The fold as a Concept Structure in Architecture of Post-Modern Time

Fatemeh Ghafari Tavasoli

Submitted to the
Institute of Graduate Studies and Research
In partial fulfillment of the requirements for the Degree of

Master of Science in Architecture

Eastern Mediterranean University October 2012 Gazimağusa, North Cyprus

Approval of the Institute of Graduate Stu-	dies and Research
	Prof. Dr. ElvanYılmaz Director
I certify that this thesis satisfies the requirem Science in Architecture.	ents as a thesis for the degree of Master of
_	Assoc. Prof. Dr. Özgür Dinçyürek Chair, Department of Architecture
We consider that we have used this thesis and t	hat in ann aniai an it is fuller adacusts in assure
and quality as a thesis for the degree of Mast	hat in our opinion it is fully adequate in scope er of Science in Architecture.
-	Assoc. Prof. Dr. Hıfsiye Pulhan Supervisor
	Examining Committe
1. Assoc. Prof. Dr. Özgür Dinçyürek	
2. Assoc. Prof. Dr. Hıfsiye Pulhan	
3. Assoc. Prof. Dr. Yonca Hürol	

ABSTRACT

This study presents the theoretical background of the folding theory under the flag of

Post-modernism, considering its features. This thesis contains five chapters

including the introduction chapter. The second chapter is an investigation through

the concept of Post-modernism. The chapter is briefly mentions its historical

background and features of Post-modernism. The third chapter is a bridge between

the second and the fourth, in order to give a theoretical background to the main

subject, which is the fold. This chapter talks about the fold, its origins and features

through the Baroque and introduces Gilles Deleuze's readings and writings of

Folding. The last chapter is the section that opens the discussion about the Fold and

Folding Architecture. There are certain key ideas that have been discussed. Since

Peter Eisenman is one of the most famous architects of this theoretical field, the

debated issues are will be examined on three of his works as sample studies.

Finally this study founded the idea of Concept Structure, a structure that contains

ideas and theories. Concept structure is a term presented in this study and it discusses

the issue of concept in architecture as a structure, which can be perceived as a system

that works by means of different features of a theory. This structure can be the vision

of a still standing structure in the language of virtual reality.

Keywords: Post-modernism, Concept, Baroque, Folding, and Folding Architecture.

iii

ÖZ

Bu çalışma post-modernizm'in başlığı altında yer alan folding theory ile ilgili

özellikleri ve teorik bilgileri sunar. Bu tez, giriş bölümü de dahil olmak üzere beş

bölümden oluşmaktadır. **Tezin** ikinci bölümde post-modernizm

incelenmektedir. Bu bölümde post-modernizmin tarihi altyapısı ve özelliklerinden

kısaca bahsedilmektedir. Üçüncü bölüm, esas konu olan fold hakkında gerekli teorik

bilgileri sunarak ikinci bölümle arasında bir köprü oluşturur. Bu bölümde fold'un

kökeni ve Barok dönemindeki özelliklerinden bahsedilirken, Gilles Deleuze'nin

folding ile ilgilli yazılarına da yer verilir. Bu konuyla ilgili en önemli fikirlerin

tartışıldığı dördüncü bölüm ise fold ve folding mimari ile ilgili tartışmalardan

oluşmaktadır. Peter Eisenman bu alanın en önemli isimlerinden biri olduğundan

dolayı, tartışılan konular Eisenman'ın üç örnek çalışması üzerinden incelenmiştir.

Son olarak, bu çalışma birçok fikir ve teoriyi barındıran Concept Structure'ın temelini

oluşturur. Concept Structure bu çalışmayla öne sürülmüş bir terim olup, mimarideki

konsept kavramını bir teorinin farklı özelikleriyle çalışan bir sistem olarak da

algılanabilecek bir yapı olarak ele alır. Bu yapı, yapay gerçeklik dilinde yer alan

yapının vizyonu olarak da algılanabilir.

Anahtar Kelimeler: Post-modernizm, Konsept, Barok, Fold, Folding Mimari

iv

ACKNOWLEDGMENTS

I believe in good will, in relief after hard struggle and I believe in God's grace and mercy. This is all I had until this very moment of writing these lines. I would like to thank so many people who never let me go down or feel hopeless; thanks to all good people that I know.

It would have not been possible to arrive this point without the help and patience of my supervisor Dr. Hifsiye Pulhan, my teacher and my good friend, whom has been supportive more than I can tell in few words; she was the one reading and planning step by step; and it felt like being in the safe place, every moment of our conversations.

I would like to thank my dear friend and teacher Yasemin Ince Guney for being so supportive in difficult days, she cheered me up in days that I was down, she was there in all the moments of madness; and attending to her theory class as a guest pushed me too hard to get to my goals.

I appreciate all the kindness and help of faculty members that were aware of my situation and helped me overcome the crisis. Thanks to the dean of EMU Faculty of Architecture and other academicians for preparing the environment well enough, so that I felt comfort and confidence to climb the steps from the beginning of this program till today.

Apart from the academic society, I am thankful to my parents; a father whose perseverance has always been the best and biggest encouragement to mother and us whose tolerance and compassion have always made me feel safe; and to my dearest, my brother, my hopes and dreams.

TABLE OF CONTENTS

ABSTRACT	iii
ÖZ	iv
ACKNOWLEDGMENTS	v
LIST OF FIGURES	ix
1 INTRODUCTION	1
1.1 Background and context of the study	1
1.2 Aim of the study	4
1.3 Research Methodology	5
1.4 Outline of the study	5
2 FOLDING THEORY AND ITS POST-MODERN CONTEXT	7
2.1 From Modernism to Post-modernism	11
2.2 The Post-Modernism: A Tribute to Timelessness	13
2.3 Post-Modern Architecture	23
2.4 Deconstruction and the Idea of Folding	29
3 FOLDING AND THEORETICAL BACKGROUND OF BAROQUE	34
3.1 From Baroque to Folding: Time is not a Boundary anymore	34
3.2 Baroque Space: Space of Folds	38
3.3 Baroque Architecture	40
3.4 Baroque brings up the Fold	47
3.5 Deleuze and Baroque	50
3.6 Folding Architecture: the Post-Modern feature of Baroque	53
4 EISENMAN'S DIAGRAMATIZED ARCHITECTURE AND THE IDEA OF	
CONCEDT STRUCTURE	58

4.1 Folding: A Diagrammatized Architecture	58
4.2 Diagramming the Virtual, conceptualizing the actual	62
4.3 Diagramming Architecture	63
4.4 Eisenman and Diagrammatized Architecture	67
4.5 City of Culture, Galicia, Spain	72
5 CONCLUSION	83
REFERENCES	88

LIST OF FIGURES

Figure 1: Picasso's "Guernica	12
Figure 2: Pruitt-Igoe Housing Development.	25
Figure 3: Lewis Thomas Laboratory, Princeton	26
Figure 4: AT&T Building	27
Figure 5: Robert Venturi, Mother's House	28
Figure 6: The Waxner Center	30
Figure 7: Columbus Convection Center	31
Figure 8: Apotheosis of Saint Ignatius, Andrea Pozzo	40
Figure 9: Francesco Borromini, S. Carlo alleQuattro Fontane, Rome	42
Figure 10: Gianlorenzo Bernini, Ecstasy of S. Teresa	42
Figure 11: Diagram of the Monad.	49
Figure 12: La Maison Baroque.	51
Figure 13: Church of the year 2000.	68
Figure 14: Church of the year 2000.	69
Figure 15: Church of the Year 2000, Elevations	70
Figure 16: Staten Island Institute for arts and science.	71
Figure 17: Diagramming Process of Statan Island Institute	72
Figure 18: Concept Model for of Staten Island Institut.	72
Figure 19: Galicia City of Culture, bird's eye view	73
Figure 20: City of Culture, interior views.	74
Figure 21: View to City of Culture.	75
Figure 22: Major Site Plan, City of Culture	76
Figure 23: Sections, City of Culture	77

Figure 24: Sample Plans, City of Culture.	.78
Figure 25: Concept Model, City of Culture.	79
Figure 26: Passenger View to City of Culture.	80
Figure 27: Passenger View to City of Culture.	.81
Figure 28: View from site neighborhood, City of Culture	82

Chapter 1

INTRODUCTION

Contemporary architecture entered a new realm in the field of design since late 20th century, which is called 'conceptual architecture' and theory is one of the fundamentals in this category of architecture. By the end of 20th century the French theoretician Gilles Deleuze has brought theory of folding in the field of philosophy and opened discussions in different realms such as language, cinema and to some extent in architecture. Architectural designers such as Peter Eisenman, Greg Lynn, Jeffry Kipnis and some others started applying Deleuze's philosophy in the process of conceptualizing.

1.1 Background and context of the study

The term "Folding" is a recent notion that came after the theoretical trend of Post-modernism and has been applied in architecture by the end of 20th century. Post-modernism as a term first arose in architectural society in the 1970s, but it became a popular discussion subject when Jean Francois Lyotard published his book "*The Postmodern Condition: A Report on Knowledge*" in English, 1984. He writes that: "Simplifying to the extreme, I define postmodern as incredulity towards metanarratives".

He is referring above all to the metanarrative presented by science, which has become so specialized and disjointed and it is almost not possible to find a unity in the way that it speaks. The variety of languages and readings causes that Post-

modern's results in different fields face variety of interpretations from the readers' side (Lyon, 1999).

Postmodernism is hard to define, because it is a concept that appears in a wide variety of disciplines or study areas including art, architecture, music, film, literature, sociology, communications, fashion, and technology. It's hard to locate it temporally or historically, because it's not clear exactly when postmodernism begins (Klages, 2003). The movement of Postmodernism began with architecture, as a response to the perceived weakness, lack of sympathy, and Utopianism of the Modern movement. Mostly after Post-modernism, with a historical concern, theorists take a look to the past.

Moving back to the times after Renaissance, Baroque is clearly going for principles and ideas that belong to non-specific period. Baroque endlessly produces folds. It does not invent things; there are already lots of folds coming from different times like Greek, Romans, and Gothic. Eclecticism; collecting ideas and features in order to make new concepts, the idea of having no certain rule to make a difference with the times that rules are above every aspect of Arts, Architecture, Philosophy and every other features of human life. Different periods came along in different times with variety of ideas, which mostly were the continuation of former changes and styles, either in agreement with or in opposition to them. Until Baroque period, changes were completely visible and definitions were made for all the features of arts and architecture (Deleuze, 1993).

Gottfried Leibniz, German philosopher and mathematician, was the one whose theories about Baroque and its characteristics is the source of inspiration for other philosophers as well. Baroque is the main context of the philosophical trend named Folding, brought by Gilles Deleuze French philosopher who started working on his philosophy in the last decade of 20th century, after the theory of deconstruction.

Deleuze's philosophy clearly benefits from the architectural structure of the Baroque church described and illustrated by Heinrich Wölfflin, especially as it allows Deleuze to advance Leibniz's understanding of the soul and his theory of the monad as a "windowless soul" by adding another story to the construction, to account for the relationship between the body and the head; also he has the theoretical background of Spinoza, Nietzsche, Hume, Lock, Bergson, Foucault and some others.

As a matter of fact concept is one of the key concerns of today's architecture; and the concern of architects is to present their ideas in a way that can express the content of their idea in the language of body, structure and space. Although concept is mostly a written manifesto of one's ideas with certain theoretical backgrounds, the process of expressing it in various fields of arts, literature and also architecture makes the real challenge; as a result nowadays it is shown as conceptual art and conceptual architecture.

Indeed the world includes more than its known elements. Conceptualization is undepictable anteriority in which new kinds of things are possibly happening. Conceptual space implies a particular kind of temporality that is neither timeless, nor time-bound (Rajchman, 1998).

The case of "the fold" highlights the difficult relationship that exists between architecture and philosophy. It also reveals a missed opportunity for the discipline that could be found in seeking a critical reading of Deleuze that extends beyond "the fold" and acknowledges Deleuze's longer interest in concepts of movement, sensation, and affect. Fold as a concept brings different issues in the work of architects such as Peter Eisenman, Greg Lynn, Jeffrey Kipnis, Bahram Shirdel and some others. They are reading, analyzing and expanding the theory as a concept in order to prepare the possible architectural alternatives, which show the features of Post-modernity. Lynn's idea of animated form, Eisenman's grids and context-based ideas, Kipnis's analysis of new Architecture in the Post-modern world and landscape in the Folding context, Shirdel's ideas of topology as a cultural and scientific resource of folded and twisted architecture; all are working in a conceptual system of architectural practice.

Conceptual design is a way to make any practice meaningful in a professional perspective and how it will be interpreted is depending on the perception of the observers, the real human in the real world. Concept is an instrument of making harmony in a specific way.

1.2 Aim of the study

The main motivation to make this study is to investigate the fundamental ideas of folding theory including various realms such as mathematics and the matter of subject, which create the basic concept of folding architecture; and in order to understand the context and condition of folding theory itself, to investigate among the features of Post-modernism.

The aim of collecting, interpreting and writing the content of this study is to bring the whole features of mentioned contexts and fields to the point of architecture and find out the concept structure of an architecture that is named folding by means of sample works of Peter Eisenman, as alternative interpretations of his concept.

1.3 Research Methodology

This is a qualitative study based on documentary survey. Most of the information that is collected from different sources in the field of philosophy and architecture are re-interpreted under the scope of the thesis. Considering certain keywords, which are mainly Post-modernism, Baroque and folding, and some other definitions that are basics of the main fields concludes literature survey. In order to visualize the interpretations the thesis is referring to some architectural works of Peter Eisenman as sample studies rather than being analysis of case studies.

1.4 Outline of the study

This thesis contains five chapters including the introduction chapter. The second chapter is an investigation through the concept of Post-modernism. The chapter is briefly mentions its historical background and features of Post-modernism; also it deals with the influence of Post-modernism in the field of architecture; depicting the way architecture came from modernism to Post-modernism.

The third chapter is a bridge between the second and the last one; in order to give a theoretical background to the main subject, which is the fold. This chapter talks about the fold, its origins and features and introduces Gilles Deleuze's readings and writings of Folding, in the end it concludes with the folding architecture.

The last chapter is the section that opens the discussion about the Fold and Folding Architecture. There are certain key ideas that have been discussed. Since Peter Eisenman is the most famous architect of this theoretical field the debated issues are will be examined on three of his works in order to visualize the discussion.

Finally this study founded the idea of *Concept Structure*, a structure that contains ideas and theories. The reason that Eisenman's work was chosen is to investigate his own idea about the matter of concept in the context of folding and making conceptual architecture; his method and how the concept works now in order to give the architect a framework that is originally based on a conceptual background and working as a constructed visible space.

Concept structure is a term presented in this study and it discusses the issue of concept in architecture as a structure, which can be perceived as a system that works by means of different features of a theory. This structure can be the vision of a still standing structure in the language of virtual reality.

Chapter 2

FOLDING THEORY AND ITS POST-MODERN

CONTEXT

It is not easily possible to present a right definition of Post-modernism, some believe that it opposes the idea of Modernism and some say that it is a continuation of modernism in another language including changes and variations. According to Jean François Lyotard a just system of legitimation must emphasize variety and the productive search for new answers to old questions. He develops the concept by first reviewing a multiplicity of non-traditional scientific ranges which have proved rich in recent years, including chaos theory, fractal mathematics, and quantum mechanics. The key feature of these areas of research, which Lyotard believes provides their special strength is that, unlike the incremental and theory-bound work of most areas of the sciences, they actively and imaginatively seek out instabilities and anomalies in current theories (Lyotard, 1984).

Explosion of new communication technologies and decomposition of cultures into tons of subcultures and minor traditions, made us watch the world collapsing while it is outspreading in the same time. Just like the old times, when explorers were finding new maps of the world while traveling to unknown territories; the new post-modern world has its own specific explorers, designers and organizers (Lyon, 1999).

Planners and designers in the past centuries made a map of the planet earth with its oceans, lakes, straits and waterways, faraway lands, outlying islands and so on. So did the post-modern intellectuals and theorists; they tried to draw the boundaries and thresholds of the changing world of post-modernism: complex identities of forenamed, cultures, races, sexual roles, technologies, economic systems, and cyber space and media vision of this world. But it is not true to believe that all those theorists were thinking about the upcoming revolution intellectually (Hassan, 1982).

Post-modern artists are on the one hand architects whom just reflect a vision of the combination of new signs, cultures and media upon a video, a song, a painting or a building; in the name of post-modern condition. All the efforts that have been made through years of evolutions and changes of the visual and communicative factors of human life, in order to open all new horizons to the condition in which he is living, made up a new language. Understanding the language of this era is the only way to survive and going through the situation that sometimes human beings have no idea of (Bertns, 1995).

Between the abstract beauty of technological principles and underpinning of intricate solutions to innumerable minute problems, there is a kind of middle ground, which was overlooked, in the abundant rush to modernity. Here the question of what human life would be in the new world floated unasked, unnoticed (Lessard, 1978).

Speaking of language and variety of narratives it is noteworthy to mention that Lyotard accordingly sees the world as a multiplicity of small narratives, all of which have their own meticulous integrity and sense of importance, but without any priority among all of them. Grand narrative is held to take little narratives under its domination, and is therefore to be resisted (Lyotard, 1977).

Going across modernism created a new vision, a new life style, this renewing needed a different way of communication with the circumstances in order to have a chance to survive in the big vicissitude that was taking place so fast. The first and the best way to communicate are learning the language of this time, the language of post-modern.

It is not easy for everybody to understand the language of Post-modernism, it needs to make a lot of effort; and most of the references of this movement have been written in this complicated language. The Post-modern dictionary contains the vocabulary that made of metaphoric compositions that are mostly impossible to realize easily; sentences are too complicated and sometimes really topsy-turvy, that it is better to give up trying to analyze or understand them. Some say that if you face one of those questions about the meaning of a post-modern text, just pretend that you feel sorry for the ones who cannot analyze them and still have questions to ask, then make another metaphoric complication, hoping that they give up on asking. The point is that the context of post-modern life is as complicated and hectic as its language; so that no one can expect a simple outcome as any kind of arts or texts or the other products from this mysterious factory of post-modern life. This language is similar to a game and the agenda of post-modernism based on this game, turned out to be a kind of game plan. Later it will be more clear that why such a background is needed (Lyon, 1999).

"As far as it is clear, post means after and post-modernism means the era in which comes after modernism. However the ones, who are thinking about issues like post-modernism, still are not in agreement about: is postmodernism the continuity of modernism or they are going separate ways?"

(Bertens, 1995)

Post-modernism recognizes both destructive and expressive meaning of formal language. It recognizes the language of form as communicating sign as well as infra-referential symbol: in other words, it deals with both physical and associational practice, also with the work of art as a form of presentation and representation. It rejects the idea of a single style in favor of a view that admits the existence of many styles, with its own meanings, sometimes enduringly conventional, but more often shifting in relation to other trials in the culture. The most famous single style right before Post-modernism was Modernism; the style with sharp and certain ideas and manifesto with rules, sometimes working as a factory in order to claim the purpose of mass production.

In order to know better about the context of Post-modernism it is inevitable to talk about modernism first. Modernism is a complicated term, which points out the rise of new movements and trends in the field of arts in the 20th century. If one wants to visualize the center of this era that picture would be a kind of non-image; a chaos which surrounded the whole world.

The matter that has been destroyed and vanished in the modern era was the value of the 18th century, the age that is called Enlightenment in the history, the age of wisdom. Besides wisdom, the major value of this era was the idea of development. Great theorists including Francis Bacon, Thomas Hobs, David Hume and others attacked the medieval thoughts.

Intellectuals were very positive that they could use the universal knowledge, wisdom and logic to get rid of all the myths, superstitions, and all the sacred beliefs that prevents the human from improving his life. They believed that this will rescue the mankind from poverty, misery, ignorance, religion and any kind of irrational behaviors that is based on illusions; and this is how mankind will be led to freedom and bliss.

The very fundamental changes in the Western world have been formed during four centuries, 16th, 17th, 18th and 19th. The sacred science turned to temporal. A number of fields such as Geology, Oceanography, Biology, Anthropology, Psychology, Sociology, became the systematic and contiguous subjects of research; and science and cognition became the target of modern human (Lyon, 1999). The first period among those four centuries was the Early Modernism, which started from the mid-1880s and continued until the beginning of the First World War, around 1914. During the last two decades of 19th century the first examples of modern building were built in Chicago, without enhancements and any historical approach. High rise buildings with steel frames; Non-load bearing walls and wide windows were constructed for the first time (Lyon, 1999).

2.1 From Modernism to Post-modernism

The Superman of the 20th century proved that for creating, you should destroy first: Hitler, Mao, Stalin and so on. Nietzsche has been pronounced 'Death of God' and death of Christian morality and metaphysics. By a philosophical assault from Nietzsche, all the pivotal signs, organizations and beliefs of western culture, which has been crashed by the era before, disappeared; just like a puff of smoke. The only thing remained was only dark waves of vanity, nothing, sort of vacuity (Lyon, 1999).

If modernist theorists were not able to have faith into Christian God, Christian morality or scientific development of beliefs, then it was essential to find another base; and it was Niche that has shown the way by his theory of God's death. After that modernists started searching to find some eternal and everlasting values, beyond all the chaos. These artists accepted the heroic role of a superman to rediscover the essence of humanity, an eternal value beyond the chaos; the role of filling the post-Nietzschean vacuity in. the arts aesthetics became the center of their world and found its focal and axial role. Art for Art (Lyon, 1999).

Modern painting was about painting itself, a self-absorbing role for it. Impressionists like Mane and Monet broke the objects down, they crashed and decomposed them, started painting with colored pieces instead of the continuous movement of the brush in order to show play of light on the surfaces of objects.



Figure 1. Picasso's "Guernica" (1937) http://www.viz.cwrl.utexas.edu/node/343

Like the others, it is a response to historical events in this case, the Nazi bombing of the Basque town of Guernica (in 1937). When Picasso completed his canvas, the painting was exhibited at the World's Fair in Paris and brought international attention to the Spanish Civil War. Picasso does not use color, as do his predecessors, and his painting doesn't have quite the narrative arc that Goya's and Manet's do. What we see instead is intensely emotional, a visual representation of chaos, destruction, fear, and despair.

Modern architect Le Corbusier announced the house as a machine for living. The society turned to a bureaucratic, technical and logical machine. Modern art divided the culture into two categories of people, the intellectuals, and the illiterate and ignorant mass of people; and there was no space for the middle class, because the intellectuals were not able to understand this level; and this tendency also provoked them to picture the vision of Elitism. This led to emersion of a specific tendency of "spirituality" between researchers and critics; and their duty was to explain the mysteries of modernism.

2.2 The Post-Modernism: A Tribute to Timelessness

Although the philosophical and architectural movements in the 1960s and 1970s saw themselves as oversetting the earlier Modernist ideas or at least in the same level, they still shared with Modernism a number of fundamental templates. They surely accepted that philosophy and science gradually would be able to understand multifaceted matters including human behavior, creativity, social organizations, ecological systems and aesthetic meaning. They further considered that they would be able to solve many of the world's problems. While most of these movements did not believe in or sought absolute knowledge any more, in the essence of Dewey's Pragmatism, they were optimistic that they could develop

concepts and knowledge adequate for most applied purpose. The new mood engendered a reorientation of the arts and philosophy. Term Post-Modernism in arts, architecture and also photography, and Post-Structuralism in philosophy, the new movements deliberately opposing Modernism and everything for which it mounted (Gelernter, 1995).

There is always a question about the difference between modernism and post-modernism. There is not much clarified distinction between these two movements, which has been agreed. Perhaps because post-modernism- whatever it is- is an effort in order to signify what is going on, and present is obviously understandable by looking back. In the 1870s John Watkins Chapman first used the term "Post-Modern". He suggested "a Post-Modern style of painting" as a way to move beyond French Impressionism (Bertens, 1995).

The world of post-modernism is drawn by map makers, the intellectuals that plan a new world in which does not go so deep and there is no centers in it, some of the most important map makers are: Ihab Hassan, Jean-François Lyotard, Fredric Jameson and the others. Hassan mentions in one of his articles, 'the culture of post-modernism', that he believes the word 'post-modern' has been used by Frederico Du Antis as a reaction to the literal modernism in 1930s.

Contemporary French Post-modern philosopher, Jean Baudrillard whom was affected by Marxist ideas but at the same time had this belief that this philosophy is not sufficient to analyze contemporary capitalist societies; therefore he began to search among recent styles like structuralism and typology, in order to complete Marxism. There is an example for typology in order to explain the role

of signs; which says that if a driver believes that red light means he should stop the car, it does not mean that red has a meaning that includes the word 'stop', green, yellow and red in this case, only give a certain meaning when they are applied in a device named traffic lights. Signs and their meanings and concepts are working just like the example in social life. Baudrillard believes that one of the features of post-modern society is that we all are preoccupied by images. Pop art, cybernetic and media's magical shows, containing their specific surrealistic signs and symbols; represented order that is not real even was replaced with reality, and that is more than real, more real than real. This is what Baudrillard calls it death of the Real, is the motivation for nostalgic efforts in order to revive the Real (Baudrillard, 1994).

Baudrillard in fact does not draw a fundamental distinction between the false and the real:

"A simulation is different from a fiction or a lie in that it not only represents an absence as a presence, the imaginary as the real; it also undermines any contrast to the real, absorbing the real within itself".

(Baudrillard, 1994)

Some assumed post-modernism as the post-industry era. Some others believe that this era is completely different than modern time; of course a number of philosophers Daniel Bell, for instance, repeat this analysis. For Bell, modernity is characterized by the spiritual crisis brought on by capitalism's destruction of the Protestant idea, a crisis that becomes serious since post-modern radicalizes the modernist art and theory:

"In the 1960s a powerful current of post-modernism developed which carried the logic of modernism to its farthest reaches. In the theoretical writings of Norman O. Brown and Michel Foucault; in the novels of

William Burroughs, Jean Genet, and, up to a point, Norman Mailer; and in the porno-pop culture that is now all about us, one sees a logical culmination of modernist intentions".

(Bell, 1976. P.51)

Bell believed that the various kinds of postmodernism were simply the decomposition of modernism in an effort to erase its individual character. Postmodernism honors the instinctual action and denies the subject, and functions as 'the psychological forefront' for a general assault on traditional values and incentives (Bell, 1976).

Charles Jencks wrote about post-modern age that: Post-industry is taking over industrialization so fast; post-modern age is the age of growing countless alternatives. In this era, it is not possible to accept any Orthodox flow without consciousness and humor, because all traditions possess their values and credit. This to some extent is the result of an event that is called explosion of information, manifestation of organized knowledge, global communications and Cybernetic (Jencks, 2002).

The common matter about all the post-modern philosophers is that they are questioning the rationality, scientific and logical pragmatism and absolute rationalism of modernism. Post-modernism was raised in general because it was criticizing modernism. Therefore post-modernism is anti-renaissance, anti-enlightenment and its subsequent rationalism, anti-France great revolution an anti-liberalist, communist and any kind of ideology.

Although modernism offered a determined program and certain extremity for 'after traditions world', post-modernism does not include these specified

principles and clarified boundaries (Lyotard, 1977). All the theorists in this doctrine are not in complete agreement about its entire theoretical but there are some common points between their ideas and some of the key concerns are going to be mentioned in case of this study: Rationality, ideology, pluralism, history, media, language and technology.

Rationality: Nietzsche criticized the uniaxial rationality of the Enlightenment notion; he believed that western civilization has got a sort of rationalistic patriarchy that leads to slavery of the mankind in an intellectual frame. He takes modernism as the biggest problem of humanity. He believes in emotion more than wisdom and he blames Descartes' modern method. "Any scientific method certainly compeers with lies and fraud... wisdom ruins the innovation of life" (Lyon, 1999).

Max Weber (1864-1920) German sociologist criticizes modern wisdom when he says that: "Bureaucratic organization along governmental machine, are in good company to build future prisons, in which mankind will be the Egyptian farmers, obedient and incapable" (Weber, 1905).

Post-modernists believe that the claim of 20th century's history that technology necessarily improves human civilization is a lie.

Ideology: It aims to mobilize people in order to rich specific political targets; it is value-oriented and negates any other opposing ideology. For Niche it is a mummy of a philosophy that lost its statistic. Post-modernism disagrees with any ideology and ultra-narrative. If modernism is the age of creating ideologies, then

post-modernism is the end of ideologies. Lyotard says that: "To simplify extremely, I characterize post-modernism as a disbelief of metanarratives". There upon post-modernism believes in variety of readings and pluralistic society and accepts no ideology as solution to all issues. They believe that sub-matters should replace massive issues (Lyotard, 1970).

Pluralism: Modernism is always about union ship, both in art and idea, but post-modernism is pluralist. Post-modern believes that everything is allowed today. Most of the societies in the western world are now pluralist, different religions, various human races are living together; this makes the main frame and the structure of arts, urban life and also architecture. In traditional societies people are living in their own traditions and beliefs, unaware of other societies' life styles and other aspects of people's lives all around the world. As Charles Jencks said, post-modern age is the era of various and increasing choices (Jencks, 1986)

"One of the fundamental contents of post-modern topic is based on reality or unreality or multiplicity of reality. Nietzschean conceptual Nihilism has an extremely close relation with this unstable flowing meaning of reality. Niche underlines that apparent rational orders are indeed convincing orders. This is how Niche unmasks the face of claim of truth discovery and proves that all these claims are the stuff that he calls them 'power demand". The ones who claim the rationalistic systems, they place themselves superior than people that believe in their claim and then take over them"

(Lyon, 1999. P.23)

History: Modernism and post-modernism have different points of view about history. Modernists take history linear and believe in causes and effects. Michael Foucault says that despite of foretime historians that aimed to prove a kind of continuity and conjunction in the history, it is affected by intersecting trends and progresses that it is not possible to account it as a sequent of a linear plan... there

is no central principle and concept in the history, which can unify the entire phenomenon. In post-modern agenda, time is a complex of ruptures (Zamiran, 1998).

Media: Post-modern theorists believe that one of the qualities of advanced societies is domination of the media; newspapers, magazines, radio, Television and Internet, on different aspects of life. Jean Baudrillard believes that the media has a basic role in orienting the mind of a society (Baudrillard, 1994).

Media is working in post-modern societies, so that the line between reality and none reality is altered and everything turned to a virtual reality; experiencing many things are now possible by the power of internet and cinema. The media age erased the boundaries between cultures. The world has become so small and people are living in a global village (Lyon, 1999).

Language: It plays a basic and determinant role in human's ideology and thoughts, post-modernists believe. Martin Heidegger, German post-modernist philosopher believes that mankind is living in the language and is similar to language; our existence is language-like and we only live in language; our presence in this world depends on language. There are issues that is always raised like language, implication and meaning for us. Mankind and meaning are alive within conversation. Human being is conversation... human being is human until he is speaking... language is the nearest neighbor for mankind. Ludwig Wittgenstein, one of the other famous post-modern philosophers, has this idea about language that says: any usage of words has its own method and in this

points 'using languages' is comparable with 'language game' and each game has its own rules (Lyon, 1999).

Technology: Martin Heidegger published an article named "The question concerning technology". He mentioned the root of the word technology as 'Techne' in Greek language, which means art and artisan. From his point of view although the instrumental definition of technology is true, it is incomplete. The instrumental vision of technology acts like a curtain on the essence of technology; until we take technology as an instrument, we are captivated by demand of dominance of it and therefore we will be unaware of its nature (Heidegger, 1954).

As technology causes changes in nature's image, it changes the human behavior and his motivation and also society's. Modern human is technologic human. Since the nature of technology is invasive so human becomes subjected by technology. Heidegger names the quiddity of technology, Gestel. Gestel is a German word, which means picture frame, bookshelf, weir war, barrier and frame. In his viewpoint, technology surrounds human being like a frame. Heidegger believes that essence of technology is not so much dependent to human rather it is independent. Post-modern has no escape from Geshtel. Post-modern is a viewpoint to Gestel that says it is not allowed to fall in love with technology. In fact Technology is destiny of our age! And destiny is nothing but an inevitable immutable path (Bertens, 1995).

The postmodern is not simply a major cultural shift; it also involves a new relationship between mankind and his environment. In the visionary 'the new

mystic: speculations on an aspect of the postmodern mind' of 1973, Hassan suggests that 'we are witnessing a transformation of man more radical than anything Copernicus, Darwin, Marx, or Freud ever envisaged'. In this age of the new Gnosticism, 'Mind' is becoming its own reality. Consciousness becomes all. This notion that consciousness has absorbed the world plays a central role in what Hassan begins to see as the new postmodern episteme (Bertens, 1995). French intellectuals paid special attention to "How" the words are telling, not "What" the words are telling. Jacques Derrida was famous as the most avantgarde of his time at late 60s. He started the Deconstructivist notion in France. Deconstruction is a tactic in order to decentralizing, a way or a method of reading, which first reminds us the centralization or capitalism of the central point. Then it tries to take the central point down and replace it with the abandoned object. Deconstruction emphasizes on dual contrasts and conflicts of a text, like contrast between male/female. In the next stage, it shows that how these contrasts are connected, how it is possible to take one of side of these dual contrasts as the capital and disregard the other side. In the next stage, it temporarily focuses on suppressing and destroying the hierarchy in order to create a meaning opposing to the meaning of the text; and in the last stage both sides will be deconstructed and subverted. The idea of deconstruction subverts differentiation, and rebuild, in order to create differentiation and to rewrite or redefine. It is playing with meanings; this is similar to the language game (Lyon, 1999).

Gilles Deleuze and Felix Gautari are two French Post-structuralists, they believe that a vast domain of western thoughts is affected by a scientific structure that they call it 'arborescence': a recognition technique that is similar to roots of a tree, vertical. They believe in horizontal movement instead of vertical roots; a Rhizomic¹ movement that is dealing with superficial grafts, flying lines and ends (Deleuze and Gattari, 1987).

A postmodern artist or writer is in the position of a philosopher: the text that he writes, the work that he produces is not governed by pre-established rules, and they cannot be judged according to a definite judgment or by applying common categories to the text or to the work. The works of art are looking for those rules and categories. The artist and the writer are not working with rules; they do not attempt to formulate the rules of what have been done lately (Bertens, 1995).

Postmodernism is "post" because it rejects the existence of any decisive principle; it is not optimist of the existence of a scientific, philosophical, or religious certainty, which will clarify everything for everyone and that, is an attribute of the so-called "modern" mind. The paradox of the postmodern position is that, in placing all principles under the scrutiny of its disbelief, it must realize that even its own principles are not beyond questioning (Bertens, 1995). As the philosopher Richard Tarnas affirms that, postmodernism eventually cannot justify itself on its own principles any more, it has defined itself various metaphysical indications, which are against Post-modernism. Even though Postmodernism does not claim anything heroically it gives certain proposition of us for being the Post-modern intellectual. First, it recommends that final truth or reality is impossible so we should take all the truth-values not as the final truth but as the artifact of interpretation. Truth, reality, or meaning is the matter of

¹ The concept of the Rhizome as developed by Deleuze and Guattari in *A Thousand Plateaus* is highly relevant to a discussion of a shifting configuration of media-elements; a conflation of language systems.

human interpretation so non-interpretation can be the final interpretation so there no final truth and no meaning is final meaning. Secondly, interpretations may come at any time because interpretations are never ending so it suggests us to make our mind flexible and liquid to accept any interpretation, Static; dogmatic or rigid mind cannot be the postmodern mind because postmodern mind accepts everything (Tarnas, 1991).

Motives and time frame is different than other movements and styles in Post-modernism, just like Modernism, architecture is not an exception though. After this new notion arrived, great architects like Ralph Erskine, Robert Venturi, Krier Brothers and others, all departed from Modernism and went for the new directions which kept a trace of their common departure.

"To this day I would define Post-modernism as I did in 1978 as double coding: the combination of Modern techniques with something else (usually traditional building) in order for architecture to communicate with public and concerned minority, usually other architects".

(Jenks, 1986)

2.3 Post-Modern Architecture

The movement of Postmodernism began with architecture, as a response to the perceived weakness, lack of sympathy, and Utopianism of the Modern movement. Critics of modernism argued that the attributes of perfection and minimalism themselves were subjective, and pointed out anachronisms in modern thought and questioned the benefits of its philosophy. Definitive postmodern architecture such as the work of Michael Graves and Robert Venturi reject the notion of a 'pure' form or 'perfect' architectonic detail, instead conspicuously drawing from all methods, materials, forms and colors available to architects.

Robert Venturi wrote the first manifesto for the new view in architecture. Presciently published in 1966, 'Complexity and Contradiction in Architecture', was not fully appreciated until the mood had changed a decade later. Venturi attacked Modernism on two fronts. First, he objected to their rejection of tradition. The Modernists were so keen to stress the unique circumstances of the modern world, he noted, that they lost touch with what always stays the same. Although we know that Modernists had sought timeless principles, their interdiction against preconceptions prevented them from looking for these principles in the history of architecture itself. Venturi rejected this interdiction, and drew attention once again to the history of architecture. Second, his objection was to Modernism's preference for the rational and simple (Venturi, 1966).

Post-modernists spent an expensive amount of the diverse and sophisticated in order to idealization of primitive and start fresh with traditions; they reached visual blandness. Venturi preferred the visual complexities and contradictions in the Mannerist, *Baroque* and Rococo periods, and introduced his readers to the visual pleasure of these traditions (Gelernter, 1995).

Those two themes caught the imagination of the first Post-Modernist architects in 1970s and early 1980s. Bored with unproductive environmental psychology and design methodology movements, and offended by the visual sterility of Modern architecture, these architects returned to a version of the 1950s subjective formalism, which focused on the visual possibilities of a free play of form. But where the 1950s architects played with abstract forms, the Post-Modernists rummaged through history, selected fragments of forms from previous styles and

collaged them together. The traditional forms were taken out of context and stripped of their original meanings; they chose a particular tradition for its visual interest and its vague reference to the past, not because, say, Classicism represented timeless principles, or Gothic represented medieval values. Like 16th century Mannerism, the Post-Modern forms were employed at first in a jokey manner. The early Post-Modernists still used modern construction systems like concrete and steel frames, and so these vaguely traditional forms and details were often reduced to a thin veneer on a basically modern building, included Venturi Mother's House (Venturi, 1977).

Venturi tries to reconnect architecture with human identity; in his opinion, situation is determinant for forms and signs. He considers ornamentations and decorative elements as a part of cultural features of locals that is occasionally usable in new buildings. Most of the post-modernists try to apply signs and symbols that imply certain functions; Venturi's Mother's house is an example of his idea. 'House is House' was his concept to design the building. Venturi and other post-modern architects' intentions are to bring culture, history and tradition to the architects' design priorities. Venturi's Mother's House is the first building that has been built with post-modern trends and is the symbol of post-modern architecture (Venturi, 1977).

Charles Jencks, architectural historian and critic, is one of the famous theorists of post-modern architecture. He published the book 'Language of Post-modern Architecture' in 1977. He recorded 03:23Pm July15th 1972, as the exact moment of modern architecture's death; it was the moment that Pruitt–Igoe housing project was destroyed by dynamite.

After demolition of that Pruitt–Igoe housing project, modernists began to condemn new post-modernism. In Jencks's opinion this caused intensification in their motivations and post-modernist ideology grown faster. He believed that modernist buildings insist on being just simple geometrical forms, glass, still and cement boxes, forms that proclaim with square shapes "I am a cube, nothing more".





Figure 2. Pruitt-Igoe Housing Development designed by St. Louis architects George Hellmuth and Minoru Yamasaki in 1951, destroyed at July15th 1972. http://www.umsl.edu/~keelr/010/pruitt-igoe.htm

On the other hand post-modern denies this much simplicity. Post-modern buildings try to reflect the environment and surrounding context. In the book "Learning from Las Vegas", Robert Venturi, Scott Brown and Steven Iezenour published the post-modern architecture manifesto; they criticized the definitions of modern architecture that limits the form to simple geometry and also describes the architecture in a closed and restricted space (Venturi, 1977).

In his first book, Charles Jencks informs to architects that he believed a double coding in building principles: one for intellectuals and another for the public.



Figure 3. Robert Venturi and Denise Scott Brown. Lewis Thomas Laboratory, Princeton University, Princeton, New Jersey, 1986
https://www.princeton.edu/~paw/archive_new/PAW07-08/07-0123/top25_11.html

Charles Jencks believes that Post-modern architecture is a pluralistic architecture, extremely eclectic, that ennobles differentiations, diversity and alienation. It adopts from various languages and styles. This eclecticism results a kind of inharmonious coordination and harmony, sort of applying the paradoxical subjects, which counts as the second trait of post-modernism (Jencks, 1978).

The AT&T building, designed by Philip Johnson, as a sample of post-modern buildings, is the third trait itself. It displays a type of urbanism and citizenship. Like the other modern skyscrapers, AT&T looks beautiful but it is a mixture of mirrors, imitations and derisions and is a conjunction point for all surrounding buildings. Post-modern buildings have anthropomorphic character; their ornamentations and shapes are mostly explanatory of human shape. AT&T is showing a connection between past and present, gathering old styles and imitating, bringing the nostalgia on and overspending in faking (Lyon, 1999). This architecture explicates the tradition again. It is not just about copying something from the past but this type of architecture re-interprets that time.

AT&T building is not only resuscitation of the past; but also it has a sense of humor in criticizing the past and banters it. Most of post-modern buildings are willing to go back to the absent center, to the central social space; but afterwards they recognize that there is no mutuality in order to fulfill that space. The AT&T building was a commercially well-timed reaction against Miesian modernism and its derivatives:

"The pediment... culminates with symbolic references, depending on one's orientation, to car grilles, a grandfather clock, a Chippendale highboy, and as an in-joke, a monumental reference to the split pediment used earlier by Venturi for his mother's house... The building thrives on this very multivalency that despite all the carping... brought back the representational and historicizing architecture of New York's skyscrapers".

(Karl Galinsky, 1992)







Figure 4. AT&T Building, completed 1984, designed by Philip Johnson http://www.galinsky.com/buildings/att/
https://sites.google.com/site/humanities202/new-york-art-gallery



Figure 5. Robert Venturi, Mother's House 1962 http://jpatel-arch1201.blogspot.com/2010/03/vanna-venturi-house-1962-mothers-house.html

Post-modern architects do it by putting different styles together. Post-modern buildings' statement is not 'this OR that', but 'this AND that', which means that one building can express two different meanings or it can be two things. Post-modern buildings are multi-feature, which means that they can possess different meanings in the same time. According to Charles Jencks all the intellectuals are describing just the late modernism. He believes that true post-modernism is "double coding" of modern art's representation. Post-modernism is archaic, anarchic, amorphous, self-indulgent, and inclusive, horizontally structured and aims for the popular (Jencks, 1986).

Various notions by which rose after the beginning of post-modernism such as Deconstructivism and Folding also follow a number of the features that Jencks mentioned each. And the language of post-modernism made it easier and also sometimes more complicated.

2.4 Deconstruction and the Idea of Folding

Post-Modernism brought issues such as deconstruction and folding in the field of theory and since the theory has a key role in architecture of this period, architecture became involved with those notions. Deconstruction entered the field of architecture in the late 1980s. Diconstructivist architects were influenced by philosophy of Jacques Derrida.

Deconstruction's emphasis on the proliferation of meanings is related to the deconstructive concept of iterability. Iterability is the capacity of signs (and texts) to be repeated in new situations and grafted onto new contexts. Derrida's aphorism, "iterability alters", means that the insertion of texts into new contexts continually produces new meanings, which are both partly different from and partly similar to previous understandings. (Thus, there is a nested opposition between them.). The term "play" is sometimes used to describe the resulting instability in meaning produced by iterability (Derrida, 1977).

Deconstruction has no order or reason. It has no traditional motives and is completely arbitrary. Deconstruction is considered the end, the finale, and a final phase to the architectural history book. It has no values or rules; there is no sense of permanence. This eliminates discussion because the architect has his own singular idea of architecture which nobody but he knows or understands. It is seen as an opposite to traditionalism. It is in breach of the Aristotle Quartet. This among other reasons is why it cannot be a complementary design technique to the traditional approach (Burke, 2001).

One of the very first and most principal buildings in deconstruction style is Waxner Visual Arts Center (1982-1989) in the City of Columbus in the United Sates. Eisenman created a duality in the form of the building by putting a fracture between two parts of the building and showed that none of the two parts has priority to other one; he was showed his concern about the old site, which was an old army university, by designing forms of an army castle on the entrance of the building.

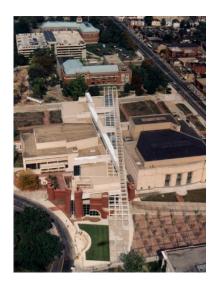




Figure 6.

The Wexner Center deconstructs the archetype of the castle and renders its spaces and structure with conflict and difference.

http://eceozlemleylairemela.blogspot.com/

After Deconstruction the famous notion that entered to architecture was the theory of folding. Folding was one of the most proposed notions of the last decade of 20th century. Fold means layer, layers that there is no priority among them. According to Greg Lynn:

"Folding means to assimilate independent matters in a constant mixture".

(Lynn, Architectural Design, Vol. 63, p.10)

Folding has been discarded verticality, assortment and hierarchy and brings the issue of being horizontal. Eisenman as the founder of Folding architecture

discussed the phrase "weak form", which is a flexible form that adopts itself to the environment.



Figure 7. Columbus Convection Center, Designed by Peter Eisenman, Columbus 1990-92 http://greg.org/archive/2009/02/02/heads_up_roof_as_nth_facade.html

Eisenman tried to show the multi-layer being of the communication lines and connections in the age of Hypermedia by means of his built form. The layers are the same and vertically located next to each other and the complex of the layers make the whole building as a single structure.

Post-modern architecture, art and literature use features with double-coding except modern features, to represent others, in order to show inconsistency and incongruity; by looking back to the past, or a lateral look to local tradition. In this age, mostly, identities are dual, synthetic and hybrid. This is a new thing. Post-modern is including contradictions and conflicts; it is the world of signs, signs that human being is creating to make the meanings more indeterminate; signs that

are making the language game and takes the human mind out of the time frame. It caused plurality and growth of macro-narratives; people are no more believing in them. The post-modern age has been characterized by Indeterminacy and immanence in the same time: the play of doubt and immanence is decisive to the episteme of Post-modernism (Lyotard, 1984).

Deconstruction, folding and all other subtitles of Post-modernism in the field of architecture made it possible to bring the issue of concept more livelily and effective. Concept is the term that refers to the basic idea of some architectural or artistic results that has a foot in the realm of theory. In the new era conceptualization has become a step of visualizing thoughts; some thoughts are transforming to reality and some remain as a state of virtual reality.

Chapter 3

FOLDING AND THEORETICAL BACKGROUND OF BAROQUE

3.1 From Baroque to Folding: Time is not a Boundary anymore

Following the argumentations about the evolutions by which had accrued in different periods and centuries, the fact that time is no more a matter of limitation is understandable enough in order to be flexible in front of numeric changes; no matter when the changes started to begin, change is timeless. Some changes occur by looking back in time, heading to future.

Moving back to the times after Renaissance, Baroque is clearly going for principles and ideas that belong to no specific period. Baroque endlessly produces folds. It does not invent things; there are already lots of folds coming from different times like Greek, Romans and Gothic. Eclecticism; collecting ideas and features in order to make new concepts, the idea of having no certain rule to make a difference with the times that rules are above every aspect of Arts, Architecture, Philosophy and every other features of human life. Different periods came along in different times with variety of ideas that mostly were the continuation of former changes and styles, either in agreement with or in opposition to them. Until Baroque period, changes are completely visible and definitions were made for all the features of arts and architecture (Deleuze, 1993).

Reviewing Henri Focillon's writings, he starts making a confliction between assuming Baroque as a style that belongs to a certain era and those forms that also belong to times outside that period. Unlike Focillon, Walter Benjamin' concern was history, instead of art. Benjamin was the 19th century German literary critic, philosopher, social critic, radio broadcaster, translator and essayist. He takes Baroque as early modernity's obscured face.

So the changes began in no time, limitation has been broken and baroque started to represent the ideas of past in the frame of endless Folds. There are some traits contributing ideas to the concept of multiplicity, including Folds; some of the traits which can be counted as a contribution of Baroque to art in general and a contribution of Libenizianism to philosophy include term The fold, as Deleuze mentioned; *the Baroque invents the infinite work or process* (Deleuze, 1993). In order to being infinite, the matter is how to continue the folds, how to continue to infinity. So in a folding manner being involved with numerous matters makes the infinite and uncountable readings of one story, which does not have any time boundary.

Baroque is the combination of Rationalism and Empiricism; a complex of different priorities; reason and sense. It refers to a trait, an operative function instead of an essence. The Baroque trait twists and turns the folds and pushes them to infinity, fold over fold, and one upon another. The characteristic of the Baroque is the fold that goes to infinity. It is not that simple again. Speaking of multiplicity, etymologically, the multiple can be paraphrased as what is folded in many ways instead of only including many parts. The baroque differentiates its folds in two ways, two different infinites; it makes two levels of infinity folded

upon each other: the pleats of matter and the folds of the soul. The lower level is standing the first type of folds and upper the second type. The two levels are connected of course, the souls cannot include windows and they will go to the upper floor, the place with no windows, this is a darkroom just decorated with a stretched canvas 'Diversified by folds', matter triggers 'Vibrations or oscillations' at the lower part include some little openings in the lower floor. Gottfried Leibniz, 17th century German philosopher and mathematician, was the one whose theories about Baroque and its characteristics are the source of inspiration for other philosophers as well. The vision that Leibniz pictures from Baroque with the pierced lower level, including windows, and the blind and closed upper floor, seems reasoning, the move between two levels are similar to a musical saloon where the invisible movements below turn to sounds above, sounds work like a translator. He believes that in a correspondence between the two levels, pleats of matter and folds in the soul; that correspondence would be a fold in between to different conditions (Deleuze, 1993).

One theory of the etymology of "Baroque" evolved from the word for an irregularly shaped pearl, exclusively prized by 16th century jewelers: that is, grown out of formal regulations and norms in an unpredictable manner. These pearls were called in Italian scaramazze, in Portuguese were called barocco, supposedly derived from the Latin verruca. In France these pearls were called perles baroques from the 16th century and from French the word migrated to other languages. In French the word "Baroque" appeared in the 18th century and quickly became public. In France and Germany it meant 'strange, unusual, bizarre, ridiculous, irregular'; and in Italy the term referred to puzzling

reasoning. In Italian it was not used to refer to the irregular or strange until the end of the 18thcentury (Lavin, 1997).

For Benjamin, in Baroque art (as it will happen in the work of art in the age of mechanical reproduction), the "meaning" and the nature of art is no longer defined by its uniqueness and opens itself to a wider reality and to different values.

Walter Benjamin approaches the Baroque in penetrating, adamantine fashion. His is deliberately not an attempt to categorize a specific historical situation (although there are moments when he seems to do just that); rather, the Baroque figure is central to Benjamin's conception of time and history. For Benjamin the Baroque represents a way of thinking, which is part of his undertaking to critique a linear historical analysis. Above all, it is retrospective, as a mode of understanding the present, modernity, and capitalism (Benjamin, 1998).

The scientific revolutions by which had occurred in the 17th century such as theories by Kepler, Newton and Galileo about center of the world and the scale of measurement and other issues, brought the sense of infinite out in human's conceptions and thoughts. The concept of infinity and extension stated growing in the context of Baroque space as well as other fields of science. All the names and attitudes, which have been discussed in the name of Baroque, bring the words unpredictable, placeless and irregular and many other words that can be different aspects of being infinite.

3.2 Baroque Space: Space of Folds

Leibniz believes that 'the fluidity of matter, the elasticity of bodies, and motivating spirit as a mechanism', cause the elongation of curvature of universe. There is an dynamic power, which allocates matter with a curvilinear or spinning movement, by which assembled the universe, this dynamicity resembles the fluidity; the power is following an arc with no eventual tangent, the arc resembles the elasticity, and the motivating spirit would be the compressive force which has been made by the infinite division of matter; the force is on all sectors of matter and also the surrounding area and neighboring parts, by which wash out and emerge the given body, and that establish its curvature. Dividing endlessly, the parts of matter from little vortices in turbulence are dividing endlessly, and even more vortices in these divisions, even smaller, and even more are spinning in the concave distances of the swirls that touch one another (Deleuze, 1993).

Matter thus offers an infinitely porous, spongy, or cavernous texture without emptiness, caverns endlessly contained in other caverns: no matter how small, each body contains a world pierced with irregular passages, surrounded and penetrated by increasingly misty fluid, the totality of the universe resembling a pond of matter in which there exist different flows and waves.

According to Leibniz two parts of really distinct matter can be inseparable, not only by the action of surrounding forces that determine the curvilinear movement of a body but also by the pressure of surrounding forces that determine its hardness. He also explains that: a flexible or an elastic body still has cohering parts that form a fold, such that they are not separated into parts of parts but rather divided to infinity in smaller and smaller folds that always retain certain

cohesion. The division of continuous must not be taken as, for instance, of sand dividing into grains, but as that of a sheet of paper or of p a tunic in folds, in such a way that an infinite number of folds can be produced, some smaller than others, but without the body ever dissolving into points or minima (Deleuze, 1993).

According to Heinrich Wölfflin, 19th century German art historian, the Baroque is manifested by a certain number of material traits: *horizontal wending of lower floor*, *flattening of pediment*, *low and curved stairs that push into space*; matter is handled in masses or aggregates, with the rounding of angles and evasion of perpendiculars; the rounded acanthus replacing the jagged acanthus, use of lime stones to produce spongy, cavernous shapes, or to constitute a pictorial form always put in motion by renewed turbulence, which ends only in the manner of horse's mane or the foam of a wave; matter tends to spill over in space, to be reconciled with fluidity at the same time fluids themselves are divided into masses (Wölfflin, 1964).

Baroque creates an infinite process, a continuous series of folds in order to invent infinite. Among the folds in the soul and pleats of matter; the infinite fold separates or moves between matter and soul, between the inside and the outside just like the separation between interior and façade. The fold is divided into folds, which are tucked inside and which spill onto the outside, thus connected as are the high and the low; Pleats of matter in a condition of exteriority and folds in the soul in a condition of closure. Baroque space is the definition of an infinity that goes through endless folds of inside and outside.

3.3 Baroque Architecture

In the 17thcentury, the term 'Baroque' did not exist. The language and attitudes that were to feed the future word "baroque", such as "unreasoned", "licentious", and "bizarre" with its implications of immodesty, gathered force from the late 16th to early 18th centuries.

In the *Encyclopédie Méthodique: Architecture* (1788-1825), aimed in part at producing an appropriate public audience for emerging public architectures, Quatremèrede Quincy defines "Baroque" in architecture as a nuance of the bizarre. 'It is, if you like, its refinement, or, if it were possible to say so, its abuse.' For him the essence of the Baroque is its extreme bizarreness, its uncontrolled peculiarity: 'What severity is to the prudence of [good] taste, the Baroque is to the bizarre. That is to say, it is itssuperlative.' It is not simply eccentric, but *bizarrerie*or ridiculousness pushed tothe extreme (Quatremère de Quincy, *EncyclopédieMéthodique*, P.210).

According to Heinrich Wölfflin, the essential characteristic of Baroque architecture is its painterly quality. This term is important and ambiguous and also indefinite with which art history works. A rich Baroque building is more animated and an easy subject for a painterly effect. As He said:

"The freedom of line and interplay of light and shade are satisfying to the painterly taste in direct proportion to the degree to which they transgress the rules of Architecture".

(Wölfflin, 1964)

In comparison it is remarkable to say that the severe style in architecture acts within its real content, and a painterly style acts through what it appears to be, the severe style of architecture is the physical substance, but painterly architecture is

an illusion of movement. Painterliness is based on an illusion of movement. Light and shade are two strong elements of movement according to their nature; a mass of light has no bounds or definite break in continuity and all of its sides are increasing and decreasing, so a mass of light is not making any definite of comprehensible direction to follow. The aim of painterly style is to create an illusion of movement; its first element is composition in terms of light and shade, its second is what is called: dissolution of the regular, a free style or one of painterly disorder (Wölfflin, 1964).

Therefore, Wölfflin's approach is in a sense of architectural fiction and suggestion. In a painting, the solid forms of architectural establishment could appear subtle and suggestive by virtue of the play of light or the adoption of an oblique angle of vision. Wölfflin saw this adoption of architectural form in the realm of painting as an equivalent to the transformation of Renaissance forms in Baroque architecture.



Figure 8. Apotheosis of Saint Ignatius, Andrea Pozzo, 1691-1694-(ceiling *trompe l'oeil* fresco – church of Saint Ignazio, Rome)
http://theredlist.fr/wiki-2-351-861-414-399-423-view-southern-european-baroque-profile-anpozzo-andrea.html

Baroque architecture was not to be understood only in terms of a trip of effects usually exploited by oil paint; it was also diagnostic and communicative of the Lebensgefühl (attitude to life) of their era: Matter is the fundamental temper that formed the products of an age. The critical qualities of architecture were consequently neither conceptual nor contextual:

"Ideas can only be explicitly stated, but moods can also be conveyed with architectural forms; at any rate, every style imparts a more or less definite mood ... Architecture expresses the Lebensgefühl [attitude to life] of an epoch. As an art, however, it will give an ideal enhancement of this Lebensgefühl; in other words, it will express man's aspirations."

(Wölfflin, 1964. P.75-78)

Focillon observed that the contrastive styles of Romanesque and Gothic often crank each other. He believes that they crisscross and sometimes fold vastly various sensibilities into each other. He noticed a "Baroque" status in both styles, when they share features best identified by categories that exponential belong to a later period, for instance, a profusion of moving shapes, the search for picturesque effect. He argues that what might be mistaken, as impoverishment is, on the contrary, a sign of living form. A "Baroque" phase at once sums up, turns upon, contorts, and narrates the formula of all the others. Forms move back and forth, disappear, return, or bring out new shapes when they are superimposed or interlocked (Focillon, 1934).



Figure 9. Francesco Borromini, S. Carlo alleQuattro Fontane, Rome, 1665-67. Façade.

Photograph by Massimo Velo.



Figure 10. Gianlorenzo Bernini, Ecstasy of S. Teresa, 1647-53, Cornaro Chapel, S. Maria della Vittoria, Rome.

Photograph by Gaspare Piazza.

http://www.planetware.com/picture/rome-san-carlo-alle-quattro-fontane-iir1768.htm http://www.studyblue.com/notes/note/n/test-1/deck/692499

Focillon insists:

"The Baroque state reveals identical traits existing as constants within the most diverse environments and periods of time".

(Focillon. 1934, P.15)

Therefore for Focillon "Baroque" refers to a manner of being: Baroque forms live with passionate intensity, a life that is originally their own. They unravel even when they happen; their intention is to occupy space in every direction, to puncture it and to become the one that have all the possibilities (Focillon, 1934).

Allegory

From the work of Walter Benjamin in the 1920s on German baroque drama through later theories of such diverse thinkers as Theodor Adorno, Jacques Lacan, Hans-Georg Gadamer, Frank Kermode, Angus Fletcher, and Paul de Man, the mid-20th century saw a devaluation of the critical fiction of the romantic *symbol* and a corollary elevation of allegory to a sort of master trope for meaning-eliciting or meaning-positing processes in general, both in language and in nonlinguistic media as well (Benjamin 1998).

Essentialpart of Benjamin's Baroque idea is allegory and its *unstable signification*, as the destruction of myth (a view that is at odds with conventional notions of allegory). He argues that allegory, especially allegory about fate, death and melancholy, is the principal element in the aesthetic of modernity and originates in the forgotten and obscured past of modernity – the Baroque. But this is not similar to saying that the Baroque, as if it were just a synonym for "early modern", presages modernity. Benjamin differentiates between what he calls a literary historical treatment of his subject and that offered by the philosophy of art:

"In literary-historical analysis differences and extremes are brought together in order that they might be relativized in evolutionary terms; in a conceptual treatment they acquire the status of complementary forces and history is seen as no more than the colored border to their crystalline simultaneity".

(Benjamin, 1928. P.38)

He is not concerned with conceptualizing the "Baroque" in such a way as to categorize an era. He dismisses 'the view that a modern insight into the different periods of history can be validated in, for instance, polemic confrontations in which, as at great historical turning points, the eras faced each other eyeball to eyeball, so to speak.

It is as ideas, not as concepts, then, that Benjamin finds names like 'Baroque' to be useful:

"... They do not make the similar identical, but they effect a synthesis between extremes ... When the idea absorbs a sequence of historical formulations, it does not do so in order to construct a unity out of them, let alone to abstract something common to them all".

(Benjamin, 1928. P.41)

Benjamin carefully opposes allegory to symbol and believes that the system between them is a relation like the natural world, like mountains and plant, the living progression of human history (Benjamin, 1977). Allegory presents itself as an incomplete ruin. In this image of petrified unrest, the dreams of an era are arrested (Camiller, 1994, P.44). Allegories are always 'allegories of oblivion', because they express the un-freedom of men and women. Neither Trauerspiel nor Tragedy achieves the fulfillment of historical time. Benjamin calls this time the 'idea', the 'historical idea' and 'messianic time'.

The duty of allegory is the representation of history at a standstill. Allegory betrays this duty, like the intriguer operating in the space between expression and signification, representing their division. The result is the destruction of the formal prison of quasi-mythological stasis. Allegory betrays the appearance that it sets out to represent; but as that appearance was untrue, allegory opens up the possibility of gaining truth. Allegory reveals knowledge to be an allegory: 'through the subversion of its own project allegory gives the true name – that of folly – to the attempt of subjectivity to signify objects according to its own will (Caygill, 1981).

"The symbol tries to make the finite participate in the infinite, to freeze the moment into an image of eternity, while allegory inscribes death into signification, making the relationship between appearance and essence one which is provisional and endangered".

(Caygill, 1983. P.217)

For Benjamin, far from being the mere embodiment of an abstract idea, allegory is 'emotional writing' which suppresses the mediations between figure and meaning. As the language of a torn and broken world, the representation of the unrepresentable, allegory fixes dreams by laying bare reality.

"The function of Baroque iconography is not so much to unveil material objects as to strip them naked."

(Benjamin, 1977, P.44)

Benjamin approaches the baroque in intense, adamantine fashion. His is deliberately not an attempt to categorize a specific historical situation (although there are moments when he seems to do just that); rather, the baroque figure is central to Benjamin's conception of time and history. For Benjamin the baroque represents a way of thinking that is a part of his task to critique of a historical linear analysis. Above all, it is retrospective, as a mode of understanding the present, modernity, and capitalism. In Ursprung des deutschen Trauerspiels he analyses the culture of nascent capitalism – hence the book's close relationship with his later work analyzing high capitalism's culture, such as in the Passagework where he tries to find allegories of modernity in the flâneur ²(Caygill, 1998).

² Flâneur: The concept of the *flâneur* has also become meaningful in architecture and urban planning describing those who are indirectly and unintentionally affected by a particular design they experience only in passing. Walter Benjamin adopted the concept of the urban observer both as an analytical tool and as a lifestyle. From his Marxist standpoint, Benjamin describes the *flâneur* as a product of modern life and the Industrial Revolution without precedent, a parallel to the advent of the Tourist. His *flâneur* is an uninvolved but highly perceptive bourgeois dilettante. Benjamin became his own prime example, making social and aesthetic observations during long walks through Paris. Even the title of his unfinished *Arcades Project* comes from his affection for covered shopping streets.

A Baroque space is an allegorical system of Folds. Unlike symbol, allegory is called an unstable signification. An allegorical system works none classified; it is a combination of different elements without rule or specific order, combination of extremes. Allegory with its features is an issue in the process of investigating the fold inside the Baroque. If allegory is an idea that can be extracted from the Baroque, then folds are never ending and instead of printing a significant moment or circumstance in ones mid or picturing or building a single idea, there comes a multitude of ideas not a single concept.

Baroque is the obscured part of modernity and discovering the theory of fold out of it, then the theory of folding in the 90s is one strong evidence of Deleuze's being in track of Post-modernism, anyway according to Benjamin it is not correct to declare baroque as a feature or sign of modernity exactly.

3.4 Baroque brings up the Fold

Reading Leibniz and his theories about the origins and concept of the Baroque, the most important outcome of the whole discourse is of course a title that after more than a century upraised again and became a serious issue in philosophy and also architectural discourse. All the conversation and analysis of diagrammatical definitions of baroque architecture is one of the new paths in architectural conceptualization.

Those folds of Classical periods which has been mentioned before are twisted and turned by Baroque it leads and pushes its Folds to infinity; as Leibniz and Wölfflin described before Baroque is not a style, it is a concept of a style that leads to ideas, ideas as different folds; folds that go to two different infinities and

infinities as two levels. The levels are connected so two infinities are twisted; the pleats of matter are twisting folds in the soul.

The Baroque invents the infinite work or operation. The problem is not how to finish a fold but how to continue it, make it go through the roof, take it to infinity. For the Fold affects not only all kinds of materials, which thus become matter of expression in accordance with different scales and seeds and vectors, but it also determines and brings form into appearance or the line of infinite inflexion, the curves of a single variable (Deleuze, 1993).

It is not easy and classified when it comes to find a sharp definition for 'The Fold' theorists such as Wölfflin, Leibniz, Deleuze and Guattari and some other researchers defined the fold in different words. Deleuze and Guattari in their book on Foucault say that: "The fold is the general topology of thought... 'Inside' space is topologically in contact with the 'outside' space. Fold is a flow moving from inside towards outside and distance is not a matter its case; scale and boundary are not a matter to be noticed as well. A multiple re-reading of a thing that always being seen and reading space under the variable of movements (Deleuze, 1988).

Baroque brings up the talk of fold with all its circumstances and codes, following rules that were discovered later than its time. Monad as Leibniz named it is the soul, the subject. According to former discussions about folds and its constitutive elements monad is one of the most important definitions in understanding idea of the structure of the fold's idea.

Monad

Leibniz assigns the soul or the *subject*, as a metaphysical topic is in the name of: The Monad. This name came from Neo-Platonism and was used designate a state of a Unit; a unity that encloses a multiplicity, this multiplicity is expanding the unit in the manner of a "series". Its envelopments, its implications and explications, are nevertheless precise movements that must be understood as a worldwide unity that complicates all those envelopments and that complicates all the Units. Monads have no windows, by which anything could come in or go out. They have neither "openings nor doorways".

The monad is the self-sufficiency of the inside without an outside. It is correlative same as the independence of the façade, which is not defined by the inside, it is only related with outside. A fold passes throughout living material in order to allocate to the absolute interiority of the monad, the metaphysical principle of life, and to make the infinite exteriority of matter as the physical law of phenomena. Monad is the constant spot that infinite division never achieves, that point closes the space that is infinitely divided (Deleuze, 1993).

Leibniz endlessly draws up linear and numeric tables. He decorates the inner walls of a monad with them. Folds replace Wholes. His Monad would be just such a grid or a tenement with lines of floating inflection (Deleuze, 1993).

As an individual unit, each monad includes the whole series, therefore it imparts the whole world, but does not express it without expressing more clearly a small region of the world, a "subdivision", a segment of the city, a finite sequence, two souls do not have the same regularity, but they do not have the same sequence or the same clear progressive region.

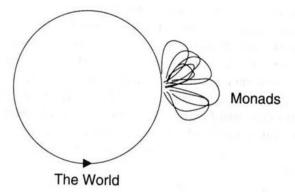


Figure 11. Monad involves with the whole world but it is not completely consistent of it, it expresses a small region rather than the entire universe. http://home.earthlink.net/~aisgp/texts/fold/fold1.htm

Monad is the frame that the world has the possibility of beginning over and over again inside it. According to Leibniz this is the picture of how finitely represents infinity; it is being-for the world instead of a being-in the world. (Figure 24)

Baroque architecture can be defined by ministration of the façade from the inside, of the interior of the exterior, but in such conditions that each of two terms pushes the other forward (Deleuze, 1993).

3.5 Deleuze and Baroque

The origins of Deleuze's interpretation come from his association of Gottfried Leibniz's philosophy on *matter* and *perception*, with the formal qualities of the Baroque, of which Deleuze sees the fold as the primary trait, (Conely, 1993) and particularly with Leibniz's concept of the 'monad', which is used to explain the transmission of information between the sensing body and the knowing soul (Vidler, 2000).

Deleuze takes 'the Baroque', in the figure of the fold, throughout the history of art, science, costume, mathematics, lyric and philosophy. The fold theorizes and embodies the relationships without center. For Deleuze, Leibniz, the first philosopher and mathematician of the pleat, of curves, and twisting surfaces, is also the philosopher of the Baroque fold. He rethinks the phenomenon of "view point", of perspective, of conical sections, and of city planning. In commitment with Leibniz, Deleuze argues that the Baroque fold is far from a decorative element. As a figure, it describes a precise type of thought:

"The Baroque refers not to an essence but rather to an operative function, to a trait".

(Deleuze, 1993)

Deleuze develops an image of what he calls the "allegory" of the "Baroque house" as an instrument in order to clarify the difficult concept of "the fold". In this track he makes direct use of the formal descriptions of Baroque architecture developed by Wölfflin. The diagram is all-together a plan, section, and elevation and resembles several photographic and drawn illustrations of churches in Wölfflin's books that illustrate both a plan and an elevation, or a three-dimensional sketching the one frame. The main point here is that Deleuze's philosophy clearly benefits from the architectural structure of the Baroque church described and illustrated by Wölfflin, especially as it allows Deleuze to advance Leibniz's understanding of the soul and his theory of the monad as a "windowless soul" by adding another story to the construction, to account for the relationship between the body and the head (Deleuz 1993).

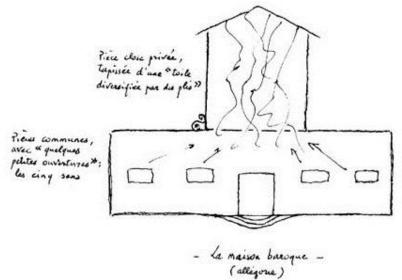


Figure 12. La Maison Baroque, from Gilles Deleuze, The Fold (1993) http://thefunambulist.net/2011/04/03/architectural-theories-diagrams-of-utopia-by-anthony-vidler/

Deleuze's Baroque house in his book on Leibniz includes two floors; the lower floor, as the regime of matter, is in the world, receiving its impression as it were. Here matter is folded in the manner of origami. Caverns possessing other caverns, which enclose still more caverns. There is no boundary between the organic and the inorganic here; both of them are folded into each other in a constant 'texturology'. The upper floor of the baroque house is closed on itself, without any window or opening. It 'contains' substantial ideas, the folds in the soul or the incorporeal aspect of our subjectivity; then there is the fold between these two floors. This final fold is like the style of an artwork. It is in this sense that the upper floor paradoxically 'contains' the whole world folded within itself (Figure 12) (Deleuze, 1993).

This world is one amongst many 'possible worlds' each as different as the entities that 'express' them. In order to make philosophical discriminations, Deleuze draws peculiarly on two formal qualities of Baroque architecture observed by Wölfflin. The "windowless upper floor", represents the autonomy of

the monad (the inside without an outside). (Deleuze, 1993) is explained by the disjunction between the facade and the interior identified by Wölfflin in the Baroque church: "In the hands of the baroque architects the facade becomes a magnificent show piece, placed in front of the building without any organic relationship whatever with the interior." (Wölfflin, 1964. P.93) Similarly, Deleuze's distinction between the two floors is explained by Wölfflin's description of the two major tendencies of movement in the Baroque interior:

"Above all it conveyed an impression of movement, by seeming to be ever in a state of new formation, so much so that given certain proportions it seemed actually to rise upward."

(Wölfflin, 1964. P.115)

As, for Leibniz, the monad is the independence of the inside, without an outside, similar to independence of the façade, an outside without an inside in correlative way. The element of the fold separates and conjoins interior and exterior in the same time. Wölfflin claimed something similar: the contrast between the troubled phrase of the facade and the relaxed tranquility of the interior is one of the most compelling effects in the baroque repertory (Deleuze, 1993).

3.6 Folding Architecture: the Post-Modern feature of Baroque

"Each generation writes its biography in the buildings it creates."

Lewis Mumford

After Post-modernism began to grow time for changes began, change in the system of thoughts and interpretations. During Post-modernism, history regained its respect through different terms; new notions in presenting and representing ideas and thoughts, philosophy, art and also in Architecture came along.

New forms in all realms of intellectual, aesthetic and institutional are generated by constant destabilization of prevailing forms. New forms result as temporary subversions, which are destabilized afterwards. During the Post-Modernization enhanced evolution replaced revolution, the mechanisms of authorization are distributed, the sought space is heterogeneous; a space, which does not follow, established categorical hierarchies and a respect for multiplicity and difference is encouraged. Except for the discussions about the concepts of God and Nietzschean perceptions in such category, Post-Modernism in this conception is broadly affirmative.

The start point for Folding theory was reading the Baroque, investigating the ideas of former theorists and making a combination of the features and definitions to assemble a new system of thoughts. Folding is potentially a tribute to history, as far as studies on the Baroque; it works as an interaction between folds of different times, matters and souls. Gilles Deleuze and Felix Gautarri are the ones that opened the gates from the history to the last decade of 20th century. The Fold's attempt is to show the significance of the work of Enlightenment philosopher Gottfried Leibniz in the contemporary world. The innovation of Deleuze's readings come from his association of Leibniz's philosophy on matter and perception, with the formal qualities of the Baroque, of which Deleuze sees the fold as the primary trait and particularly with Leibniz's concept of the 'monad', which is used to explain the transmission of information between the sensing body and the knowing soul (Conely, 1993).

Anthony Vidler provides a good outline of how Deleuze's "Baroque house" is built up from Leibniz's description of what goes on in the brain from perception to understanding, which was in turn a response to British philosopher John Locke's idea of the brain as a camera-obscure. Leibniz extends Locke's "dark room metaphor for discernment" by adding a screen that is under continuous vibration and has both an active and a reactive force. To this "windowless soul room" Deleuze adds a lower story, "a bodily anteroom". The tangibility of the "baroque house" thus provides both an evocation and grounding for Deleuze's philosophy (Vilder, 2000).

If the formal qualities of Wölfflin's Baroque architecture are interpreted, as Vidler and others have suggested, as symbolic of "a new psychology of the body", then, in Deleuze's translation of Wölfflin, outside of an appreciation of its historiographical context, the Baroque undergoes a double remove, becoming an allegory of an allegory that shows that Deleuze is putting architecture in the service of philosophy in a similar way to folding architecture has appropriated Deleuze's philosophy to explain its otherwise formal interests in mathematics and digital technology (Campo, 1993).

While the example of "the fold" highlights the difficult relationship that exists between architecture and philosophy, it also reveals a missed opportunity for the discipline that could be found in seeking a critical reading of Deleuze that extends beyond "the fold" and acknowledges Deleuze's longer interest in concepts of movement, sensation, and affect. Reading Wölfflin and Deleuze together also reveals that they both offer interesting ways to understand issues of ongoing concern to the discipline, including those of time and temporality: the relationship between the time of making, the durational-time of experience, the

historical time of reception; and the life-span time of existence; and how these might bear on our understanding of architecture.

Architects and theorists like Venturi and Jenks mentioned particular features in their publication, which to some extent made up the manifesto of Post-Modern architecture. The Fold represents Baroque concepts in the Post-Modern architectural discourse; folding is a pluralistic architecture as its origins in the Baroque includes multiple folds in number and also matters; the definition of Monad and its role in Leibniz's Baroque demonstrates the plurality in the Baroque, Folding philosophy and subsequently in folding architecture.

As it has been discussed before Baroque is an eclectic attitude, this eclecticism has had its effects on the theoretical background of Folding. As Jencks named the Post-modern architecture, eclectic, which causes a sort of inharmonious harmony and coordination (Jenks, 1978), folding does the same while it is collecting and interpreting the ideas of different theorists from different viewpoints and applies them in a frame in its own name.

Folding keeps the connections between past and present, since it is a notion that goes back to the history and originally it is referring to the Baroque; it can be assumed as a system that works within a period of time. Being timeless can be assumed as a context for folding theory and this theory itself is used as a concept in architectural discourse, so when Jencks mentions that Post-modernism is passionate about concept and context, the prove for achieving reasons of folding being a post-modern feature of the Baroque will be more strong.

As far as it has been discussed, folding is a notion that covers different features and sections of ideas. Also it is clearly proved that folding theory is based on the Baroque so there is no doubt about its historicism and being historicist probably is one of the qualities of traditionalism.

With all the evidences and guarantee that folding architecture can cover the features of Post-modernism, vice versa the Post-modernism makes it easily possible to understand the complication of the process of conceptualizing architecture in this field; and of course the result has its own complications as well. While some one begins to read the results of such architecture, the theory has the role of conducting the mind and the eye unconsciously, because as we are going to discuss it later on, having a conceptual background of a certain theoretical field does not mean that the theory is going to be visible in the body of architecture, but its duty is to fulfill the sense of challenge for the designer to have a strong reason to create a visible and tangible outcome, which in this case is architecture. So each concept is a system by which applied in order to obtain a framework to set up a result by means of all kinds of materials that make the architectural structure work.

Chapter4

EISENMAN'S DIAGRAMATIZED ARCHITECTURE AND THE IDEA OF CONCEPT STRUCTURE

1.4 Folding: A Diagrammatized Architecture

The theory of fold began with the theoretical background of Baroque readings of theorists such as Gottfried Leibniz, Heinrich Wolfflin and other theorists from time to time, and lastly by Gilles Deleuze who was the one who established the theory of fold from an architectural base. In the final decade of 20th century the deconstructivist architect Peter Eisenman started applying the fold theory and its features in the field of architecture. With the key words such as monad, pleats of matter and folds in the soul and some others. Folding architecture has the conceptual support of Deleuze's philosophy above all.

In Modern era, time was the main matter in the process of modernization and the basic component of modernity, but it went out of fashion. Space became the vital ingredient of Post-modern thinking. Space became a category further than just being physical entity as three-dimensional. What is hiding the consequences? Space, not time. Space is the distinctly significant dimension of contemporary capitalism. Space is an expression of the universe and not just a spiritual and physical part of it. It is the philosophical determinant of place. After the 18th century space became a theater in which human was persuaded to find his place;

this came after the rise of individual subjectivism. For centuries space had been a modality of existence. After Post-Modern era began, configuration of mankind with himself made him to confront with the space as well, the existence by which contains the space is arbitrary. This being arbitrary became clear after preconditions of space, after the term conceptualization (Boman and Van Troon, 1994).

And the space became a problem area instead of being a self-evident fact; then the human subject had to manifest himself in this area. In such context 'spatial effects' still remained as a concern for architects, although by entering to Post-Modernism they have thrown modernism away.

Architects and theorists like Venturi and Jenks mentioned particular features in their publication, which to some extent made up the manifesto of Post-Modern architecture. The Fold represents Baroque concepts in the Post-Modern architectural discourse; folding is a pluralistic architecture as its origins in the Baroque includes multiple folds in number and also matters; the definition of Monad and its role in Leibniz's Baroque demonstrates the plurality in the Baroque, Folding philosophy and subsequently in folding architecture.

As it has been discussed before Baroque is an eclectic attitude, this eclecticism has had its effects on the theoretical background of Folding. As Jencks named the Post-modern architecture, eclectic, which causes a sort of inharmonious harmony and coordination; obviously folding does the same while it is collecting and interpreting the ideas of different theorists from different viewpoints and applies them in a frame in its own name.

Folding keeps the connections between past and present, since it is a notion that goes back to the history and originally it has no time limits. Being timeless can be assumed as typical object of a certain kind; the window to virtual space is a device, a device of illusion (Ettlinger, 2008).

There is a question: "where is what we see"? Following this question leads to an understanding of definition of 'virtual space' in this certain theory. In one case scenario in the context of fold theory it comes to reach the visual experience of the space of pleats of matter and folds in the soul.

In Deleuze's eye, the fold involves with the maintenance of a virtual space of chance in the association of design and also of program; and perhaps one might claim that this nomadic or undomesticated kind of chance was something that a certain epic ambition in architecture and urbanism, and a certain image of the architect or the planner as a kind of master-builder, tried unsuccessfully to eliminate: the spaces of envelopment in development, the spaces of virtual diagrammatization in the real area of plans and planning (Rajchman, 1998).

The characteristic of physical space serves as initial point of preference by which the characteristics of place in virtual space are based on. If one wants to picture a virtual place, then any attempt to depict such a virtual place is similar to an image that is too ambiguous to be successfully interpreted by others in the scope of the physical world. However this does not limit virtual places from defying the rules of the physical world, as long as they remain recognizable as possible visible worlds (Ettlinger, 2008).

It is important and necessary to turn to Deleuze's way of using the notion of "diagram." His 'diagram of power' is what he discusses by referring to Michel Foucault's "panopticism" (Deleuze, 1986). Foucault believes that our forms of knowing are produced by relations of power, or force against force. "Form" here is conceived as two senses, 'the organization of matter into visibilities' and the 'finalization of functions into statements'. Statements and visibilities are two components of Knowledge. Relations of power, work with matter by which is unformed and unorganized, and functions unformed, unfinalized functions. Deleuze and Foucault label by 'diagram' in this informal dimension. The diagram of relations between forces is a non-unifying immanent cause coincident with the whole social field:

"It is precisely because the immanent cause, in both its matter and its function, disregards form that it is realized on the basis of a central differentiation, which, on the one hand, will form visible matter, on the other will formalize articulable functions".

(Deleuze, 1986, P.38)

When Deleuze discusses the fold as an element, which mediates between virtuality and actuality, he uses the term as a diagram, in the sense mentioned above. It is neither the organization of matter into some visible form, nor the finalization of matter into function. Rather it is the virtual relations of force that destabilize the determinable and the articulable into the new. And, just as commentators of Foucault began to look for little Panopticon prison designs in every disciplinary space of modernity, so designers who have read a little Deleuze start making buildings with little folding surfaces. Such practices fail to recognize the distinct ontologies of form and force that are crucial for Deleuzian (and Foucauldian) analyses.

2.4 Diagramming the Virtual, conceptualizing the actual

In the last decade of 20th century, architecture faced a new realm of conception with a background in the theory of Folding. The Baroque attributed ideas of Gilles Deleuze established a course of having a manner in which was the dimensional concepts of a logical power; the manner that concepts instigate new unforeseen possibilities in the midst of things, without predetermining the outcome: the manner in which they take a given conceptual space elsewhere; Out from it.

In order to define conceptual space Deleuze has different ideas of conceptualization, he believes that a conceptual space is not divided by groups of distinct elements; it also is not given over a *Unity* or *Totality* of parts. It is not representing or depicting any more but its aim is to express the unity of ordered combinations of space elements. Indeed the world includes more than its known elements. Conceptualization is undepictable anteriority in which new kinds of things are possibly happening. Conceptual space implies a particular kind of temporality that is neither timeless, nor time-bound.

"Deleuze tries to unfold a temporality from 19th century through; from Proust's notion of a complicated time; from Bergson's notion of 'virtuality' and especially from Nietzsche's notion of the 'untimely'."

(Rajchman, AD, 1993, No. 102)

A key concern of Deleuze has been how to understand the question of knowing other than by way of the concept. Deleuze posits a materialist or empiricist philosophy whose legacy lies in Leibniz, Spinoza and Hume. In opposition to the relation between the possible and the real mediated by the concept, Deleuze poses the relation between the virtual and the actual, where the virtual is the

complication of a multiplicity of differences implied in any actuality. Thinking, knowing, experiencing is the unfolding and refolding of what is actual to reveal implied virtualities. In this sense, the substance that is the materiality of things and bodies is made of so many surfaces whose topological complication is *the fold* (le pli) (Rachjman, 1998).

Architectural practices' task has always been to make still-standing concrete architectural forms out of abstractness of prefiguration of design procedure. However, defined abstraction by the concept of the calculable is the subject that design practice has tended to work with. Although Deleuze's 'virtual' is abstract but this abstraction does not occur by way of concept. While Deleuze's 'virtual' is abstract, it is not the abstraction of the possible by way of the concept.

3.4 Diagramming Architecture

In one definition Deleuze mentions that in terms of architecture the fold can be interpreted as a series of potential expressions of genuine movements, defined as differentiations. Folding, as a means of introducing another concept of space and time within the conventional landscape, assumed as 'spatial boundaries'. Spatiality as a 'becoming' with no external measures or ends within a complex repetition, no longer restricted to imitation. For example, the problematic relation of ideas can develop new ways of seeing the relationship of architecture to environment, building to site. The fold can begin to re-consider questions of figure/ground contextualism. No longer creating a separation of figure/ground (Le Corbusier and the *Piloti*) but one where a continuous and reversible dialogue can occur. A folding across lines to create uncertainty between boundaries, instead of defined boundaries of separation. These uncertainties create the

potential of a multiplicity of folding and unfolding; a re-reading of an architecture of becoming (Rajchman, 1998).

Spatial boundaries need to be visualized in case of architecture, in the context of multiplicity, for architecture to move from a Deleuzian theoretical diagram of space, to a built structure, a shift from theory to physical space is needed. In order to claim the physical space, the diagrams will be interpreted as a virtual reality within the world of software and computer.

Deleuze's notion of the diagram is a term that admits to make a critical analysis of virtual and of architecture. John Rajchman has discussed this term in the architectural discourse in a series of conferences.

John Rajchman in his Article 'out of the fold' proposed a term as 'fold-words', words with 'Plic' and 'Plex' that also have a prominent role in architecture and urbanism. Architecture is a key art of the 90s, because it must deal with all different social, economic and also formal complexities at once. Complexity was marked as a turning-point in architectural discourse when the book Complexity and Contradiction in architecture was published in 1996, by Robert Venturi and during those years Deleuze was elaborating logic of 'difference' and 'repetition' which he would later applied in his own discussion in the book: Le Pli (the Fold) (Rajchman, 1993).

Deleuze also faces differentiations in another viewpoint, and that is mathematics. For Deleuze, the ontology of mathematics is not reducible to axiomatics, but must be understood much more broadly in terms of the complex tension between

axiomatics and what he calls problematics (Deleuze, 1994 P.323). Deleuze assimilates axiomatics to royal science, which is linked to the social axiomatic of capitalism (and the State), and which constantly attempts to effect a reduction or repression of the problematic pole of mathematics, itself wedded to a minor or nomadic conception of science. For this reason, second, the concept of multiplicity, even within mathematics itself, cannot simply be identified with the concept of a set; rather, mathematics is marked by a tension between extensive multiplicities or sets (the axiomatic pole) and virtual or differential multiplicities (the problematic pole), and the incessant translation of the latter into the former.

"The relation between mathematics and man may thus be conceived in a new way: the question is not that of quantifying or measuring human properties, but rather, on the one hand, that of problematizing human events, and, on the other, that of developing as various human events the conditions of a problem."

(Deleuze, P55.)

Deleuze in his vocabulary of himself is fond of the word 'multiple' above all his vocabularies; as mentioned the first page of the book, Le Pli, 'the multiple is not only what has many parts, but what is folded in many ways'.

Diagram

According to Deleuze diagram is a map, or quite several lay over maps; the diagram can be called an abstract machine which is the map of relations between forces, a map of destiny, or intensity, which acts as a non-unifying immanent source which is coextensive with the whole social field. The abstract machine is like the cause of the concrete assemblages that execute its relations; and these relations take place within the very tissue of the assemblages they produce (Deleuze and Guattari, 1986).

"A diagram has neither substance nor form, neither the content nor expression...Diagrams must be distinguished from indexes, which are territorial signs, but also from icons".

(Deleuze and Guattari, 1986)

In the process of making diagrams Deleuze makes direct use of the formal descriptions of Baroque architecture developed by Wölfflin. The diagram is all together a plan, section, and elevation and resembles several photographic and drawn illustrations. The main point here is that Deleuze's philosophy clearly benefits from the architectural structure of the Baroque church described and illustrated by Wölfflin, especially as it allows Deleuze to advance Leibniz's understanding of the soul and his theory of the monad as a "windowless soul" by adding another story to the construction, to account for the relationship between the body and the head (Wölfflin, 1964).

In the field of architecture there are three main architects who started using diagram in their design process, Christopher Alexander, Bill Hiller and Peter Eisenman. Each has different viewpoint about how diagram works in the design process. Alexander believed that the diagram works as a visual rerouting plan to find out how individual structures become terminologies of social space. For him, the diagram becomes a conceptual incorporation of multiple functions and finally works as a checking mechanism to ask if the design process includes substantial elements or not. Hillier's use of diagrams scripts an extension of urban mapping that is fairly accurate. His diagrams should be approached as vectors for analysis but not for interpretation; so from the vantage point of mathematics, a major distinction exists between Hillier's analysis of real space and Alexander's abstract surmises (Somol, 1999).

For Eisenman logo centric phenomena like philosophy and literature, which may neutralize by diagrammatic practice, is always haunted architecture. While both Alexander and Hillier declare a close relation to mathematics, Peter Eisenman involves with opening the relations between diagram and writing. (Eisenman, 1999) Instead of seeking a set of communications through which probatory statements might be graphically presented, Eisenman develops the dynamic ability of the diagram in creating and expanding more diagrams. The history of the form was rewritten, also Eisenman would subject "form" itself to everlasting revision through an comprehensive series of operations: transformation, decomposition, grafting, scaling, rotation, inversion, superposition, shifting, folding, etc. (Somol, 1999).

4.4 Eisenman and Diagrammatized Architecture

Eisenman believes that diagrams are both theoretical and ideological they are expressing ideology about theory; ideology provokes a certain anxiety, because it threatens the fundamental conditions of power, ideology deals with both superstructure and sub-structure, not as purely theoretical operations but as a critic of the relationship between them.

The American architect, whom had applied the philosophy of deconstruction in his work, is the most famous and key character of folding architecture. He discussed the possibility of conceptualizing architecture as a Moebius strip, with an unbroken continuity between interior and exterior. He believes that Gilles Deleuze with his idea of the fold has already proposed such a concept. His interpretation of Deleuze's fold is as one of many strategies for dislocating vision, dislocating the hierarchy of interior and exterior that forestalls vision.

"Folding changes the traditional space of vision, it can be considered to be effective; it functions, it shelters, it is meaningful, it frames, it is aesthetic. Folding also continues a move from effective to affective".

(Eisenman, 1994, P. 150)

Eisenman has been designing in different theoretical realms of architecture, although some of his designs remained just as plans and images and only some of them were built or are under construction it is obvious that he is one of the effective contemporary architects. Through his works there will be three samples to present here: the Church of Year 2000, Rome, Italy and Staten Island Institute for arts and science, New York, United States, which illustrations and plans are available and The City of Culture, Galicia, Spain that is under construction yet.

Church of the year 2000 (Chiesa a Tor Tre Teste, Roma)

Date: 1996

Location: Rome/Italy

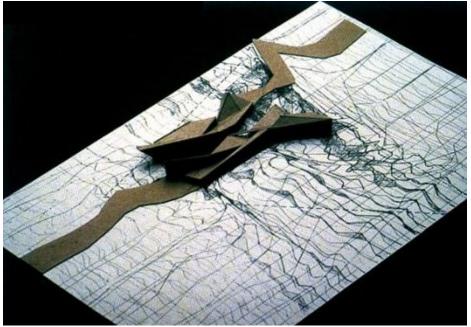


Figure 13. Church of the year 2000, Concept Model http://prelectur.stanford.edu/lecturers/eisenman/projects.html

The original concept of the church was the *ecclesia* that is the community of Christ. The church did not require a prescribed space or building to declare the faith: the people were its architecture. It was only in the course of centuries that church structures became, in effect, surrogate heavens that could be entered on Sundays and feast days. The pilgrimage and its church occupy a special place in the history of the development of ecclesiastical place, serving yet another, more complex function. This project reflects this cultural shift and the effect it has on the architecture of the church, and in particular the architecture of this pilgrimage church at this place, at this time, for this particular function. The iconography of this church is based on two parallel ideas: one, the proximity and distance inherent in the idea of the pilgrimage and the idea of media; and two, the new relationship between man, God, and nature.

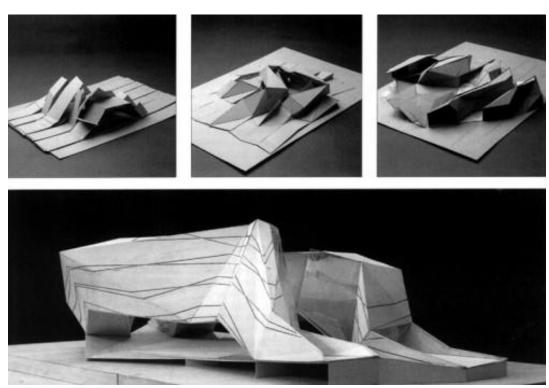


Figure 14. Church of the Year 2000 http://prelectur.stanford.edu/lecturers/eisenman/projects.html

The most precise condition of between in nature is the condition of the liquid crystal, which is a state of suspension between the static crystal and the flowing liquid state. The following diagrams also show how the forms of the church grow literally out of the ground of the molecular order of a crystal. They represent the gradual distortion of an original crystal phase to a cinematic state, which is a between phase in the molecular order before it reaches the isotropic or liquid phase (Eisenman, 1999).

The diagrams also represent another aspect of the liquid crystal that of multiple layers and overlaps. These are seen as the deformations of several different layers. These are all present in the evolving form of the building and the landscape. The iconography is clear. The form of the church evolves out of the ground, out of palpable reality toward heaven and the infinite. The church as such becomes the mediator between nature and God, between the physical and the infinite (Eisenman, 1999).

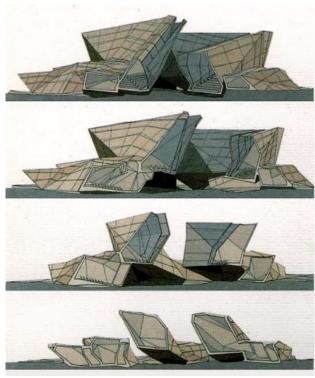


Figure 15. Church of the Year 2000, Elevations http://prelectur.stanford.edu/lecturers/eisenman/projects.html

This then is the iconographic derivation of the new pilgrimage church. The church as a model for the new relationship between man, God, and nature at the end of the millennium.

Staten Island Institute for arts and science

Date: 1997-2001

Client: Staten Island Institute for arts and science

Peter Eisenman participates in opening the linkages between diagram and writing. Rather than seeking a set of correspondences through which exploratory postulates might be graphically presented, Eisenman develops the dynamic potential of diagram to lead to more diagrams. (Somol, 1999).



Figure 16. Staten Island Institute for arts and science http://prelectur.stanford.edu/lecturers/eisenman/projects.html

For Eisenman, it is precisely the projective capacity of diagram that makes them gestural vehicles for virtual representation. In a sequence of diagrams, Eisenman represents an evolving diagrammatic invention of the Statan Island Art Center from a structural morphing of the New York skyscrapers including the Twin

Trade Towers (Figure 15). Through sequence of digital morphing, each diagram marks an ongoing transformation of shapes that folds the rectilinear shapes of the Manhatten skyline into themselves.

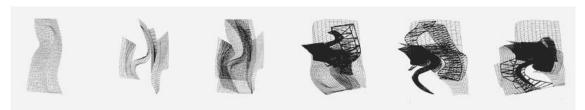


Figure 17. Diagramming Process of Staten Island Institute for arts and science http://free-d.nl/frontend_dev.php/project/show/subCat/freeform/id/572



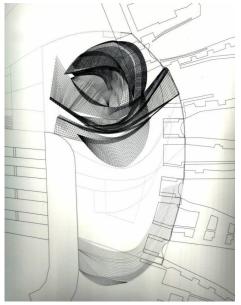


Figure 18. Concept Model for of Staten Island Institute for arts and science http://web.tiscalinet.it/archivale/peter.htm

City of Culture, Galicia, Spain

In his work, City of Culture, Eisenman designed an architectural form based on the fold theory, the continuity of lines and figures from the interior to exterior and also from the context of the city map is the visual depiction of his intentions to use the idea of changing that traditionality. The move from effective to affective shows

itself in his idea of applying different features have the past context and present situation in the site in the same time.



Figure 19. City of Culture, bird's eye View
Pasajes Espanoles Courtesy the Foundation of the City of Culture of Galicia
http://www.e-architect.co.uk/spain/city_culture_galicia.htm

Curvilinear lines make the main form and are visible from outside; they are same as the lines that define the interior spaces; their directions and the way that they lead the eye. Both interior and exterior curvilinearity of the forms make a constant relation between in and out, the interior continues on the façade as a physical term and it should not be mistaken as the Fold and its structure.





Figure 20. City of Culture, interior views
Photos: Roland
Halbe Courtesy Eisenman Architects
http://www.e-architect.co.uk/spain/city_culture_galicia.htm

The fold produces a dislocation of the dialectical difference between figure and the ground; this process leads to creation of a space, which Deleuze called 'a smooth space³'. It presents the possibility of overcoming the grid. Eisenman dropped Deleuze's conception of the "objective", which he replaced with the contiguous and also Deleuzian concept of 'object-event': the breaking up of the Cartesian and perspectival grids of the classical tradition, prompted and promoted by the moving and morphing images of the digital age, requires architectural forms capable of continuous variation - forms that move in time. He mentioned that the grid remains in its place and the four walls always exist, but in fact the

Smooth Space exists in contrast to "striated space"—

³ Smooth Space exists in contrast to "striated space"— a partitioned field of movement which prohibits free motion. Smooth space refers to an environment, a landscape (vast or microscopic) in which a subject operates. Deleuze and Guattari explain: Smooth space is filled by events or haecceities, far more than by formed and perceived things. It is a space of affects, more than one of properties. It is *haptic* rather than optical perception. Whereas in striated forms organize a matter, in the smooth materials signal forces and serve as symptoms for them. It is an intensive rather than extensive space, one of distances, not of measures and properties. Intense *Spatium* instead of *Extensio*. A Body without Organs instead of an organism and organization. Conducive to rhizomatic growth and nomadic movement, smooth space consists of disorganized matter and tends to provoke a sensual or tactical response rather than a starkly rational method of operation or a planned trajectory.

folding of space overtook them. With all the new concepts Eisenman believes that it is not possible to relate the three-dimensional reality of folded space with vision of space with a two-dimensional drawing. (Eisenman, 1994).

Several stratagems may help to define diagrams, but the 'folding' process remains purely productive, and it does not relate to the actual form of the end product. Forms do not fold (actually, in all Eisenman's projects featured in Folding in Architecture in 1993 they fracture and break), because most buildings do not move: when built, architectural forms can at best only represent, symbolize or somehow evoke the continuity of alteration or dynamism.



Figure 21. View to City of Culture
Photo: Manuel Gonzalez Vicente Courtesy the Foundation of the City of Culture
of Galicia
http://www.e-architect.co.uk/spain/city_culture_galicia.htm

The building prepares an image that makes a visual and physical movement for the *observer*, this is that when we say the fold is an image of thought and also it can be interpreted as architecture with the folding theory makes a three dimensional image of designer's thoughts.

> "Architecture will continue to stand up, to deal with gravity to have four walls. But these four walls no longer need to be expressive of mechanical paradigm. Rather the walls could deal

with the possibility of these other discourses, the other effective sense of sound, touch and of that light lying within the darkness".

(Eisenman, 1994. P.150)

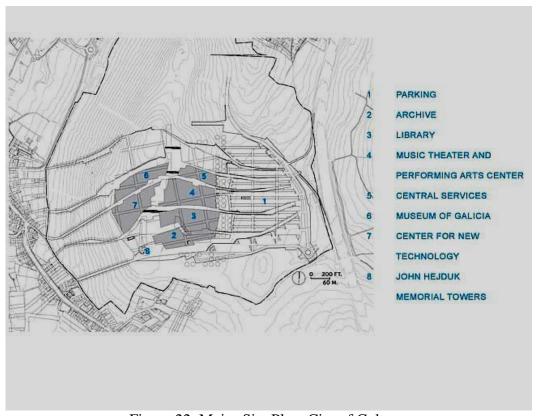
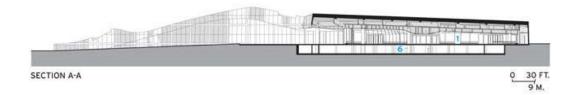
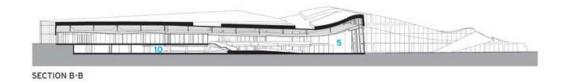


Figure 22. Major Site Plan, City of Culture http://www.archdaily.com/





1	CITY OF CULTURE EXHIBIT	7	MECHANICAL
2	OPEN TO BELOW	8	REFERENCE ARCHIVISTS
3	ARCHIVE EXHIBITION	9	GENERAL CATALOGING
4	CENTRAL COOLING	10	SCHOLARS CENTER
5	READING ROOM	11	ARCHIVE EXHIBIT
6	ARCHIVE STACKS	12	CITY OF CULTURE SHOP



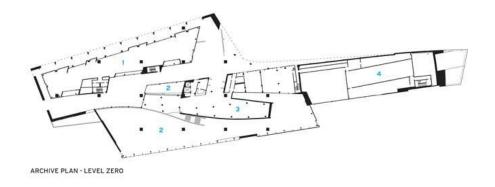
SECTION C-C



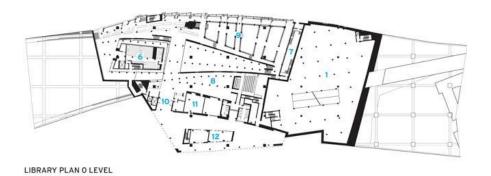
SECTION D-D

1	CITY OF CULTURE EXHIBIT	7	MECHANICAL
2	OPEN TO BELOW	8	REFERENCE ARCHIVISTS
3	ARCHIVE EXHIBITION	9	GENERAL CATALOGING
4	CENTRAL COOLING	10	SCHOLARS CENTER
5	READING ROOM	11	ARCHIVE EXHIBIT
6	ARCHIVE STACKS	12	CITY OF CULTURE SHOP

Figure 23. Sample Sections, City of Culture http://www.archdaily.com/



.1	CITY OF CULTURE EXHIBIT	7	MECHANICAL
2	OPEN TO BELOW	8	REFERENCE ARCHIVISTS
3	ARCHIVE EXHIBITION	9	GENERAL CATALOGING
4	CENTRAL COOLING	10	SCHOLARS CENTER
5	READING ROOM	11	ARCHIVE EXHIBIT
6	ARCHIVE STACKS	12	CITY OF CULTURE SHOP



1	PARKING GARAGE	9	MAIN READING ROOM
2	MECHANICAL	10	VESTIBULE
3	BOOKBINDING	11	CLASSROOM
4	CONSERVATION	12	LIBRARY STACKS
5	RESEARCH AND SCHOLARS CENTER	13	UPPER READING ROOM
6	RARE BOOKS	14	ADMINISTRATION
7	OPEN TO BELOW	15	VIRTUAL LIBRARY
8	EXHIBITION	16	LIBRARY SUPPORT

Figure 24. Sample Plans, City of Culture http://www.archdaily.com/

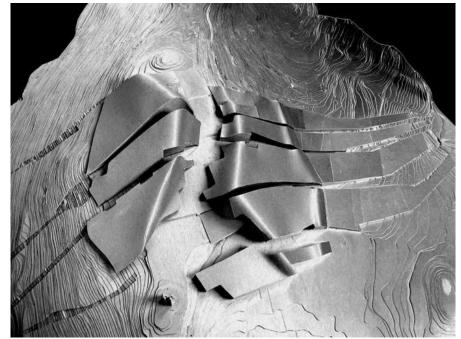


Figure 25. Concept Model, City of Culture http://www.archdaily.com/141238/the-city-of-culture-eisenman-architects/

There are three sets of information that Cultural Center of Galicia is made of their super position. First, the street plan of the medieval center of Santiago is overlaid on a topographic map of the hillside site, which overlooks the city. Second, a modern Cartesian grid is laid over these medieval routes. Third, through computer modeling software, the topography of the hillside is allowed to distort the two flat geometries, thus generating a topological surface that repositions old and new in a simultaneous matrix never before seen.



Figure 26. Passenger's view, City of Culture
Photo by: Duccio Malagamba
http://www.archdaily.com/141238/the-city-of-culture-eisenman-architects/

Combination of the three grids causes visual movement while passing different parts of the site. The lines that start from the ground climb up and again they are landing and merging to the ground line, they make the image of figure ground; the grid lines are shown in the frame of elevation details and all the effort has been made to create a dynamic space by applying continuous forms and lines.

Diagrams point toward that which can be represented in the world. Construction technologies often appear separate because they are black-boxed rather than integrated into the work of architectural theory, which means construction technologies are more hidden and have secret features in their specific area of function instead of being involved with what theory is doing in the process of creation of an architectural structure. We need to think of technology as a continuous set of interactions with signs that become increasingly reified. The diagram is an important mark within the genealogies of sign systems.



Figure 27. Passenger view, City of Culture http://archrecord.construction.com/projects/portfolio/2011/06/galicia-archive.asp

Santiago's medieval past appears not as a form of representational nostalgia but as a new yet somehow familiar presence found in a new form; The original center of Santiago conforms to a figure/ground urbanism in which buildings are figural, or solid, and the streets are residual, or void spaces. The topographic design of the building seems like a sort of tribute to the ancient topography of the site and it is noteworthy that the designer has an eye on the past, in the Post-modern world of today; now folding theory is applying the history as one layer of thoughts and ideas.



Figure 28. View from site neighborhood, City of Culture
Photo by: Duccio Malagamba
http://www.archdaily.com/141238/the-city-of-culture-eisenman-architects/

The six buildings of the project are conceived as three pairs: the Museum of Galicia and the International Art Center; the Center for Music and Performing Arts and the Central Services building; and the Library of Galicia and the Galician Archives. Visitors' experiences of any given building will be affected by its relationship to its immediate partner. The Caminos, or pedestrian streets, between the buildings also open onto a public plaza, which is bordered by the six buildings and features landscape and water elements. (One layer of diagram, which a visitor can circulate inside) The largest building is the Performing Arts Theater, which will stand 42.5 meters high. The heights of the all parts of the building rise in gentle curves that seem to reconstruct the shape of the hilltop with their collective rooflines, which are all clad in stone and marked with the grids that inform the design of the site.

Chapter 5

CONCLUSION

Deleuze draws upon all the resources, in Difference and Repetition, to develop his general theory of problematic or differential multiplicities, which formalizable conditions can be briefly summarized as followings. The elements of the multiplicity are merely determinable; their nature is not determined in advance by either a defining property or an axiom. Rather, they are pure virtualities that have neither identity, nor sensible form, nor conceptual implication, nor assignable function (principle of determinability) (Deleuze, 1986). They are nonetheless determined reciprocally as singularities in the differential relation, a non-localizable ideal connection that provides a purely intrinsic definition of the multiplicity as problematic; the differential relation is not only external to its terms, but also constitutive of its terms (principle of reciprocal determination) (Badiou, 1988). The values of these relations define the complete determination of the problem, that is, the existence, the number, and the distribution of the determinant points that precisely provide its conditions as a problem (principle of complete determination) (Deleuze, 1986. P.183) The strength of Deleuze's project, with regard to problematics, is that, in a certain sense, it parallels the movement toward objectivity that was made in axiomatics: it presents a formalization of the theory of problems, freed from the conditions of geometric intuition and solvability, and existing only in pure thought (even though Deleuze presents his theory in a purely philosophical manner, and explicitly refuses to assign a scientific status to his conclusions) (Deleuze, 1986).

Architecture is the three dimensional illustration of a designer's mind; it is a set of pictorial definitions of theory and idea. Since Architectural theory began to deal with Post-modernity, some definitions and concepts changed. If modernism was the age of cubical discipline and defined orders and rules, Post-modernity was the time that brought in spontaneous thoughts and differentiations in readings.

The idea of Post-modernism pushed the boundaries and theory entered to a field of variations. Since the history is an issue in the forenamed era, the role of time changed and theorists started moving back and forward in order to find demanded state of their discourses. Therefore policies changed in theory, arts and also architecture.

A type of historicism began to make some changes in the field of theory in the last decade of 20th century, the French philosopher, Gilles Deleuze, began to apply ideas and theories of his former theoreticians about the Baroque. This period has been known before Deleuze by discourses of Henrich Wölfflin and Deleuze's studies began to find its path among Wölfflin's ideas and also philosophy of Gottfried Leibniz. Three of these theorists discuss an issue, which is neither time-bound nor timeless, the Fold. This theory finds its roots in the analysis of Baroque as a period by which features do not belong to specific time or style, the word 'fold' itself can be perceived as a structure, with foundations of Baroque ideas, as Wölfflin argues in his book, Renaissance and Baroque, about a style called 'painterly' which in his opinion is an illusion of movement; later on movement becomes one of the important manufacturer elements of the Fold's structure. He also talks about illusiveness, which means that individual objects

should be not fully and clearly represented. According to Wölfflin Baroque includes heavy and massive forms, this is an idea that is also applied in the structure of the fold. As it has been seen in the City of Culture in Galicia, Eisenman created masses in a manner that gives a feeling of movement in the eye of the observer.

Deleuze highlights some important points among ideas of Leibniz to strengthen the Fold's structure; some key words like monad and allegory also become a part of that structure. Some elements work like masonry and others like the frame that keeps the structure still standing, on the other hand between sign and signified. Form is the visible manufactured status of designer's mind and being formal can be perceived as different concepts. Eisenman has two different ideas about "formal", first the formal is distinguished from aesthetics; second, the formal was seen to be different from a stable set of forms in architecture's interiority (Eisenman, 1999).

Eisenman's diagrammatic design process is based on the relationship between architecture's instrumentality and its functionality. His idea of formal differed from an essentialist view of from, implied by Wölfflin and others, in that it articulated both a quality of what at the time was called generic form, and idea of a process of form suggested by relationship of form in space, such as rotation and shear, which had nothing to do with actual physical character of the form but with something implied in the relationship between forms. According to his discussions about the role of diagram polemical values of a formal vocabulary will be modified by diagram (Eisenman, 1999). Diagram has been used as an instrument of applying the concept structure in the process of transferring from

the world of ideas, which is a virtual reality to the world of real existing structures, which is the architectural built environment, it could be meaning full if the idea of concept structure can feel the gap between the virtual and actual; the system that has specific characteristics but not restricted.

As Leibniz sees in the definitions 'the fold' envelops a multiplicity, it is a unity and this unity develops the whole system of the fold's structure (Deleuze, 1993). So the fold itself has the potential to be the structure of a concept while creating conceptual architecture for architects like Eisenman. It is possible to say that this structure consists 'allegory' as the main framework, which applies symbolic interpretation of its theoretical features. For instance elements like monad and features like movement can be perceived as manufacturers of concept structure of folding architecture. Its duty is to build a characteristic paradigm of the structure of the fold.

Here comes an idea that discusses about the concept by considering features of a certain notion or idea.

Eisenman's suggestion of affective instead of effective, loans Deleuze's longer interest in concepts of movement, sensation, and affect⁴. The role of concept in

⁴ Affect: An affect is a non-conscious experience of intensity; it is a moment of unformed and unstructured potential. Dleuze developed this idea from his readings of Spinoza and Lebniz, and work of the German Romantic Dramatist Heinrich Von Kliest. In his notes on the terminology employed, the translator Brian Massumi gives the following definitions of the terms as used in the volume: AFFECT/AFFECTION. Neither word denotes a personal feeling (*sentiment* in Deleuze and Guattari). *L'affect* (Spinoza's *affectus*) is an ability to affect and be affected. It is a prepersonal intensity corresponding to the passage from one experiential state of the body to another and implying an augmentation or diminution in that body's capacity to act. *L'affection* (Spinoza's *affectio*) is each such state considered as an encounter between the affected body and a second, affecting, body (with body taken in its broadest possible sense to include "mental" or ideal bodies). Affects, according to Deleuze, are not simple affections as they are independent from their subject. Artists create affects and percpects, "blocks of space-time", whereas science works with functions, according to Deleuze, and philosophy creates concepts.

architecture is to make a structure of ideas in order to design a structure in the real world. By means of all features that forenamed theorists brought to expand and improve the idea of 'The Fold', Eisenman applies the concept structure of folding in order to reach the architecture that consciously or unconsciously presents forms that make different interpretations of the real and actual space; interpretations that sometimes simply refer to the visible forms and sometimes bring questions about their concept structures; from the eye of a simple spectator to the viewpoint of a theorist or an architect.

"In order to define affective it is noteworthy to mention that this word entered the English vocabulary in the 14th century. Becoming- while happening in a gap- is nonetheless an extreme contiguity within the coupling of two sensations without resemblance or it could be figured as a light that captures both of the resemblances in a single reflection... it is a zone of indetermination, as if things, beasts, and persons endlessly reach that point that immediately precedes their natural differentiation. This is what is called an affect".

(Deleuze an Gauttari, 1994, P.173)

The virtual space belongs to different locations: the designer's mind and the viewer's. Fold is the concept structure that affects the interpretations of the observers whom are involved with theory. Its role in creating the space is to draw and picture the writing with all the facilities and features it has. All the rules and regulations while being applied in the process of conceptualizing and designing lead to a virtual reality and that should pass other filters to make an actual reality. Most probably the results will be different; with certain key words and with the folding background, any spectator has his\her own interpretations and diagram of the space and circulation, which contains what they see (physical space) and what they feel (the space but also the virtuality that comes from his\her imaginations) and the point is: because it is not possible to show the exact virtual space that

belongs to a world other than reality so actuality is not a mirror of virtuality. The virtual features that made up the physical space as invisible elements; even they are not the features of the reality, they belong to a virtual reality that made the concepts of actuality and that actuality would be the result of architectural design, the building. So it is possible to say in a Post-modern point of view that the difference and multiplicity of languages, ideas and perceptions all depend on what interpretation a person makes from a process that transfers virtuality into an actual world.

REFERENCES

Antoine, C. (1788). EncyclopédieMéthodique: Architecture, vol.1 Paris: Pancoucke.

Baudrillard, J. (1994). *Simulacra and Simulation*. Translated by S. F. Glaser. Ann Arbor

Barker, J., Bernstein, J.c. (1642). *Trauerspiels" in 1642: Literature and Power in the Seventeenth Century*, ed. Francis et al Colchester. University of Essex

Badiou, A. (1988). *L'être et l'événement*. Paris: Editions du Seuil.An English translation of Badiou's magnum opus by Oliver Feltham.

Bertens, H. (1995). *The Idea of the Postmodern*. London and New York: Routledge.

Bell, D. (1976). The Coming of Post-Industrial Society, A Venture in Social Forecasting. Basic Books Publications, New York.

Benjamin, W. (1928). *Ursprung des DeutschenTrauerspiels*. Frankfurt-am-Main: Paperback. Michigan: University of Michigan Press.

Benjamin, W. (1998). *The Colour of Experience*.London& New York: Routledge.

Boman, O, Van Toorn, R. (1994). *The Invisible in Architecture*. London: Academy Editions; New York, N.Y.: Distributed by St. Martin's Press.

Camiller, P. (1994). As *Baroque Reason: The Aesthetics of Modernity*. London: Sage.

Caygill, H. (1998). Walter Benjamin: The Color of Experience. London& New York: Routledge.

Caygill, H. (1981). The Significance of Allegory in the Ursprung des Deutsche.

Campo, M. (1993) Ten Years of Folding, in Lynn (ed.) Folding in Architecture.

Cicognara, L. (1818). Storiadella Scultura dal suo Risorgimento in Italia sino al secolodiNapoleone per servire di continuazionealleopere di Winckelmann e di D'Agincourt, vol. 3. Venice: Picotti.

Conley, T. (1993). *The Fold: Liebniz andthe Baroque*. Translator's Foreword: A Plea for Leibniz" in Gilles Deleuze, trans. Tom Conley. Athlone: London, ix.

Connors, J. (1999) "Francesco Borromini. La vita (1599-1667)" in *Borromini e l'universobarocco*, ed. Richard Bösel& Christoph Frommel. Milan:Electa.

Deleuze, G., Gauttari F., Massumi, B. (Translator) (1987). *Thousand Pleats*. Minneapolis: University of Minnesota Press.

Deleuze, G., Hand, S. (Translator), Bove, P. (Foreword). (1998). Foucault. University Of Minnesota Press.

Deleuze, G. (1994) *Difference & Repetition*. P. Patton, trans. London, The Athlone Press.

Deleuze, G., W. Smith, D (Translator). (2003) Francis Bacon: The Logic of Sensation. Continuum.

Derrida, J. (1977). "La Question du Style." *The New Nietzsche: Contemporary Styles of Interpretation.* Delta, Reprint: The MIT Press.

Eisenman. P, (1999) *Diagram Diaries*, New York: Universe Publishing, Thames and Hudsen.

Ettlinger, O. (2008). *The Architecture of Virtual Space*. Ljubljana: University of Ljubljana – Faculty of Architecture.

Focillon, H. (1934). Vie des forms: The Life of Forms in Art. (Paris: Quadrige & Presses Universitaires de France), Engl. trans. Charles Beecher Hogan & George Kubler.

Gelenrnter, M. (1995). Sources of architectural form, a critical history of Western design theory. Manchester University Press.

Galinsky, K. Classical and modern interactions: postmodern architecture, multiculturalism, decline, and other issues. Austin: University of Texas Press, 1992.

Hassan, I. (1982). The Dismemberment of Orpheus: Toward a Postmodern Literature.

Heidegger, M. (1977). The Question Concerning Technology and Other Essays. William Lovitt trans.

Jencks, C. (1978) Language of post-modern architecture .London: Academy Editions.

Jencks, C. (2002). New paradigm in architecture: the language of post-modernism. New Haven: Yale University Press.

Lavin, I. (1997). *Three Essays on Style, ed.* Cambridge & London: MIT Press.

Lessard, S. (1978). *A Report at Large "THE TOWERS OF LIGHT"*. The New Yorker.

Lyon, D. (1999). Post-modernity. Open University Buckingham.

Lyotard, J.f. (1977). *The Postmodern Condition: A report on Knowledge*. Manchester: Manchester University Press.

Lyotard, J.F. (1984). *The Language of Post-modern Architecture*. Academy Editions, London. University of Chicago Press, Chicago.

Rajchman, J. (1998). Constructions. The MIT Press, Cambridge, Mass.

Somol, R. E. (1999) *Dummy Text, or The Diagrammatic Basis of Contemporary Architecture*, Introduction to Peter Eisenman, Diagram Daries, 15.

Tarnas, R. (1991). The Passion of the Western Mind: Understanding the Ideas
That Have Shaped Our World View; Ballantine.

Venturi, R, Scully, V. (1992). *Paperback. Light wear to edges*. Preface by Aldo Rossi. Near Fine Paperback 0847811425 (Item ID: 140698)

Venturi, R. (1966). *Complexity and Contradiction in Architecture*, New York: Museum of Modern Art and Graham Foundation.

Venturi, R., Scott Brown, D., and Izenour, S. (1972). *Learning From Las Vegas*. Cambridge, Mass. & London: The M.I.T. Press.

Vidler, A. (2000). Wraped space: art, architecture and anxiety in modern culture. Massachusetts Institute of technology.

Wölfflin, H. (1964). Renaissance und Barock (Munich: Ackerman,), Engl. trans.

KathrinSimon as *Renaissance and Baroque* London: Phaidon publications.

Zamiran, M. (2002) *Lectures on Philosophy of Post-Modernism*. Tehran University Publication.