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The Effects of Invention of Photography on Illustration

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Abstract: It is an undeniable element that technological developments bring about a rapid and dynamic change in all areas and the necessity of compulsory development. As in all kinds of art, technology has led to radical changes and innovations in plastic arts and has brought diversity and difference to art production techniques too. The birth of photographic technology has provided an invaluable opportunity to capture and document the moment. Many visual documents and visual evidence, which were previously made in cooperation with painters and printmakers, have now become available as subjective, without the need for mediation of these craftsmen. This visual revolution in photography has profoundly influenced many methods of visual art production, and the production of photographic images without photographs has now required the production of photographic technology. As it was the moment, and without any commentary by any illustrator, it directly replaced the traditional illustration production techniques and illustrative drawings in terms of photography, credibility, and reliability as the highest visual material, leading to a decrease in the demands on illustrators. The illustration, which is an indispensable communication and graphic material in terms of supporting the text, strengthening the expression and visualizing the subject, has become a kind of unfashionable art which has been disrupted in the early stages of the spread of photography. In this study, it has been examined that the negative effects of the photography's invention in its early period to on illustration art and it has been researched that illustration having its glory again by starting commonly apply collaborations of photography and illustration.

Keywords: Illustration, Photography, Technology, Art

Introduction

The production of materials and tools that contribute to the creation of the work depends on the cultural production of societies. Technological changes and developments affect the social production of art. For example; The widespread use of the printing press and the increase in use, due to the use of paper, not papyrus nor parchment. Thanks to the books that became reproducible and easily accessible following the expansion of the printing press, the literacy rate in the society gained momentum and paved the way for a rapid flow of information (Tezcan, 2018, p:40).

Illustration art, which is one of the plastic arts fields, has been used in many fields from past to present and has enabled many aims to be realized. In its historical progress, the art of illustration has shown different changes with technological advances like many other plastic art disciplines.

With this study, positively and negatively affects the results of effects and the way of effects of photograph technology which affected almost all branches of fine arts to illustration art which has been existing before the photography, have been researched.

The aim of this study is to present the development and the effect of the illustration, which is an artistic expression that can now exist independently of the book and the text, against the dominant effect of the photographic technology and to present a written resource for the researches in this field.

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The study covers the art of illustration and its current state during the historical process in which photography emerged and became widespread.

Defining and History of Illustration

The term illustration is literally a drawing, a picture or even a diagram that accompanies, adorns a book article or ad text (Borgman, 1979, p:8). There are different views in the researches about the birth and the first appearance of the art of illustration which aims to explain the text to the reader or the viewer through a more effective and efficient communication method.

In fact, it is known that many branches of art that exist today are from ancient times. The cave drawings in the south of France and northern Spain are believed to have been made 30,000 to 60,000 years ago. These illustrations, which invalidate elements such as lack of technical and material, with great anatomy knowledge, observation, and visual memory, and exhibit great talent by depicting wild animals while flying or resting, are among the first examples of ancient art products embroidered on the insurmountable depths and rough walls of caves and their purpose is still unknown (Cleaver, 1969, p:11). We can say that the art of illustration started with the line (Loomis, 2012, p:19).

There is a disagreement between the experts who associate the birth of illustration art with these cave paintings and the experts who argue that illustration is a book illustration art and that history can only begin with the appearance of the book. According to Cleaver (1969); The ancient Egyptian civilization was a civilization that believed in life after death and cared very much for the existence of this life. The ancient Egyptians described the life they predicted after their death in sarcophagi and parchment (Cleaver, 1969, p:11).

When we associate the emergence of illustration with books, and therefore with the emergence of paper, we encounter corn parchment and papyrus with the first examples of illustration.

These papers which were thought to belong to the date range of 1000-945 B.C., which were named "P-apu" by the ancient Egyptian civilization were derived from Greek and Latin languages and turned into today's is "Papyrus" and used by these civilizations as text and painting surface (Smith, 1901, p:142). The first examples close to today's concept of illustration are the parchment rolls called Ramesseum Papyrus and Egyptian Book of the Dead, which has survived to the present day. These works, which are the oldest examples of manuscripts, are also parchments that form the basis of contemporary illustration art (Dalley, 1982, p:10). The mentioned examples are recorded in books and articles as the first example that has illustrative works on papyrus. The invention of modern paper obtained from fibrous structures and cotton pulp belongs to a different civilization and a different time period.

According to some sources, the paper formed by the processing of fibrous materials and cotton was first produced in ancient China. "Ts'ai Lun" who has been a statesman in Ancient China, is mentioned as the inventor of the paper made by this technique. Therefore, sources refer to his name as the ancestor of today's modern paper. The first appearance of the modern paper in this way, occurred in 105 B.C. (Smith, 1901, p:143).

The art of illustration has gone through different technical and technological phases until its present state. The art of illustration, which is connected to a book or a written text, has been able to adapt to these reproducible literary materials by the development of reproduction techniques. Especially according to the innovations in the field of printing and printworks, the illustrations which were first processed as manuscripts later became reproducible by printing techniques.

The first illustration works produced by printing method were made with woodcut printing technique. (Eczacıbaşı, 1997, p:841). High printing techniques were followed by metal printing (engraving), lithography (stone printing) and serigraphy, and the works including illustrations in history were reproduced in this chronology followed up too.

The technical developments up to the present day have made affect the illustration art as well as in all plastic art fields with their ability to reproduce and ease of material. Until the invention and diffusion of photography, the art illustration was used for visual document creation, historical events, visualized important moments and has become a method of communication against the public or targeted individuals. The illustration as a visual document, reflecting the text and a detailed workable visual expression method has gained a great mission in this regard and continues this mission today.

The invention of photography has affected many areas and created a whole new channel for presenting visual data to society. This situation has changed the perspective of the art of illustration as in every field.

Defining and Invention of Photography

Whether the camera or photography machine, indiscriminatingly digital or film, we can say is basically a dark box that sealed and not let leak the light. A front lens allows light to penetrate, while the photosensitive material inside captures the image (Richter, 2006, p:5). The basic operating principle of cameras is in this direction. The concept of photography is the name of the image captured through this mechanism.

1826 is the year commonly mentioned for the invention of photography (Ertan, 2005, p:57). Through his intense and long experiments, Nicephore Niepce explored ways to print the traces of the images he had projected on a stable surface by using chemicals in a dark room. In 1826, with his portrait he managed to expose and stabilize, Niepce went down in history as the inventor of photographic technology (Özer, 1976, p:20). Image transfer to the surface covered with chemical solutions has been replaced by devices that work with digital sensors called "d-slr" in today's digital age.

With the cameras, the objective world is recorded as reflected. The light reflected from the object leaves a mark like a footprint left in the sand as a physical trace, and this principle differs from other visual expression techniques with a sharp boundary. The photo reflects the truth and promises an objective view and reminds us of the passing time as "this was there". (Turan, 2014, p:1). Photography has become an irresistible competitor in reflecting the truth to the illustration artists that they produce by adding their own interpretations and styles with the objective images it presents and was used predominantly in the period when it became widespread.

As a branch of art, photography began to be used in many fields in the period when it emerged with its very short and dynamic development. It has evolved in many areas from daily life to art, following historical events, scientific studies and experiments. Nowadays, photography, which has gained an artistic quality in general, weighed in with this quality (Ertan, 2005, p:57).

Although photography was devoid of color and presented black and white images in the early stages of its use, the idea that it reflects reality was not harmed by the society and black and white images in the face of this great invention, the fact that the colors reflect the exact truth took second place by society. According to Bodur (2006); Peter Henry Emerson (1856-1956), one of the pioneers of Impressionist and realistic art style, stated that photography technology is the most creative invention. However, in the first period of its use, photography was insufficient to reflect the colors of nature and to determine as it is, and this was seen as a deficiency. The image presented by the photograph was reflecting the naturalness with reducing it. In order to avoid this lack of perception by the demanding individuals, the photographs were tried to be colored manually. This sometimes led to the use of pigment that was so intense that it would distort the photographic quality of the photographic image (Bodur, 2006, p:79).

The Effects of Photography on the Art of Illustration

Socially important developments and technological advances have led to compulsory changes in every field. In the face of the innovations and conveniences brought about by the era, an effort has been made to rearrange and adapt to these innovations in many techniques.

In spite of individuals who are saturated with innovations at today's cultural level and less astonished with new inventions, photography has had a huge repercussion at the time it was invented, caused people to mislead that it is an invention between science and witchcraft. The physical and chemical process that takes place in a dark box or a dark room remains a mystery that cannot be deciphered and difficult to understand for a society that does not have access to pre-digital information that easily.

Many image reflection techniques such as camera obscura and camera lucida are tried to be conveyed to individuals with technical illustrations, thus making this mysterious process understandable. Likewise, technical illustrations were used to explain the invention of photography, exposure and stabilization processes to individuals.

Photography became an outstanding art field than the other fields with its physical and chemical steps in the process of creating an image (Satkın, 2015, p:7). The fact that photography is a window to the concrete world has also made it more convincing than other branches of art. The society, which has previously followed important developments, historical events, and inventions with the art of illustration, has started to give less value to the art of illustration by adopting a more realistic image with the photography.

Despite the difficulties of photography due to the long and complex processes, many artists saw it as a short way to produce art. It would no longer be necessary to spend many years in art education and it would not take as much effort to produce works that reflect the truth. Other group of artists saw this reality as a threat. Paul Delaroche, in response to the invention of photography, declared that painting has died from today. He and the other artists who against this new technology that Daguerre said about "with this technology, the people can be able to create the most detailed images in just a few minutes without any chemical and physical knowledge" in 1838, saw it as a threat for the art (Encyclopaedia Britannica, 2019).

Ironically, the art of illustration, although threatening its own existence at that time, has visualized photographic technologies and experimental stages and has become a visual window that provides the audience with information about the process. Although it is an objective imaging method of how the camera and photographic materials work, photography has been insufficient to show the detail of the illustration and the visible surface of the illustration and has had difficulty in replacing the illustration especially in technical and scientific fields.

Photography has taken its place in human life with its practicality and has caused the unemployed artists who earn money and earn their living through the art of painting in Continental Europe. On the other hand, by taking this mission of the artists who are obliged to reflect reality, it freed them and this situation suppressed the current of realism and enabled the creation of different alternative currents. In this way, it can be said that photography has contributed to the formation of great changes in the field of art and culture. The fact that photography destroyed realism in painting by presenting realistic images caused painters, who no longer demanded to make realistic paintings, to create artistic movements that emphasize the artist's interpretation rather than reflecting the reality such as impressionism, pointilism, fauvism and Dadaism (Bingöl, 2017, p:4).

The art of collage, which emerged with the increase of printed visual materials, also benefited from printed photographs. This later led to the use of collage technique in the art of illustration. Illustration artists and designers who use traditional illustration production techniques, especially in the field of fashion illustration, frequently use collage technique. On the other hand, digital collage technique can be applied in digital illustration production techniques. With the introduction of digital photography, the ability to process images in digital media has enabled these reproductions to be reproduced as manipulations.

Conclusion

The art of illustration, which is frequently used as a visual expression tool for scientific experiments, historical events, new discoveries and new places discovered, has been freed from these tasks with the invention of photography. Individuals who demanded a detailed and realistic picture of the idea they want to visualize preferred the ease of photography to the art of illustration. The art of illustration, which is suitable for detailed craftsmanship and detailed narration, came to the end of his reign with the ability to present one-to-one images of the photograph and lived a stagnant period.

We cannot say that the invention of photography completely hindered the art of illustration and caused it to decline. Although it was a great competition for illustration artists at that time, photography took the mission of documenting the reality as visually with its existence and caused the liberation of illustration art like many other branches of art. Illustrators, who continued their works according to the demands of the past, searched for more aesthetic interpretation forms in terms of artistic aesthetics in this period when they could be free and tried to observe the effects of different currents and styles in their works.

As a result, with the emergence of the art of photography briefly caused the illustration artists to become unemployed and provided the illustration art to enter a short pause. On the other hand, this negative process has greatly contributed to the shaping of today's illustration art, and the concept of artistic illustration has emerged instead of the illustration understanding which serves only a specific purpose and is dependent on the text.

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