusion

1-The superiority of the students of the experimental group that used the educational program prepared for the subject of post-modern arts according to the expansionist theory (Reigloth) over their peers, the students of the control group, comes through the process of organizing information and educational experiences and presenting the material in sequential steps, as well as the clarity of the educational and behavioral goals related to performance. Organized cognitive learning is what facilitated the students of this group to learn the educational material, obtain its technical and cognitive information, assimilate and memorize it, and then retrieve and preserve it according to the required educational situations.

2- The process of using educational technologies (datashow, PowerPoint, and computer) in presenting the lesson, displaying non-modern artistic paintings, and in meeting the requirements of the educational content of the program contributed to creating a bridge between these technologies and the requirements of technical and cognitive information. This contributed to the high impact of the educational program by stimulating the motivation and desire of the students of the experimental group to learn the post-modern arts subject.

Recommendations

1- Adopting the educational program prepared in the current research in teaching post-modern arts and circulating it to fine arts institutes because of its positive and effective impact demonstrated by the results of the current research.

2-Preparing various training programs based on educational programs in accordance with modern theories of teaching by faculty members in educational institutions, which may contribute to increasing the cognitive achievement of students.

Proposals

1-The effect of an educational program based on the expansion theory of Rageloth in developing creative thinking among students of the Institute of Fine Arts

2- Developing artistic criticism among students of the Institute of Fine Arts according to an educational program based on Rageloth expansionist theory.

References

1. . C. M. Reigeluth, Instructional Design: What Is It and Why Is It?, Syracuse University, New York, 1983.
2. . J. E. Kemp, The Instructional Design Process, Happer & Row, New York, 1985.
3. . M. A. Ibrahim, Educational Strategies and Learning Methods, Anglo-Egyptian Library, Cairo, Egypt, 2009.
4. . N. Turin, Criticism of Modernity/Micromodernism, S. Al-Jahim, Ed., Ministry of Culture Publications, Syria, 1998.
5. . M. F. Al-Hadithi, "Designing a training program to take advantage of environmental materials (jute) to master the performance of craft skills," Teachers College Journal, Al-Mustansiriya University, vol. 38, Baghdad, 2003.

6. . M. M. Al-Hilla, Educational Design: Theory and Application, 1st ed., M. D. Al-Ghazawi, Ed., A. H. Al-Bajja, Ed., Amman: Dar Al-Masirah, 1999.
7. . I. A. Al-Khafaf, Instructional Design and Multimedia, Osama Publishing and Distribution House, Nobala Publishers and Distributors, Amman, 2018.
8. . A. N. Darza, Theory in Teaching and Its Practical Translation, 1st ed., Dar Al-Shorouk, Amman, 2000.
9. . A. N. Darza, Curriculum Design Procedures, 4th ed., Documentation and Research Center, An-Najah National University, Nablus, 2001.
10. . Z. J. A. Al-Rubaie, "Aesthetic Concepts in Postmodern Art to Build a Curriculum in the History of Fine Arts for the Department of Art Education," Ph.D. dissertation, College of Fine Arts, University of Baghdad, Iraq, 2010.
11. . M. Ramadani, Issues of Celebration Theater, 1st ed., Arab Writers Union Press, Damascus: Arab Writers Union Publications, 1993.
12. . E. L. Smith, Artistic Movements after World War II, F. Khalil, Ed., General Cultural Affairs House, Baghdad, Iraq, 1995.
13. . J. Saliba, The Philosophical Dictionary of Arabic, French, English, and Latin Words, vol. 1, Lebanese Book House, Beirut, 1982.
14. . A. A. Abdel Aziz, "The effect of teaching reading texts according to the expanded Reigeluth model on the acquisition of linguistic patterns and retention of learning among third-grade students in Jordan," College of Educational Sciences, International Islamic Sciences University, Jordan, 2022.
15. . M. E. Abdel Mawjoud, The Origins of the Curriculum and Its Organizations, Cairo: Dar Al-Thaqafa for Printing and Publishing, 1981.
16. . M. A. A. Al-Qara Ghouli, History of Modern Art, College of Fine Arts, University of Babylon, 2011.
17. . M. Sabila and A. S. Ben Abdel Ali, Postmodernism - Challenges, Philosophical Notebooks - Selected Texts, 1st ed., Toubkal Publishing House, Casablanca, Morocco, 2007.
18. . T. S. H. R. Al-Mashhadani, "Intellectual and aesthetic concepts for employing materials in postmodern art," Ph.D. dissertation, College of Fine Arts, University of Babylon, 2003.