

ARCHITECTURAL BUILT FORM AND PUBLIC DIALOGUE:
AN EVALUATION OF PUBLIC WALL IN ITS COMMUNICATIVE ROLE

A THESIS SUBMITTED TO
THE GRADUATE SCHOOL OF NATURAL AND APPLIED SCIENCES
OF
MIDDLE EAST TECHNICAL UNIVERSITY

BY

TUĞBA GÜÇLÜ

IN PARTIAL FULFILLMENT OF THE REQUIREMENTS
FOR
THE DEGREE OF MASTER OF ARCHITECTURE
IN
ARCHITECTURE

DECEMBER 2006

Approval of the Graduate School of Applied and Natural Sciences

Prof. Dr. Canan Özgen
Director

I certify that this thesis satisfies all the requirements as a thesis for the degree of Master of Architecture.

Assoc. Prof. Dr. Selahattin Önür
Head of Department

This is to certify that we have read this thesis and that in our opinion it is fully adequate, in scope and quality, as a thesis for the degree of Master of Architecture.

Assoc. Prof. Dr. Ali Cengizkan
Supervisor

Examining Committee Members

Assoc. Prof. Dr. Baykan Günay (METU, CP)

Assoc. Prof. Dr. Ali Cengizkan (METU, ARCH)

Assoc. Prof. Dr. Cana Bilsel (METU, ARCH)

Assist. Prof. Dr. Davide Deriu (METU, ARCH)

Instr. Dr. Tuğyan Aytaç Dural (Başkent Univ., ARCH)

I hereby declare that all information in this document has been obtained and presented in accordance with academic rules and ethical conduct. I also declare that, as required by these rules and conduct, I have fully cited and referenced all material and results that are not original to this work.

Tuğba Güçlü

ABSTRACT

ARCHITECTURAL BUILT FORM AND PUBLIC DIALOGUE: AN EVALUATION OF PUBLIC WALL IN ITS COMMUNICATIVE ROLE

Güçlü, Tuğba

M.Arch., Department of Architecture

Supervisor: Assoc. Prof. Dr. Ali Cengizkan

December 2006, 116 pages

This thesis is a study on the interface of public built form and the open public space surrounding it. The aim is to explore the problem of the transition between interior and exterior public space, that is the exterior skin of the public built form: its public wall. Public wall is explored as an in-between element belonging to both spaces, which forms the dialogue of these spaces. The dialogue is studied in terms of communicative qualities. A conceptual framework is established for the analysis of the public wall. To develop the communication notion further, two milieus of communication of the interior and exterior public space are discussed: transparency and de-materialization. At the end, in order to examine how the theoretical approaches turn into practical solutions, some contemporary architectural examples of public buildings are evaluated in relation to the established framework of the public wall. Therefore, the emphasis given on the subject of public wall is supposed to contribute to the network of relations in the cityscape, and activate those relations, as these relations of built form and open space are at the base of urban realm.

Keywords: public wall, communication, transition, transparency, de-materialization.

ÖZ

MİMARİ YAPI VE KAMU DİYALOĞU: KAMUSAL DUVARIN İLETİŞİMSEL ROLÜ AÇISINDAN BİR DEĞERLENDİRMESİ

Güçlü, Tuğba

Yüksek Lisans, Mimarlık Bölümü

Tez Yöneticisi: Doç. Dr. Ali Cengizkan

Aralık 2006, 116 sayfa

Bu tez kamusal mimari yapı ve onu çevreleyen açık kamusal alanlar arasındaki geçişim üzerine bir çalışmadır. Buradaki amaç iç ve dış kamusal mekânlar arasındaki geçişim problemini, yani kamusal mimari yapının dış çeperi olan kamusal duvarı incelemektir. Kamusal duvar, bu mekânların diyalogunu kuran ve iki mekâna da ait olan bir ara eleman olarak incelenmiştir. Diyalog, iletişimsel nitelikler açısından çalışılmıştır. Kamusal duvarın incelenmesi için kavramsal bir çerçeve oluşturulmuştur. İletişim fikrini daha fazla geliştirmek amacıyla, şeffaflık ve çözünme, iç ve dış kamusal mekân arasında birer iletişim aracı olarak değerlendirilmiştir. Son olarak, teorik yaklaşımların pratik çözümlere nasıl dönüştüğünü incelemek amacıyla, belirli çağdaş kamusal yapılar kamusal duvar için oluşturulan kavramsal çerçeveye bağlı olarak değerlendirilmiştir. Sonuç olarak, kamusal duvar konusuna verilen önemin, kenti oluşturan ilişkiler ağına katkıda bulunması; ve kamusal mimari yapı ve açık kamusal alan ilişkileri kentsel oluşumun temelinde olduğu için, bu ilişkileri hareketlendirmesi beklenmektedir.

Anahtar Kelimeler: Kamusal duvar, iletişim, geçişim, şeffaflık, çözünme.

To My Family

ACKNOWLEDGMENTS

I would like to express my sincere gratitude to my supervisor Assoc. Prof. Dr. Ali Cengizkan for his guidance, criticism, encouragements and insight throughout the research. I also have to thank him for keeping up my enthusiasm and his belief in my thoughts.

I would also like to thank the jury members for their suggestions and comments in my jury.

Finally, I would like to express my deepest gratitude to Eylem for his lifelong support, encouragement, patience and care not only throughout the thesis, but throughout the years we spent together. Thanks for presenting the glory of life.

TABLE OF CONTENTS

PLAGIARISM	iii
ABSTRACT	iv
ÖZ	v
ACKNOWLEDGMENTS	vii
TABLE OF CONTENTS	viii
LIST OF FIGURES	xi
CHAPTER	
1. INTRODUCTION.....	1
1.1. Definition of the Problem	1
1.2. Aim and Scope of the Thesis	5
2. AN EVALUATION OF PUBLIC WALL IN ITS COMMUNICATIVE ROLE	8
2.1. Basic Concepts in the Formation of the Public Wall	8
2.1.1. Perception of Form.....	8
2.1.2. Building Skin	10
2.1.3. Communicative Function of the Physical Environment	11
2.1.4. Public Space	13
2.1.5. Contemporary Public Building	16
2.2. Public Wall.....	18
2.2.1. Existential Roles of Public Wall	22
2.2.1.1. Physical Milieu	23
2.2.1.2. Social Milieu	26

2.2.1.3. Symbolic Milieu.....	28
2.2.2. Communicative Role of the Public Wall: Public Wall as a Transition Space.....	30
2.2.2.1. Exteriority ‘vs.’ Interiority	31
2.2.2.2. Horizontal Experience: here or there	32
2.2.2.3. Space-Time Relation: movement.....	36
2.2.2.4. Delimitation of Public Wall	38
2.2.2.5. Public wall as the room-in-between.....	41
2.2.2.6. Vertical Experience: Earth and Sky	41
2.2.2.7. The Interaction of Interior and Exterior Public Space in Contemporary Architecture.....	45
2.2.2.8. Privatization/Ownership Effects on Communication.....	47
3. TWO MILIEUS OF COMMUNICATION WITHIN THE PUBLIC WALL: TRANSPARENCY AND DE-MATERIALIZATION	49
3.1. Transparency	52
3.1.1. Definition	52
3.1.2. Communicative Qualities of Transparency in the Public Sphere ..	56
3.2. De-materialization.....	61
4. AN EVALUATION OF CONTEMPORARY EXAMPLES OF PUBLIC BUILDINGS IN THE CONSTRUCTED FRAMEWORK OF PUBLIC WALL	66
4.1. An Examination of Contemporary Public Buildings in Terms of Communicative qualities of Public Walls.....	68
4.1.1. Storefront for Art and Architecture.....	68
4.1.2. Carré d’Art	72
4.1.3. The Museum of Modern Art	78
4.1.4. Foundation Cartier	83

4.1.5. Seattle Central Library	89
4.1.6. Sendai Mediatheque	93
4.2. Evaluation of the Public Wall Formations through Basic Communicative Patterns	97
4.2.1. Accessibility	98
4.2.2. Spatiality of Public Wall	99
4.2.3. Permanence	101
4.2.4. Material Configuration of Public Wall	102
4.2.5. Scale	104
5. CONCLUSION	105
5.1. Overview	105
5.2. Findings and Conclusions	108
REFERENCES.....	113

LIST OF FIGURES

FIGURES

Figure 1.1: Illustration for the strict division problem of public space.....	3
Figure 1.2: An abstraction of the traditional architectural relation.....	4
Figure 1.3: An abstraction of the contemporary architectural relation	4
Figure 2.1: Abstraction of blurring of the transition, providing permeability	19
Figure 2.2: An abstraction of here and there relation.....	33
Figure 2.3: Walls which generate space or space which generate walls? A drawing by Paolo Portoghesi and V. Gigliotti	40
Figure 2.4: An abstraction of Conventional Location Definitions of Base - Middle – Top, referring to Raymond Curran.....	42
Figure 2.5: The treatment of façade plane for lowering scale by Richard Hedman and Andrew Jaszewsky	44
Figure 3.1: Villa Stein at Garches, Le Corbusier, 1927	53
Figure 3.2: Bauhaus, Walter Gropius, 1925.....	53
Figure 3.3: Le Corbusier painting. <i>Still Life</i> , 1920	55
Figure 3.4: Hoesli's analysis of <i>Still Life</i> with Stacked Plates.....	55
Figure 3.5: Frank Lloyd Wright's Taliesin West	58
Figure 3.6: Hoesli's abstraction of Taliesin West	58
Figure 3.7: Michelangelo: Stages in the design of the façade of S. Lorenzo, Florence	59
Figure 3.8: Dancers in night festival at Seagram building, New York.....	61
Figure 3.9: Digital screen of the T-Mobile Headquarters in Bonn by ag4	63

Figure 3.10: Digital screen of the T-Mobile Headquarters in Bonn by ag4	63
Figure 3.11: Tower of Winds by Toyo Ito, in Yokohama, Japan	64
Figure 4.1: Exterior view of Storefront for Art and Architecture when it is closed.	68
Figure 4.2: Exterior view of Storefront for Art and Architecture when it is open.	68
Figure 4.3: Storefront for Art and Architecture	69
Figure 4.4: Storefront for Art and Architecture, uses of panels.....	69
Figure 4.5: Carré d'Art, frontal view	72
Figure 4.6: Carré d'Art facing Maison Carrée on the front	73
Figure 4.7: The section of Carré d'Art and Maison Carée.....	75
Figure 4.8: A concept sketch of Carré d'Art, Norman Foster.....	75
Figure 4.9: Carré d'Art, the roof café overlooking to the open public space and the temple	76
Figure 4.10: The Museum of Modern Art.....	78
Figure 4.11: MoMA, Building block on the west	80
Figure 4.12: MoMA, Building block on the east	80
Figure 4.13: Model of the Museum of Modern Art	82
Figure 4.14: Site plan of the Museum of Modern Art	82
Figure 4.15: Foundation Cartier	83
Figure 4.16: Transversal section of Foundation Cartier.....	84
Figure 4.17: Foundation Cartier neighborhood.....	87
Figure 4.18: Foundation Cartier ground floor.....	87
Figure 4.19: Foundation Cartier ground floor.....	87
Figure 4.20: Seattle Central Library	89

Figure 4.21: Seattle Central Library entrance.....	90
Figure 4.22: Seattle Central Library entrance.....	90
Figure 4.23: Seattle Central Library model showing the platforms.....	91
Figure 4.24: Seattle Central Library section	91
Figure 4.25: Seattle Central Library, night view	92
Figure 4.26: Sendai Mediatheque	93
Figure 4.27: Section and diagram of Sendai Mediatheque	94
Figure 4.28: Opening façade of Sendai Mediatheque.....	96

CHAPTER I

INTRODUCTION

1.1 Definition of the Problem

Architectural built form and public dialogue can be stated as a process beginning with the user's perception of the built form, and continuing with the serving of the built form to the user functionally, socially and symbolically.

Architectural built forms can be commissioned as public, private or intermediary formations. The type of the formation defines the direction and the flow of the dialogue between the built form and the public. Namely, while a private built form limits visual and physical accessibility, a public built form opens itself to the outsider. In accordance with this context, architectural built form and public dialogue is studied throughout the thesis for the case of public buildings. Public buildings are preferred to be studied consciously as the dialogue between the public built form and public is expected to be at its most.

What makes it to be considered as problematic is basically the boundary of the public built form acting as an obstacle between two public spaces defining the limits of the dialogue. In this context, the questioned subject is the communicative role of the boundary as an interface between the public built form and the open public space. The boundary configured as such is named in the thesis as *public wall*. That is to say, public wall¹ is a formation that is both the boundary of a public built form situated in

¹ Christian Norberg-Schulz uses the term 'public wall' in his book *the Concept of Dwelling*. Norberg-Schulz uses the terms city wall as the wall of the settlement, urban wall as the wall of the urban spaces, public wall as the wall of the public building and private wall as the wall of the house. And he states they are distinguished by certain characteristics. Public wall and private wall are constituents of urban wall. He does not dwell upon the term in detail as it is not the main subject of the book.

an open public space and become the edge of the open public space. Hence, it is an in-between formation of the two public spaces, and both sides' publicness makes it a *public wall*.

While creating its own space, being inserted in an already existing space, the building changes the characteristics of its environment. It creates its own *boundary* that constructs interiority and exteriority according to its design decisions and judgments. A boundary is not only a static barrier. It is a point of interface; a threshold for exchange in the public context. The interrelation of the public building and the open outdoor space surrounding it, is expected to be dynamic to communicate with the user. Hence, the public wall of the built structure becomes the generator of the communication as a transitory element.

Therefore, *the public wall*, the envelopment of a public built form situated in a public context, is an instrument that interrelate the public interior and public exterior. Public wall, creating the transition is the issue to be identified. In **Figure 1.1**, the problem of division of two public spaces is abstracted. The public wall acting as a solidified formation which allows transition just on the ground level, defines the degree of division of two public spaces, and thus makes each circulate in itself. Thus, the public wall is studied as an interface that defines the degree of interpenetration of both. This interpenetration allows the public to circulate with minimized restriction, and this would show that a public building is truly public or not. It is investigated whether the integration of the two separate circulations of interior and exterior public spaces to form a single circulation through the characteristics of public wall develops the dialogue of these spaces or not. Briefly, the public wall's performance as an interface being a site for communication of interior and exterior public space is the point. Communication here stands for information exchange between the spaces, and the behavioral inclination and orientation of the user.

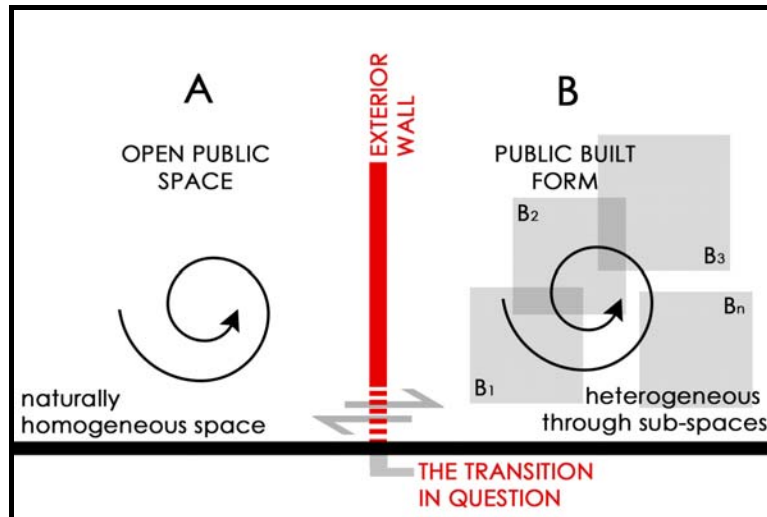


Figure 1.1: Illustration for the strict division problem of public space.

Present day architecture is also in a supportive condition of the problematic. Understanding of architecture has been breaking its conventional meaning of ‘enclosed space.’ At present, under the influence of technological developments, contemporary architecture experience more developed open forms. The development of open architecture is strengthening questioning of the public wall because instead of continuity of experience through public open space as in the past, there appear fragmented experiences. (**Figure 1.2, 1.3**) Recent architectural designs have been characterized by free-standing buildings which reflect differing aesthetic preferences. Consequently, as the building and street interface that forms the urban wall disappeared, the relation between the built structure and the open public space have changed. There appear ruptures of perceptions of surrounding built structures which have differing stylistic approaches. Each built form communicates with its surroundings in various manners. Consequently, there appears the fragmented formation illustrated in **Figure 1.3**. Another issue related with fragmentation is the privatization of public sphere in contemporary architecture. In today’s architecture buildings have tendencies of becoming introverted spaces as a result of specialization of activities and security reasons. Instead of accepting everyone, they choose their participants; they don’t welcome everyone, which is mainly revealed through the building skin formation. In consequence with their privatization, those public

buildings contribute to the fragmentation of the city as they act as closed self-standing buildings.

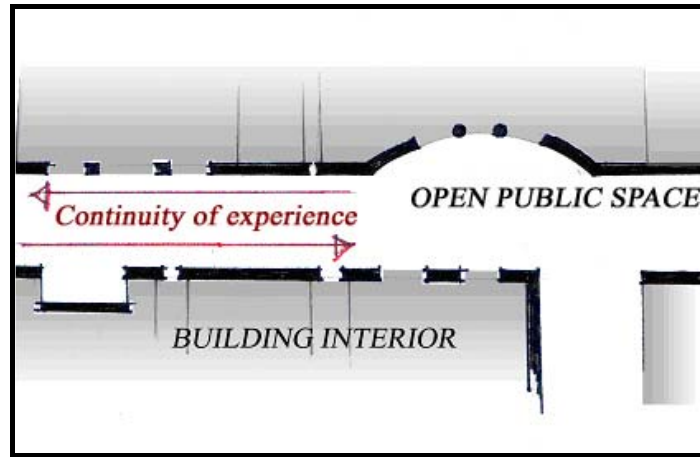


Figure 1.2: An abstraction of the traditional architectural relation with open public spaces.

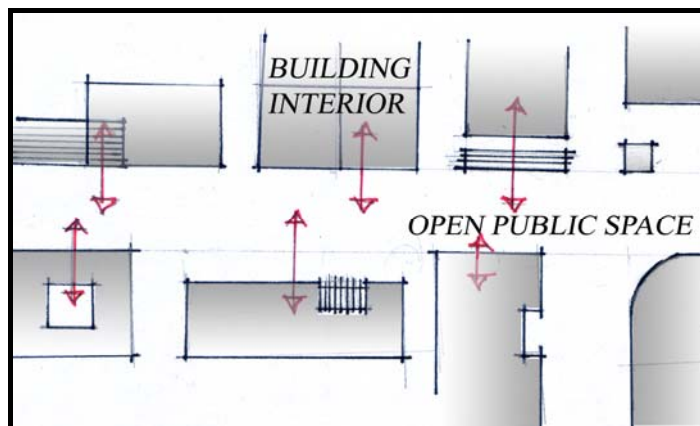


Figure 1.3: An abstraction of the contemporary architectural relation with open public spaces.

Hence, in the public context, the interior to be truly ‘public;’ the exterior not to be ‘residual space,’ but to be the connective channels of the city, the public wall issue gains importance. Thus, the possibility of a common language of those built form skins independent from the stylistic approaches is in question. In this context, Amos Rapoport questions: “There is a need to bridge many arbitrarily defined

boundaries separating fields which, at least potentially, can contribute to an understanding of the way cities are organized, how people see them and use them and how cities should be organized.”² To contribute the organization of the city network, the thesis questions the bridging of the public building and the surrounding spaces.

As the built structures tend to have open plans, the continuity of experience between the public built form and the open public space as illustrated in **Figure 1.3** takes place. Consequently, the blurring or sharpening of the transition is questioned as to achieve an open design, the initial concern is the intersection area of the built structure with its surrounding, that is to say, the boundary of the built structure.

1.2 Aim and Scope of the Thesis

The aim of the thesis is to put emphasis on the importance of the dialogue between the public architectural built form and the public, and underline the role of “public wall” in the development of the quality of living environment. The role of public wall as a transition space is examined to evaluate whether a public building works successfully or not, considering its skin characteristics: if it is an introverted entity or a permeable structure. It is necessary to study the area where the public building and its neighboring public space meet and interact. To design the transitional space between the public building and the open public space in a successful manner, it is necessary to understand the formation, organization and the meaning of public wall in the architectural context.

The problem of the interaction is studied in terms of communicative qualities. Namely, the public wall is explored as an element belonging to both spaces, which forms the transition. Thus, the public wall bears roles of separating, uniting and representing. In this sense, its formation is described in this study in terms of

² Rapoport, Amos. *Human Aspects of Urban Form*, Pergamon Press, New York, 1977, p.4.

physical, functional social and symbolic senses. These inputs briefly figure out the roles of public wall.

It is aimed to end up with suggestions of how public wall successfully or unsuccessfully interact with the environment and the user. To achieve findings that assist in characterizing the quality of public wall, theoretical approaches are utilized to analyze practical suggestions. Through the analysis of exemplar public buildings, it is aimed to achieve findings about the contribution of the public wall in terms of design value and experiential quality. The selected works of architecture, despite sharing the objective of achieving ‘publicness,’ have varying design approaches. Through the variation in the formation of the public wall, it is aimed to observe the different design attitudes, and thus, to obtain *patterns* that influence the dialogue of public spaces. The investigation methodology of the thesis can be expressed as follows:

Theoretical Approaches → Practical Solutions → Conclusive Findings

After examining the public buildings in concern briefly, a comparative evaluation of the public walls of these buildings will be made in the light of the findings obtained. These findings are expected to become patterns of public wall that take part in achieving certain results for the production of successful urban environments.

Additionally, in order to clarify the patterns of contemporary formation of public wall and to evaluate its dominating aspects in terms of architecture-public dialogue, an analytical examination of the milieus of transparency and de-materialization is fulfilled. The fundamental reason for the selection of the milieus which are potential bearers of communication is that, they are two of the foremost current approaches of design in the conceptualization and implementation of the public wall in contemporary architecture which have stimulated architecture-public dialogue. Both milieus that gain importance in contemporary architecture, provide the understanding of *the other space* that is neighboring, and relating the declared spaces, but in different ways: literal transparency as a material quality, phenomenal transparency

as an organizational quality, and de-materialization as the treatment of the public wall not as a concrete formation but as an intangible formation. In light of analysis of these communicative concerns, contemporary examples of public built forms are examined. Thus, the role of public wall in its communicative quality and the contributions of transparency and de-materialization will come to light through the examination of public built forms and the atmosphere they create.

In relation to the subject matter, at the beginning of the thesis, certain key concepts are examined: perception of form, building skin, public space and communicative function of the physical environment which figure out characteristics of public wall. As the subject matter is the quality of the dialogue of interior and exterior public space, just the communicative quality of the public wall is studied, its tectonic quality is not considered.

It is also intended to make clear that the historical process of the public built form-public open space relation witnesses certain transformations. The major properties of the contemporary products are discussed in relation to the traditional products. Because the main subject matter is the dialogue of public built form and the open public space in contemporary architecture, the traditional architecture is only considered to clarify the transformation; the styles and the details are not studied.

Actually, as the conception of 'public' lies at the base of the subject matter, understanding space is essential in directing people's behavior who use it, and thus the research on the public wall will have a causal impact on the study of place-making. And it is aimed to transform the passers-by into active participants of the public buildings.

CHAPTER II

AN EVALUATION OF PUBLIC WALL IN ITS COMMUNICATIVE ROLE

In this chapter, it is intended to point out the role of public wall in constructing the dialogue between the public and the public built form within the heterogeneous and fragmented structure of the contemporary urban life. To represent a theoretical framework of the public wall, basic concepts are mentioned at the beginning. As the aim of the study is to analyze the communicative role of the public wall, what communication means in non-verbal terms, and definitions of form and publicness are defined in this chapter. Through the analysis of public wall dealing with the production of urban space, we get essential insights about the dynamics that affect the transformation of public space.

2.1 Basic Concepts in the Formation of the Public Wall

2.1.1 Perception of Form

In daily life we generally act on the basis of our spontaneous perceptions, without trying to classify or analyze our impressions. Nevertheless we manage surprisingly well, due to the fact that the phenomena ‘appear (are perceived) with form.’³

In the urban sense, our everyday experiences depend on temporary image-shots as we are passers-by. Thus, we notice the buildings as images that are products of their formal arrangement. Consequently, for the passers-by, the language of a built form skin provides spontaneous perception of its character. In this sense, Yoshinobu

³ Norberg-Schulz, Christian. *Intentions in Architecture*, MIT Press, Cambridge, Massachusetts, 1965, p. 27.

Ashihara in her book *The Aesthetic Townscape* states: “the concept of ‘imageability’ represents an attempt to perceive the city or townscape, not in terms of concrete features such as buildings, but as images of the structure of those perceived forms.”⁴ Hence, in terms of spontaneous perception, at the outset, we perceive the image of the public wall and then comes the perception of the mass. In the case of spontaneous perception, public wall represents the whole formation of the building.

As those built forms come together, they form the concrete composition of the city, which possesses a kind of language. A built form is not perceived just on its own, but it is perceived with its surroundings. As ‘surroundings’ is a combination of the neighboring built forms and open spaces of the city, these relations altogether form the composition of the city structure. Thus, a built form, being one of the basic components of the city, influences the city structure. How it is perceived is part of the silent language of the city. In relation, Raymond Curran states for the public context as:

The forms and spaces that constitute the public domain must be coordinated and based on an understanding of how they “speak” to people. Indeed, the city is perceived and interpreted as a kind of silent language. It expresses ideas that suggest and affect the way we use it on a day-to-day basis.⁵

How we perceive and interpret our physical surroundings is a matter of psychology, and how to create those physical surroundings is a matter of architecture. Architecture has the ability to shape perception as we perceive forms associating meanings with them, for the architect, especially for public buildings, the consideration of perception of his building is very important as the whole community is ‘the user.’

⁴ Ashihara, Yoshinobu. *The Aesthetic Townscape*, the MIT Press, Cambridge, Massachusetts, 1983, p. 117.

⁵ Curran, Raymond J. *Architecture and the Urban Experience*, Van Nostrand Reinhold Company, New York, 1983, p. v.

2.1.2. Building Skin

Perception of a building starts with the introduction of its outside skin. As Pierre von Meiss, in his book *Elements of Architecture* states, “the experience of architecture is primarily visual and kinaesthetic (using the sense of movement of the parts of the body).”⁶ Spontaneous perception of a built form turns it into an image until the outsider examines the built form. After noticing its spatial formation, it becomes a composition offering a scene for a certain function. Architecture is a static formation, but it provides appropriate spatial configurations for actions. It guides the user through its organization. For instance it can define a definite circulation path, somewhere to stay or somewhere to pass by. As we read the structure, architecture turns into a scenario. In this context, Meiss also states, “architecture is image only in a drawing or photograph. As soon as it is built it becomes the scene and sometimes the scenario of comings and goings, of gestures, even of a succession of sensations.”⁷ Hence, architecture suggests the freezing of movement into a solid structure.

As architecture offers a scenario for a certain act, building skin is a significant part of the scenario as it represents the built form. The skin has the roles of revealing an identified message to the user outside, and providing the communication between the built form and its surroundings. The message is formed through the articulation of that skin:

The meaning of a built form consists in its standing, rising and opening, that is in its being between earth and sky. Through its being between earth and sky it gathers and embodies a world. We may also say that the embodiment takes place in the boundaries which define the spaces where life takes place, primarily in the *wall*.⁸

The declaration of ‘embodiment’ in Christian Norberg-Schulz, is the built form’s identity in concrete terms; basically, how it is characterized through behaviors of

⁶ Meiss, Pierre von. *Elements of Architecture*, Van Nostrand Reinhold, London, 1990, p. 15.

⁷ Meiss, 1990, p. 15.

⁸ Norberg-Schulz, Christian. *Concept of Dwelling*, Rizzoli International Publications, New York, 1985, p. 25.

standing, rising, opening or closing, etc. Similar to the living things having basic behaviors, the built forms have as well. Different from each other, they have their identities, behaving according to the matrix of many aspects such as function, symbolization, environment characteristics, and so on. And these tasks of the built form are materialized principally in the wall. Roger Scruton also states how the walls affect us as:

Walls, which divide space, also create it. And it is the discipline of the wall which is the pride of the classical vernacular. We linger where walls invite us, and hurry where they exclude us. Plate glass façades leave us over-exposed to observation from those behind them. Blank concrete screens seal us off from whatever they contain.⁹

The building skin, while dividing the space as interior and exterior, creates the both spaces' boundary. The skin determines the character of the tension between inside and outside. It either possesses openness and invitation; or there can be complete closure and rejection. Thus, defining the character of the built form, building skin also defines the character of the neighboring open public space.

As the concrete structure of the space we are in guides our movement, the building skin has a 'vivid and vital' role in Roger Scruton's terms. And its quality is revealed in terms of the degree of its guidance, for instance, inviting inside, or excluding, etc., which basically means its communicative quality.

2.1.3. Communicative Function of the Physical Environment

From the architectural perspective, visual perception of an architectural product is constructed on two elements: the user and the product through which the architects broadcast messages. The architectural meaning, namely the messages interpreted by the user, constructs the communication of the user and the building. Architecture is a communicative medium. Architectural built form has the ability to direct the user's behaviors. "The built environment provides *cues for behavior* and that the

⁹ Scruton, Roger. "Public Space and the Classical Vernacular," in *The Public Face of Architecture*, ed. Glazer, Nathan and Lilla, Mark The Free Press, New York, 1987, p. 24.

environment can, therefore, be seen as a form of *non-verbal communication*.”¹⁰ To illustrate, the spatial organization makes the user to walk through or even to stay at a specific point. Thus, people tend to behave in accordance with the environmental cues, which all mean the interpretation of the messages of the architect broadcast. As Rapoport states, “If the design of the environment is seen as a process of encoding information, then the users can be seen as decoding it. If the code is not shared, not understood or inappropriate, the environment does not communicate.”¹¹ Communication of the physical environment is generally based on symbolism. Symbolism presents the ideas. The characteristics of a place are expressed –if it is open to everyone or blocking; if it is a sacred place or a monumental place symbolizing a certain historical thing of the society, etc. – generally through symbolic attributes that have social or cultural meanings. As a result of appropriate expressions of the architectural built forms, the user is made to behave accordingly; he is guided by the organization of the built form, which is a form of communication. In relation, Rapoport states:

The environment can be viewed as a form of non-verbal communication, users need to read it so that the coding/decoding process must be considered. This seems to provide an analytical tool of potentially great power for decoding environments otherwise likely to be misunderstood, and also an approach to encoding which may make the designer’s role and task easier, and also enable him to consider the limits of what he can do, the importance of open-endedness and an additional reason for looking at the city a set of more or less distinct areas with different codes and meanings.¹²

The coding/decoding process represents a flow of information. In relation, public wall, being an interface between public building and the open public space, is the site for the information flow.

¹⁰ Rapoport, Amos. *Human Aspects of Urban Form*, Pergamon Press, New York, 1977, p.3.

¹¹ Rapoport, 1977, p.3.

¹² Rapoport, 1977, p.333.

2.1.4 Public Space

The production of public space is related with the determination of ‘public.’ It is a common space in which people come together for some purpose. In the context of the subject matter, the related definitions are on “being open to everyone.” Thus, it is mainly related with accessibility; that is either physical or visual, and social interaction between heterogeneous individuals. Specifically, a public building is a place where public relations are provided, that is a type of communication.

Carr *et al.*, determine five essential components of rights of people using public spaces as access, freedom of action, claim, change and ownership and disposition. The degree of these five elements shapes the rights of people using public spaces and the publicity of the place according to them.¹³

As Carr *et al.* consider, *accessibility* can be considered as physical, visual and symbolic terms. Physical access is related with the limitations of the boundaries of a space. Those limitations are defined in respect of the intended roles of the public wall. For a public space, too much limitation of physical access leads to the privatization of the space. Namely, the connection of a public space to the surrounding public spaces is crucial in terms of its function of being open to all. Visual access means the visibility of a public space. Visibility provides a space to inform the outsider of its formation. Expressing itself as a common ground, the public space makes the outsider to feel free to enter. Also, visibility of a space presents its function, and thus it provides the ability of inviting the passers-by. Symbolic access is related with the visual language of the public building. The image of the building invites or rejects the outsider; namely, it gives information about who is welcomed.

In its real meaning, as ‘public’ space is expected to be open to all, the boundaries gain the responsibility of being permeable and open to public use.

¹³ Carr, Stephen; Francis, Mark; Rivlin, Leanne G.; Stone, Andrew M., *Public Space*, Cambridge University Press, New York, 1992, p. 137.

Freedom of action in public spaces is the minimized restriction with respect to private spaces. As it is a shared space of a heterogeneous society, one's freedom is restricted with the others'. Carr et al. state the other components as: *claims to a space* are related with the spatial control of that space by an individual or "a group and it is seen necessary for the achievement of the goals... *Change and evolution* occurring in various ways including public action, is an important quality of successful public spaces. The ability of a place to evolve and change over time is an important quality of good public spaces."¹⁴ In terms of *ownership and disposition* of public spaces, it is suggested that: "...the right of disposition represents a form of ultimate control, encompassing and transcending the rights inherent in access, action, claim and change."¹⁵ As accessibility component of public space is naturally related with the boundaries, it is considered in the formation of the public wall at most.

As accessibility of all the citizens is one of the components, ownership and disposition conflicts with it, because of presenting restrictions as a result of control. Defining public space not just the places of public use owned by the public, but also privately owned places used by the public in order to meet the shared needs will remove the conflicts. Thus, in the architectural sense, public space notion can be classified as open public spaces – as parks, public squares, streets - and closed public spaces, which are public buildings as cafés, music halls, theatres, or halls used for similar purposes, outdoor cinemas, halls for public meetings, lectures or public amusements, municipal halls, buildings used for exhibitions, railway, tramway or autobus stations, public libraries, museums and baths, churches, mosques, schools, hospitals, clubs...

When choices are made within the milieu of possibilities, patterns of agreement are established, which represent a more structured kind of togetherness than the mere meeting. Agreement thus implies common interests or values, and forms the basis for a fellowship or society. An agreement also has to "take place," in the sense of possessing a forum where the common values are kept and expressed. Such a place is generally known as an institution or public building, and the mode of dwelling it serves we may call public dwelling, using the word

¹⁴ Carr, Stephen; Francis, Mark; Rivlin, Leanne G.; Stone, Andrew M., 1992.

¹⁵ Carr et al, 1992, p.177.

“public” to denote what is shared by the community. Since the public building embodies a set of beliefs or values, it ought to appear as an “explanation,” which makes the common world visible.¹⁶

The public building, being common to people is responsible to reveal its content, different from the private realm. If it becomes an introverted closed box, it becomes privatized. Then it would serve to definite people, failing to be common to all. On the contrary, in its real meaning, it serves not only to people aiming to go there, but also to passers-by by means of inviting them inside. Thus, the public built form is expected to appear as an ‘explanation,’ as Norberg-Schulz states, if it is expected to work as a design product. Whereas open public spaces are open to all with no limitation, public buildings appear to be relatively privatized. This privatization may be a result of limitations for security, weather, purpose, special use, etc. In reality, public is fragmented into different groups, which creates another limitation. Thus, there is no complete freedom of action; some conventional unwritten rules exist for the case of public buildings. While public buildings remain as semi-public relative to open public spaces, they still exist as public relative to private buildings. So, there exists a gradation of publicness and openness between those spaces. Even, a public building in itself has a gradation of publicness. It contains totally public or totally private spaces in itself.

For a building to present itself as public, to balance its characteristics of restriction and allowance in the formal sense is significant, not to act as a private formation. In this case, the arrangement of the boundaries gains importance.

Public buildings are places where some kind of social action of a common ground takes place. They are the places where the society meet, and share a certain kind of experience. However, they are not always accessible to all; the building is sometimes selective of its participants. And the building states its selection and sets its rules through its physical formation, which is a communicative act of public wall.

¹⁶ Norberg-Schulz, Christian. *Concept of Dwelling*, Rizzoli International Publications, New York, 1985, p. 13.

2.1.5. Contemporary public building

Public spaces of a city maintain and support the social life of the society. They are the nodes of common activities of the citizens. What remain except the private formations of a city are the constitutions that have public attitudes of a certain degree. The public spaces of a city connect the private nodes as they are common grounds for people to come together, to share experiences.

Characteristics of public spaces are in a transformation process as a result of globalization and developing technology. Their scale, formal attitudes, usage, aim, and the publicness are in transformation. The public buildings tend to be more introverted formations. This is a result of specialization of activities, and accordingly selection of participants –generally to address certain income level-, and fear of increasing crimes. Still, these factors do not necessitate an introverted formal organization. The developing technology permits highly open, flexible and at the same time, secure arrangements. Thus, the behavior of a public building becomes a matter of choice of design. However, the scale of public buildings change by the help of technological advances; care about social life quality has been replaced by care about financial interest, and parallel with it, human scale built forms are replaced with large-scale buildings.

Another outcome of the developing technology is the motor car. Its coming into our life changed the perception of open outdoor space. Madanipour states:

Modernism introduced a new concept of space. The motor car took over the urban space, changing the relationship between human beings and buildings, between buildings and open spaces, between mass and void, abolishing enclosed public spaces such as streets and square as known before. This gave way to vast open spaces and flexible location of high-rise buildings, subordinating the void to the mass, undermining the spaces of sociability.¹⁷

In the urban sense, the end result of the motor car is the tendency of a fragmented city. The city has begun to be perceived as solids and voids. Private constitutions

¹⁷ Madanipour, Ali. *Public and Private Spaces of the City*, Routledge, London, 2003, p.237.

already display introverted behaviors; public constitutions are the buildings having the ability to contribute the city's network of relations through connecting themselves to the open public spaces they are neighboring. While introverted formations of different characters end up in fragmented and alienating places, the extroverted and open buildings are easy to read; binding the ties and filling the gaps, they act as the 'connecting nodes' by making any place, relation and formation accessible.

Today, except the 'successful' streets or open spaces, the remaining streets are spaces of passers-by. What makes the open public space successful or a space just the person passes by is a matter of location and character. And what defines its character is the way in which the urban wall defines its boundaries. So, the neighboring places make the public open space to be lively or to become empty. In this context, public wall is decisive in the dialectic relation: the street to be empty on edges, and the public building to be empty without energy on the street. Working well with the open public spaces, the fragments may be connected to form a whole: the public infrastructure of the city.

Among the five declared components of public space, ownership and claims to the space generally define the outline of today's public buildings. Privately owned and publicly used buildings now constitute the dominating part of the public infrastructure, in terms of use and number. As most of the contemporary public buildings such as exhibition centers, museums, shopping malls, etc. are owned by private agencies, publicness of those buildings can be questioned because accessibility to those buildings is consciously limited. 'Being open to all' is no more supported. Because the privatization offers the selection of the participants. It is in response to the privatization that this study is on the investigation of public wall as it is the main decisive formation of promoting privatization or publicness. In the context of privatization of today's public space, Ali Madanipour states:

Throughout history, urban public spaces have always played a central role in the social life of cities. But they have lost their significance and are no longer the main nodes of all the social networks. Technological change, larger populations and specialization of activities have led to a fragmentation of

functions and a despatialization of public sphere. Treatment of space as a commodity and stratification of society have led to socio-spatial segregation and privatization of space.¹⁸

As a result, it became a complicated task to define what public space is as the main characteristics are transforming. The publicness of them can be argued, as the usage is limited, and the distinction between private and public sphere is disappearing. Public buildings are becoming private places, and the surrounding open public spaces of them are becoming residual spaces as a result of introversion of the public buildings.

2.2. Public Wall

If public life is considered as a performance and the city as a theatre, as Madanipour states, public spaces become the main elements of the stage. And, the constant work of human life becomes the management of surfaces, creating a civilized social space through a balance between concealment and exposure, between public and private spheres, which is only possible through careful construction and maintenance of boundaries.¹⁹ The boundaries shape the characteristics of public life. They decide to separate or connect; invite or reject; isolate or attach; to remind or alienate; be public or private. The boundaries of spaces are patterns which form the concrete structure of the city. They provide the private buildings their privacy. On the other side, whether they provide the public buildings their publicness can be argued. In this context, public wall, the structure acting as an in-between formation between a public building and the surrounding open public space, is at the core of the argument. The perceived boundaries characterize the space; it is the main element of the built form that contains the information on its accessibility, freedom of action, claim, change and ownership and disposition. Thus, it is the representer of the built form. In this context, Roger Scruton states of the boundaries of public buildings:

¹⁸ Madanipour, Ali. *Public and Private Spaces of the City*, Routledge, London, 2003, p.228.

¹⁹ Madanipour, 2003, p.234.

A space is made public by the nature of its boundary. The boundary which creates a public space is both permeable and open to our public uses. A truly public architecture is one which attempts to record and symbolize the condition of civil life, by reminding us at every juncture of our freedom to engage in it. It is an architecture which possesses the virtue of civility. We must attempt, therefore, to understand the kind of boundary which such an architecture erects.²⁰

As the public space is open to everyone, the boundaries of the spaces – here the boundary of the built form bounds both spaces – are expected to be permeable. Namely, as the permeability increases, the transition of the spaces strengthens. (Figure 2.1)

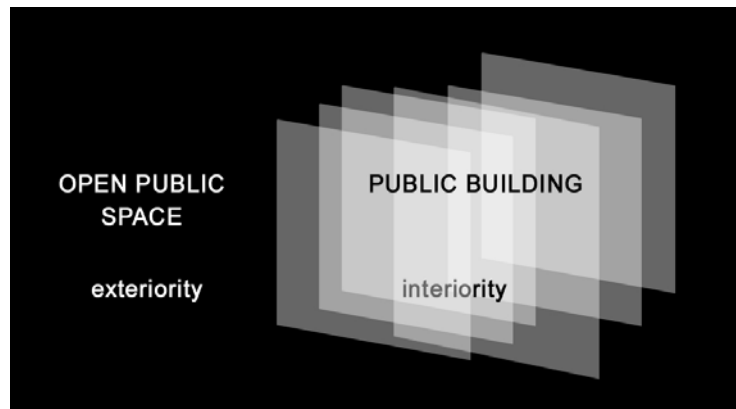


Figure 2.1: Abstraction of blurring of the transition, providing permeability.

The building skin, being the generator of communication of the spaces within and without, provides this communication at its most if both spaces are common to people, namely, the degree of its permeability is important as it provides the transition between the spaces.

While it is designed as the boundary of a public building, public wall forms the edge of the surrounding open public space; it is simultaneously a part of both spaces. It is designed for the building, and contains records of the building, what the architect desires to tell. Existentially being an element for protection, it becomes a

²⁰ Scruton, Roger. "Public Space and the Classical Vernacular," in *The Public Face of Architecture*, ed. Glazer, Nathan and Lilla, Mark The Free Press, New York, 1987, p. 15.

communicative element through articulation; it becomes a space of representation and exchange. As it is the area where those spaces meet and interact, those space characteristics will have a strong impact on the treatment of public wall; it is shaped by the two spaces and shaping them at the same time. It gains the responsibility to shape physical control, access and behavior. Accordingly, this many sided interaction points out that public wall is not considered as a two-dimensional formation, but it is a spatial formation to establish this network of relations. In this context, Madanipour states the mediating and defining role of boundaries as:

The way boundaries are established, articulated and related to the private or public spheres often has a major impact on the character of each side, defining many characteristics of urbanism in general. The boundaries are simultaneously means of separation and communication.²¹

As Amos Rapoport states, an important function of environment is thus to express culture, values, activities, and relative status — inhabited space in an image of oneself.²² The image of a built form has the role of representing the structure; it has the potential to inform the outsider of what behavior is expected, and what he will confront inside. This behavioral information exchange is a kind of communication, and it is a responsibility of the public wall. In this point of view, the boundary of a public building, without contradicting with its quality of being a ‘public’ wall, becomes informative for the outsider.

Besides being the boundary of a public built form facing an open public space, public wall is the edge of that open public space in which the building is placed. Thus, it can be defined as a transition space between two spaces whose dominating feature is their publicness. The public built form and the open public space both serve the public; publicness of its both sides makes it public. Physical control and potential for surveillance makes the public built form privatized to some degree. So, it appears as semi-public compared to the open public space. The public wall, between a public and relatively semi-public space, appears as a transition space between analogous

²¹ Madanipour, 2003, p.240.

²² Rapoport, 1977, p.322.

formations. As mentioned before, a public built form mostly does not appear as a homogenous entity; it has privatized and public parts in itself according to its functional programme. **(Fig 1.1)** Everything that appears in public can be seen by everybody, and has the widest possible publicness. Public wall, neighboring or adjacent to the open public space, appears as the most public part of the built form. It is the primary component welcoming the user. It is the representer of the built form. It is the inviter or rejecter. It decides whether one is welcome or not. It divides the public spaces or combines through providing a fluent movement between inside and outside. It decides the inside-outside distinction to be sharp or smooth.

The façades of a built form are treated different from each other and given very different physical expressions as they have differentiating tasks. As public wall is the space of interaction between the open public space and the public built form, public wall of a built form generally includes the front façade. Actually, we cannot make a sharp distinction like ‘this façade is public, the other is not.’ There exists a gradation of publicness, to illustrate, while the front façade provides physical access into the built form, back or side façades may provide visual access, which is also a form of communication.

Public wall is a medium of representation and communication not only for the outsider, but also for the insider. Acting as a transition space, it provides a perception of the outside, thus gives the opportunity to locate yourself and it relates the two public spaces, or on the contrary, it isolates the two spaces, making you feel isolated. It has the ability to act differently for the insider and the outsider. Thus, it is a mediating site which has a three-dimensional, spatial formation. While the public wall can be just a membrane covering the building, it can also be a spatial formation extending to interior or exterior space, a space of transition. (See chapter IV for the distinctions of public walls of contemporary examples.)

2.2.1. Existential Roles of Public Wall

Built forms have particular characteristics with respect to their design approaches. “Buildings, do not only gather the ‘multifarious between’ because of their built form, but also because they visualize their spatial properties of a situation. Any case of admittance thus represents a certain way of being between earth and sky.”²³ The way of being is an outcome of defining factors of its existence and survival.

In their article “the Street, the Block and the Building” in the book *New Urbanism* Elizabeth Moule and Stefanos Polyzoides state as “buildings are the smallest increment of growth in the city. Their proper configuration and placement relative to each other determines the character of each settlement.”²⁴ They also state that buildings, blocks and streets are interdependent. Each one contains to some degree the ingredients of all the others. Thus, the built form, with its interaction with the surroundings is the basic element of the urban formation, shaping its environment. The architectural design of the built form can not be dealt with as an isolated entity. As far as it is a constituent of the public life, the built form houses the imprints of it. Hence, through the design process, besides satisfying the functional needs, and maybe symbolic ones for its conceptual framework, the social milieus are also facts of consideration, which altogether form the total inputs. Consequently, when analyzing or even designing a built form, these inputs take their place in reason-result relationship as “reason.”

Norberg-Schulz, in his book *Intentions in Architecture*, also states “in general we may say that architecture controls the environment in order to make interaction and collaboration possible.” And he asserts this control has three main aspects to analyze the building task. To summarize, these aspects are:

²³ Norberg-Schulz, Christian. *Concept of Dwelling*, Rizzoli International Publications, New York, 1985, p. 25.

²⁴ Moule, Elizabeth and Polyzoides, Stefanos. “The Street, the Block and the Building” in *The New Urbanism*, ed. Peter Katz, McGraw-Hill, New York, 1994, p. xxiii.

1. *Physical milieu: physical control + functional frame.* Physical control is the most elementary aspect is to protect man. The climatic reasons, security...etc. Functional frame is the participation of the buildings in human actions.
2. *Social milieu:* The actions, however, are socially determined, and the physical objects participating (e.g. the buildings) therefore manifest social meanings.
3. *Symbol milieu:* Finally, architecture may represent cultural objects like religious, philosophical or cosmological conceptions. Together with the social aspect, this 'cultural symbolization' makes up symbol milieu.²⁵

In support of the statement, building task aspects of Norberg-Schulz is utilized for making a public wall analysis. These aspects are three parts that become the definition of the public wall when combined.

2.2.1.1. Physical milieu

Initially, the physical existence of the public wall is an outcome of the need for being a shelter and the enclosure for placing an act inside. Therefore, physical control and functional frame constitute the physical frame.

Physical control

The fundamental reason for the materialization of the public wall is the physical control. The climatic reasons as wind, rain, cold, hot; technical supports that the building serve; ownership and security reasons; functional adjacency and requirements for sound insulation, etc. result in solidification of the wall. The degree of solidification is a matter of functional, social and symbolic milieus.

Defining the boundary line on plan is the initial step that implies physical control. The other aspects of public wall task articulate the line to become an entity. Namely, in the context of public sphere, the public wall gains character in the following milieus.

²⁵ Norberg-Schulz, Christian. *Intentions in Architecture*, MIT Press, Cambridge, Massachusetts, 1965, p. 111.

Functional frame

“As a matter of course, a building is determined by the actions which take place within its walls.”²⁶ As in the discussions of form-function relationship throughout centuries, form can not be isolated from function. Thus, one important determinant of public wall is the function of the public built form. To reverse the sentence, the public wall has the role of revealing the built form’s function.

The functional theme can never be studied in isolation. Its functions will always be related to the functional aspects of the surroundings. From the smallest utensils to the most encompassing geographical environment, there exists a functional continuity.²⁷

This statement of Norberg-Schulz is related with a significant argument in this study: if the environment is a public space, and the built form is a public one, than there is a strong continuity of function, that is to serve to the public. Being a closed entity, it is difficult to provide the continuity of function. Therefore it is the public wall’s task to approach it. As long as the built forms are components of a larger whole, they are necessarily connected with the environment. Therefore, functional continuity is a significant issue for this study.

In the case of the continuity – here functional continuity -, the public wall acts as a transition space between the public spaces of interior and exterior, that are opposing in linguistic sense, but merging in verbal sense.

The boundary – here more specified as *public wall* - creates a transition space between outside and inside. So its character defined by its architecture possessing enclosure or openness, continuity or discontinuity, solid or void, transparent or opaque, etc. defines the dis/continuity of interior and exterior. Discontinuity creates a fragmented formation of interior space-public wall-exterior space, and continuity creates the exterior space to penetrate into the interior and vice versa. These produce

²⁶ Norberg-Schulz, 1965, p. 114.

²⁷ Norberg-Schulz, 1965, p. 116.

distinct spatial relations, which will be explored through some public buildings in the following sections.

Another point about the functional representation of the built form is the type of function it possesses.

The need for an ‘architectural characterization’ of the different institutions is urgent, although we may no longer be content with such ‘signs’ as colonnades and towers. Instead we recognize attempts at representing institutions by means of showing their functional structure.²⁸

To represent its character, the public built form reveals for what it stands, through its design of the public wall. However, to represent the function of a built form is a matter of design approaches, depending on the architect’s preferences. ‘Architectural characterization’ may appear as the building skin act as a place of symbolization. It either possesses functional characterization or other symbolic attitudes. In whatever choice of design, public wall defines the character and the standpoint of the public built form.

Parallel to the statement of functional continuity, Rudolf Arnheim states visual continuity that also comprises functional aspects:

...in perceptual experience, the spaces surrounding buildings and similar structures cannot be considered empty. Instead these spaces are pervaded by visual forces generated by the architectural structures and determined in their particular properties by the size and the shape of their generators. Visual forces are not isolated vectors, but must be understood as components of perceptual fields that surround buildings.²⁹

Arnheim’s statement is significant in terms of the relation between a built form and its surroundings. As built forms form the edges of open public spaces, they define open public spaces’ characteristics in a large scale. Being an edge is not just a limitation, but a characterization. Visual interaction of the open public space and the

²⁸ Norberg-Schulz, 1965, p. 119.

²⁹ Arnheim, Rudolf. *Dynamics of Architectural Form*, University of California Press, Berkeley, 1977, p. 28.

neighboring buildings, characterize the open public space in terms of its edges being blind/permeable, high/low, etc. Visual continuity may also appear as visual discontinuity between the interior and exterior spaces, that is also a kind of relation. Accordingly, public wall, as being the edge of open public space, is the formation creating visual forces through. And the quality of the relationship is principally a matter of the public wall. Through the articulation of the public wall, the building gains its identity, and partially the open public space does. And, the degree of articulation defines the degree of relationship of the public built form with its surroundings. For the outsider, public wall participates in the perception of the whole environment, defining the public built form and its relation to the environment, thus, contributing to the 'perceptual fields,' as Arnheim states.

Public wall establishes the visual perception of the built form. Functional frame is commissioned in gaining identity and characterization of the built form in the on a significant scale. To support the public interrelation, the public wall gains its function of communication through its materials that reveal meaning, and organization. To illustrate, phenomenal transparency in the organization of the façade, which will be studied in following sections, has the ability to inform the user outside through reading the façade.

2.2.1.2. Social milieu

A public built form can communicate if it embodies common values of people, like everybody talking the same language. This is essential for creating a sense of belonging. Nevertheless when we think of a public built form with its function, and if the built form is shaped with its function, the built form appears to be socially equipped. This is because the function is shaped in accordance with the social milieu. In accordance with this concern, Norberg-Schulz states:

Artifacts and buildings participate in social situations. When defining the building task, we have to take this into consideration and render an account of the social factors which should enter the architectural concretization...The social purpose of a building may thus be the expression of a status, a role, a group,

a collectivity, or an institution; and a collection of buildings may represent the social system as a whole. It is evident that we here transcend the mere physical functions.³⁰

Therefore, while a public building is being planned according to functional frame, it also puts on the social circumstances it is associated in accordance with its functional approaches. In the design of a built form, the tendency to behave as a part of the city structure, and consideration of the inhabitants' desires makes social frame to be considered as a cultural artifact. Cultural considerations mean certain concerns to be 'common' for the inhabitants of a city.

The public places that we build help express the nature of that implicit social pact we make with each other. That civic pact should include a respect for the places in which we live, a commitment to continue building a city to which we can all belong, and a determination to infuse public architecture with a sense of human dignity.³¹

Consequently, with the consideration of inhabitant desires, the architectural form of the city will talk the same language with its citizens, and the public built form would be a part of everyday life. Social considerations are a kind of functional approach that constructs the built form-user relationship. And it provides a further articulation of the concrete form of the built form.

If the public built forms do not accommodate traces of our social formation, then there will appear an alienation of it, if the citizens feel as strangers to the built form, it will not work properly. Considering the public built forms for leisure activities, there are two kinds of user: one aiming to go there for participating a certain activity; and the other is the passer-by, if the public built form invites, he enters in. In the case of an alienated public structure, the first kind of user goes there if there is not a better alternative to go, the latter kind of user just passes by if the built form does not have a dialogue with him. This is the reason why some public environments work and others don't.

³⁰ Norberg-Schulz, Christian. *Intentions in Architecture*, MIT Press, Cambridge, Massachusetts, 1965, p. 118.

³¹ Lyndon, Donlyn. "Public Buildings: Symbols Qualified by Experience," in *The Public Face of Architecture*, ed. Glazer, Nathan and Lilla, Mark The Free Press, New York, 1987, p. 176.

The expressions of the social concerns of a building are through consideration of the generalized experiences of inhabitants. To illustrate, these can be a material type, or a certain spatial organization, which symbolize familiarity. Social reflections in a building design have the ability to familiarize the built form to the social system of the city. Far from being an isolated structure, it becomes a member of the community. And the concretization of the social milieu is possible through the use of symbolic milieu.

2.2.1.3. Symbolic milieu

Form is the physical representation of a built structure. The physical qualities of form are results of functional and social attributes. Namely, the meaning to be expressed is translated into physical expression. Public wall of a built form has the responsibility of revealing defined expressions as it is the foremost presenter of the building. It informs the user about the building through symbolic attributes. For the building to express itself, the correspondence of visual expression and functional characteristics is significant. Not for just the function, but the public wall becomes the primary tool for the visual expression, accommodating physical, social and symbolic milieus.

In a well-designed building there is a structural correspondence between visual properties and functional characteristics. (...) The image of the building should lead, not mislead, in its overall arrangement as well as in detail. This principle of correspondence between function and appearance has a purely practical aspect, to which architects have given much thought and it also relates to visual expression.³²

The expression of the function on the public wall is in a language of perceptual expression. This language is common to that community, and, contains its traces in symbolic vocabulary. The symbolism mentioned takes place in a built form when the design has a conventional meaning.

³² Arnheim, Rudolf. *Dynamics of Architectural Form*, University of California Press, Berkeley, 1977, p. 205.

Norberg-Schulz gives an example of the symbolism and explains the organization of conventional signs:

We should, however, point to the fact that the conventional signs employed are usually abstracted from an original state of structural similarity between a form and a building task. The dome originally portrayed heaven, and only later became a conventional sign with a more general sacred character, assigning a certain dignity to the architectural solution. A form which is exclusively based on conventional signs, therefore, consists in an addition of separate meanings, without considering their interrelationships. We may still use the word form because of the topological organization of the signs. We have seen, however, that the building tasks usually possess an order which transcends the topological relations, and therefore requests a certain coordination of the formal elements.³³

As the signs –for our case– of the public wall come together in a meaningful manner, the message to the user is formed. Symbolism is a major element in the articulation of meaning in architecture, especially in the design of public buildings. Public built forms need to express themselves more than any kind of buildings to inform the whole society. Symbolic milieu is widely made use of, to reveal why, what for and how it stands. If these quests are satisfied, then the public wall fits its tasks.

The correspondence between form and the milieus of functional, social and symbolic is provided through the signs employed in the material organization. These signs inform us, and provide the communication of the user and the public built form. Thus, through the design of the public wall, the surroundings and the behavior of user is directed. Norberg-Schulz states about the signifier and signified relation as:

In architecture, it is to assert that the dimensions of building task, form and technics are interrelated, and that the formal and the technical realization manifests a task, a ‘content’. The aim of the semantical investigation is to explain these interrelations, and also to present certain conclusions about the capacity of formal and technical systems, that is, their ability to solve tasks. In general, this implies that we should answer the question whether particular forms fit particular tasks.³⁴

³³ Norberg-Schulz, Christian. *Intentions in Architecture*, MIT Press, Cambridge, Massachusetts, 1965, p. 169.

³⁴ Norberg-Schulz, 1965, p. 167.

It is also seen here that, those milieus are not separated; on the contrary they are interrelated milieus that form the public wall.

2.2.2. Communicative Role of the Public Wall: Public Wall As a Transition Space

As stated in the previous sections, appearance is an important tool for communication. As it is the foremost visible pattern of a public building, public wall is the structure from which we read and speculate about the building. It creates a visual language providing references of the inner organization, function or characteristics that guides the behaviors of the users of the building. As Rapoport states,

Spatial organization is the designer's basic tool but it relates to cues, messages, rules and behavior; spatial organization can be seen as a form of coding and defense against unwanted interaction. Urban form can be understood as a way of eliminating undesired behavior and events (or those regarded as irrelevant) and hence as a way of controlling events and communication. This is achieved primarily through the organization of elements.³⁵

Thus the spatial organization of the public wall informs people about the building. Moreover, as it is the welcoming component of the building, reasonably it gives people the first impressions of the building task introducing the building through its symbolic representations. Through its existential design elements, it constructs a definition of special use, required behavior, intention, etc, which means that the public wall builds a dialogue between the public and the public building. As public sphere is a vehicle of common action, a public building is a place of gathering people. In this sense, the ability to gather and disperse the participants at its most is a task of public wall, which is related with the permeability of it. Its degree of permeability is also significant in terms of inviting the passer-by. Except the user who arrives the building with an aim planned before, with a target in mind, the passers-by are potential users through being invited to the public building. Public

³⁵ Rapoport, Amos. *Human Aspects of Urban Form*, Pergamon Press, New York, 1977, p.339.

wall arrests the viewer as he passes by and invites into the inner space of the structure, or not. As a result, the public wall, besides offering a boundary for a shelter, is an element of interaction and communication with the users of the building.

As stated before, a public building contains a variety of spaces whose degree of publicness or privacy differs as an outcome of the building programme. Generally, its private components are hidden through the solidification of its façade, placement of them on backsides or any other design methods that protects their privacy. If a public building fits its task of *publicness*, these considerations of privacy do not concern public wall, as it is an active formation. It existentially includes movement from a public space to another, as it contains the entry to the building. So, public wall can be considered as the most public part of the building which is in communication with the public at its most. These communicative approaches of the public wall – mostly questioning its permeability- are studied through basic concepts in this section.

2.2.2.1. Exteriority ‘vs.’ interiority

Perception of the public wall varies in relation to the standpoint of the user. To illustrate, the public wall changes its status according to the space characteristics of interiority and exteriority. How the building communicates changes from exterior to interior and from interior to exterior. In both cases, the boundary, the outer skin of the building structure plays a role of both merging and separating, defining the boundaries of spaces. Its meaning changes for the outsider and insider; thus, defining a transition space between interior and exterior.

Robert Venturi, in his book *Complexity and Contradiction in Architecture*, makes a correspondence between the architectural form and the living being form quoting from Edmund Sinnot:

“The specific form of a plant or animal is determined not only by the genes in the organism and the cytoplasmic activities that these direct but by the interaction between genetic constitution and environment. A given gene does not control a specific trait, but a specific reaction to a specific environment.”³⁶

By analogy, as a public building has the responsibility to be in a continuous relation with its exterior for satisfying to be ‘open to all,’ the built form cannot be thought as an independent entity. The environmental conditions such as the social milieu and the neighboring formations have an impact on the public built form. In public wall design, to have an interaction with the exterior, the exterior formations are one of the design considerations. While the environment influences the public wall formation, public wall influences the environment in turn. To illustrate, even it is a blind wall appearing as an isolated structure, it makes the outsider to pass by without hesitating to stop. Hence, the public wall, while characterizing the built form, also characterizes the open outdoor space. Hence, it has a significant role of configuring the spaces beyond both sides, providing a transition space.

2.2.2.2. Horizontal experience: here or there

The “here and now” in which this distinct body is placed is what is first taken as granted, and subsequently a “there” appears. Through a perception of that distance, or rather the living of that distance, the surrounding space becomes manifest as a thing endowed with various meanings and values.³⁷

The notions of *here* or *there* occurs when we experience a boundary – psychologically or physically - between spaces. Reasonably, the degree of distinction is related with both the physical limitations of space and the degree of privatization. Consequently, these spatial relations influence the formation boundaries of built forms.

³⁶ Venturi, Robert, *Complexity and Contradiction in Architecture*, Museum of Modern Art, New York, 1966, p. 9.

³⁷ Frampton, Kenneth. *Studies in Tectonic Culture*, MIT Press, Cambridge, Massachusetts, 1995, p. 11.



Figure 2.2: An abstraction of here and there relation.

In the public context, with reference to public wall, there appears a ‘here’ and ‘there’, with relation to interiority and exteriority. Although interior and exterior are antonyms in terms of linguistics, in the architectural context for the case of public built form and open public space, their public characters make them synonymous. Namely, they are both ‘open to all,’ so there exists a functional similarity. Thus, there appears a conflict in the spatial relation of them in terms of synonymity and antonymity. A public wall is decisive for this relationship. In **Figure 2.2**, the degree of distinction of *here* and *there* notions in relation to the flow between two spaces along with the public wall is abstracted. The first illustration at the top of the figure shows a clear distinction of *here* and *there*, which means the public wall strongly separates both spaces. The last illustration at the bottom shows the connection of them. Hence, public wall can create an uninterrupted flow between them, as both the spaces are public. On the other hand, a built form tries to be an entity in itself, so public wall can draw a sharp distinction. By definition, boundaries impose limits on architectural space. On this concern, Robert Venturi states the difference of exterior and interior, thinking that their contradiction is essential:

Designing from the outside in, as well as the inside out, creates necessary tensions, which help make architecture. Since the inside is different from the outside, the wall—the point of change—becomes an architectural event. Architecture occurs at the meeting of interior and exterior forces of use and space. These interior and environmental forces are both general and particular, generic and circumstantial. Architecture as the wall between the inside and the outside becomes the spatial record of this resolution and its drama.³⁸

While Venturi supports the distinction between interior and exterior spaces, Gaston Bachelard in his book *The Poetics of Space*, argues getting rid of the distinction. Inside-outside distinction is a result of a reinforced geometricism, he argues, and the limits of those spaces appear as barriers in this kind of thought. And continues as: “we must be free as regards all definitive intuitions-and geometricism records definitive intuitions-if we are to follow the daring of poets (...) who invite us to the finesses of experience of intimacy, to ‘escapades’ of imagination.”³⁹

So, how will the accurate transition be established?

In this context, Georg Simmel might help us: in his article “Bridge and Door” he states that, the bridge, while acting as a symbol of uninterrupted connection, also dominates the separateness of the two apart entities.⁴⁰ Therefore, while enveloping the public built form, the public wall has the ability to provide a continuous interaction of interior and the exterior public space analogous to Simmel’s illustration. Implied continuation of form from inside to outside provides the strongest connections between two spaces. As these connections multiply, the spaces become intimately related. Moreover, along with the implication of the continuity, the separateness of the spaces can also be emphasized - as in the bridge example of Simmel. Simmel also mentions of boundaries as: “in the immediate as well as the symbolic sense, in the physical as well as the intellectual sense, we are at any moment those who separate the connected or connect the separate.”⁴¹ Consequently,

³⁸ Venturi, 1966, p. 86.

³⁹ Bachelard, Gaston. *The Poetics of Space*, Orion Press, New York, 1964, p. 215.

⁴⁰ Simmel, Georg. “Bridge and Door,” in *Rethinking Architecture*, ed. Neil Leach, Routledge, London, 1997, pp. 66-67.

the public wall, while keeping necessary tensions between interior and exterior, can be free of limitations at the same time, as in the bridge example. As a result there appear three figures to be evaluated in the design process: the interior public space, the exterior public space and the public wall as a transition space. While public wall belongs to the both spaces, it is also a formation by itself. Along with the domination of the space characteristics, instead of being left as an ambiguous formation; public wall becomes a transitory space required to be well defined – as the bridge itself. Robert Venturi, in his book *Complexity and Contradiction in Architecture*, quotes from Aldo van Eyck as:

Architecture should be conceived of as a configuration of intermediary places clearly defined. This *does not imply* continual transition or endless postponement with respect to place and occasion. On the contrary, it implies a break away from the contemporary concept of spatial continuity and the tendency to erase every articulation between spaces, i.e., between outside and inside, between one space and another. Instead the transition must be articulated by means of defined in-between places which induce simultaneous awareness of what is significant on either side. An in-between space in this sense provides the common ground where conflicting polarities can again become twin phenomena.⁴²

Hence, public wall, as a space of transition, is an intermediary formation, which considers the space characteristics on both sides. The public wall is the exterior boundary of a public built form, that is also the boundary of the public outdoor space surrounding it. So, it is the common ground between the public interior and exterior. In the public context, the public wall, being a transition area of two conflicting, at the same time corresponding spaces, is the generator of the shape of meeting. It is both the point of resemble and change.

As being the determining aspect of the spaces beyond, the public wall establishes the qualities of the spaces it defines. Firstly, visual continuity between the spaces mentioned can be questioned. In the context of visibility of public spaces, William Whyte states:

⁴¹ Simmel, 1997, p. 66.

⁴² Venturi, 1966, p. 82.

A good internal space should not be blocked off by bland walls. It should be visible from the street; the street and its surroundings should be highly visible from it; and between the two, physically and psychologically, the connections should be easy and inviting.⁴³

Whyte's proposals for an internal public space support public wall's permeability in terms of physical and visual continuity. This is basically to invite the potential users outside. Thus, an extroverted formation that is inviting the user to enter in becomes a proper configuration for a public built form as it is open to public. Namely, the provision of a flow between the public spaces inside and outside, which is not a static condition; on the contrary, a dynamic one, implies movement.

2.2.2.3. Space-time relation: movement

In **Figure 2.2**, the distinction of here and there were abstracted in terms of continuity/discontinuity relation. It also resembles movement that is through the public wall. In the public context, the interior-exterior relation is expected to be dynamic, which means there exists a continuous flow of people circulating. In this context, Richard Sennett states, "the public space is an area to move through, not to be in....Translated; this means that the public space has become a derivative of movement."⁴⁴

Hence, the static formations are generators of dynamic activities. Accordingly, public wall has the responsibility to dominate the dynamism. Yoshinobu Ashihara states for the Japanese perception of space as:

Space is not conceived of as something defined by the heavy material and existential presence of surrounding walls; it is the scene of fluid change and constant transformation, symbolic of the relationship between man and his natural environment.⁴⁵

⁴³ Whyte, William H. "The Social Life of Small Urban Spaces," in *The Public Face of Architecture*, ed. Glazer, Nathan and Lilla, Mark The Free Press, New York, 1987, p. 308.

⁴⁴ Sennett, Richard. "The Public Domain," in *The Public Face of Architecture*, ed. Glazer, Nathan and Lilla, Mark The Free Press, New York, 1987, p. 31.

⁴⁵ Ashihara, Yoshinobu. *The Aesthetic Townscape*, the MIT Press, Cambridge, Massachusetts, 1983, p. 10.

This Japanese approach permits the fluid relationship of interior and exterior space, through the use of light materials. The permeability of the public wall is another generator of movement. As contemporary architecture permits and uses large openings on façades or huge transparent panels, the interpenetration of inner and outer space and an interpenetration of different levels which can provide fluid relationships of spaces become easier.

As the concept of movement has been introduced into architecture, there began to appear dynamism of architectural built forms by the use of developing technology. Stable, heavy structures are no more inevitable results, today's technology permits even skeletal formations. So, the architect now has a wide range in selecting his design's formal structure. However, Donlyn Lyndon, in his article "Public Buildings: Symbols Qualified by Experience," through looking back over the history of civic buildings and public places states as:

The most successful are those that do not treat themselves as simple monuments to institutional purpose. The most memorable are conscious of their interaction with their physical environment and with the ways they will be used in everyday life. When they are conceived in this way, turning outward from the work done inside, they are able to embody civic purposes.⁴⁶

The development of flexibility in formal qualities is significant in terms of removing the restriction of movement; allowing an uninterrupted movement between the exterior and interior spaces. Reminding of Sennett's declaration of "the public space as an area to move through, not to be in," the interpenetration of spaces provides the necessary interaction between the two public spaces. A continuous interaction will allow the building to join to everyday life, and adapt to our changing environment. Thus, another significant issue is that the built form's potential to adapt the rapid developments of the environments, lifestyle and minds. In the case of public structures, this means the built form to fulfill its function properly, that is to serve the public. How does a static formation change? Only if its certain parts are alive,

⁴⁶ Lyndon, Donlyn. "Public Buildings: Symbols Qualified by Experience," in *The Public Face of Architecture*, ed. Glazer, Nathan and Lilla, Mark The Free Press, New York, 1987.

adapting to changes... So, if public use actively takes place as a considerable part of design, the public building will continue to work. This is possible with the design of public wall as permeable and thus, permitting the interaction. A continuous communication with the public through the public wall will make the built form live.

2.2.2.4. Delimitation of the public wall

The existence of the public wall starts with the existence of a public building as being its boundary. Norberg-Schulz again states that “The wall is the primary boundary of Urban Space because it records the contents of the meeting which here takes place.”⁴⁷ As the public wall is a representation of the building, it is an “existential interface between eye and idea” in Colin Rowe’s terms. Rowe states that the façade is “a metaphorical plane of intersection between the eyes of the observer and what one may dare to call the ‘soul’ of the building.”⁴⁸

It is significant for the outsider to understand how the interior is shaped, and for the insider how the exterior is shaped. Thus, we need a good perception of how the formation between inside and outside is established. Especially in the public sense, it becomes more significant for the outsider to perceive inside. And this is the public wall’s task to inform him.

Yoshinobu Ashihara states in her book *The Aesthetic Townscape*, “the key explanation for great diversity in basic perceptions of space lies in the nature of the boundary that distinguishes internal from external space and in treatment of territorial space.”⁴⁹ As she states, the character of the public wall, gained through the treatment of it, while representing itself, also defines the space characteristics of both

⁴⁷ Norberg-Schulz, Christian. *Concept of Dwelling*, Rizzoli International Publications, New York, 1985, p.59.

⁴⁸ Vidler, Anthony. *The Architectural Uncanny*, MIT Press, Cambridge, Massachusetts, 1992, p. 217.

⁴⁹ Ashihara, Yoshinobu. *The Aesthetic Townscape*, the MIT Press, Cambridge, Massachusetts, 1983, p. xi.

the built form and the surroundings. Also in the material sense, on the interior and exterior surfaces of the public wall, the construction material either duplicates (one for exterior finishing material, one for interior) or changes its character (e.g. glass being opaque from the exterior, transparent from the interior). Namely, the public wall can have differing characteristics on the interior and exterior sides, which indicates its spatiality.

The public built form, as Christian Norberg-Schulz defines, in his book *The Concept of Dwelling*, has the responsibility to be informative to the outside world, which indicates a communication between the public built form and its surroundings. Thus, the public built form cannot be considered as an autonomous entity. Instead, by revealing its function, its signs and “what it wants to be,” and by re-presenting the building character, the core point becomes the public wall and its roles, if we are dealing with the identity of the public built form. Besides being a physical boundary, the public wall has the meaning of social, functional and symbolic responsibilities that present the public built form, and the public spaces it forms: inside and outside the building.

In the design of a building, disregarding the surroundings can not be considered; in any case, the building influences its surrounding either in a successful or unsuccessful manner in accordance with its fitting its tasks or not. And those designs of buildings with shaping their surroundings form the urban context. Architecture is at the basis of urban design, and in this context, public buildings are the most significant as they invite the whole community; they do not serve to a single life, but to all kinds of life. In this regard, public wall has responsibilities not just of the built interior, but also of the surroundings. As it influences the public interior and exterior, there does not appear a clear division of the three. **(Figure 2.3)**

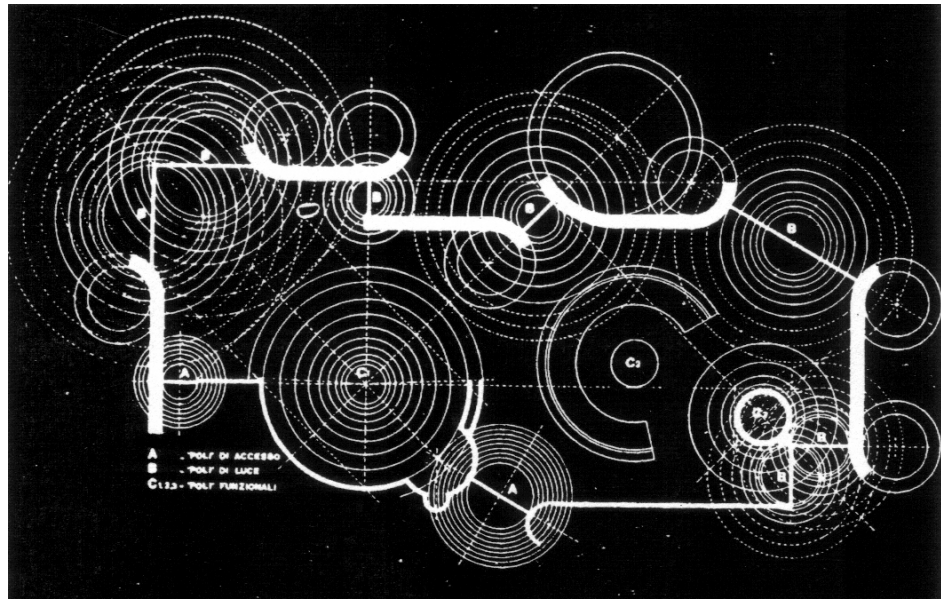


Figure 2.3: Walls which generate space or space which generate walls?
A drawing by Paolo Portoghesi and V. Gigliotti.

Meiss, Pierre von. *Elements of Architecture*, Van Nostrand Reinhold, London, 1990, p. 25.

As demonstrated in **Figure 2.3**, there is an interaction between the space and its boundary: the public wall. If the public wall disappears, the space cannot exist either. The space it defines and the surrounding formations are in relation. Publicness of all the formations –interior public space, exterior public space and the public wall- make the relation stronger, as there exists a circulation of people.

Individual buildings as forms are expressive of their interior functions, and also act as symbols for particular ideas and values.

Within the urban context, the expressive qualities of buildings extend beyond individual structures. Here one must consider not only the form of a building relative to other buildings, but also the role it plays in defining public spaces. Like built forms, the spatial forms of public spaces also convey essential information.⁵⁰

⁵⁰ Curran, Raymond J. *Architecture and the Urban Experience*, Van Nostrand Reinhold Company, New York, 1983, p. 51.

2.2.2.5. Public wall as the room-in-between:

Figure 2.2, illustrating the interpenetration of the interior public space and exterior open public space through the public wall, also gives clues on edges of the public wall. Namely, while the top illustration shows clear edges, the one at the bottom shows ambiguous edges that are merged with the spaces beyond. This latter formation provides a soft transition between the neighboring spaces. When two separate space characteristics overlap, a new character of space is formed, which becomes more than the sum of the separate ones. The new space, that is the public wall, acquires a life of its own. And it becomes a dynamic and living layered space, hosting the movement through it. Those layers provide plurality of experiences. So, in terms of housing these layers, the transition space gets importance. As it gets thickened properly mainly to the exterior public space, its merging with the space becomes powerful, joining into the everyday life. Consequently, within the transition, we feel inside, as well as outside, joining as well as passing-by, sheltered, as well as exposed. So, at the point of overlapping spaces, experiences become simultaneous. The overlapping spaces can be read through the possession of a certain hierarchical order. Through the hierarchy of the layers, they perform a meaningful entity; each layer leads to the other. Then, the room-in-between constitutes a transparency of organization. Public wall as a room-in-between also has the ability to serve both spaces beyond; being an enriching transition space without appearing as a new space.

2.2.2.6. Vertical experience: earth and sky

A public wall communicates as a whole entity in physical, social and symbolic milieus. As I quoted from Norberg-Schulz in the previous chapter, ‘the meaning of a built form consists in its standing, rising and opening, that is in its being between earth and sky,’ the public wall, in its totality, shapes our experiencing of the public built form.

The vertical analysis of the public wall will be through its earth and sky relationships as:

1. Conventional Location Definitions of Base - Middle - Top
2. The General Silhouette

Conventional Location Definitions of Base - Middle – Top

Varying physical qualities of the public wall lead to different experiences. The treatment of the façade shapes our perception of the whole building. In terms of vertical examination of the public wall, there occurs horizontal layering of *base* – the ground floor, *middle* – the upper floors, and *top* of it that meets the sky, forming the skyline.

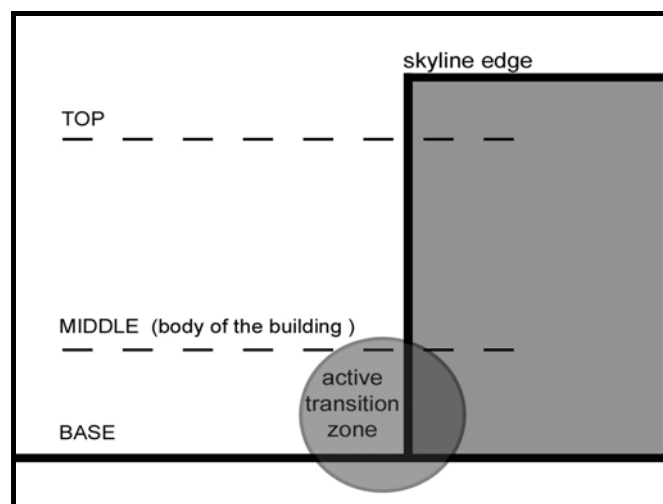


Figure 2.4. An abstraction of Conventional Location Definitions of Base - Middle - Top

Curran, Raymond J. *Architecture and the Urban Experience*, Van Nostrand Reinhold Company, New York, 1983, p. 133.

Base of the public wall accommodates the interaction of the built form with its environment at most. The base of the public wall typically includes building entries, windows and design elements to attract the pedestrian interest. It establishes a dialogue with him, and explains the building task. The live component of the

interaction, the public, provides movement through the public wall on the ground floor. (**Figure 2.4**)

As illustrated in **Figure 2.4**, the illustration of transition zone and conventional location definitions of the building, the active transition space is limited. (Here in the thesis, the term ‘active’ is used to illustrate the movement taking part. ‘Passive’ can be used for the part, through which just visual dialogue appears.) In the public context, this zone is very significant in terms of providing interaction. Consequently, the question whether this limitation is possible arises. This limitation is largely related with the scale of the base – the welcoming part of the public wall – and the formation of the surroundings. To illustrate, in some contemporary approaches of built forms, the entrance part of the public wall is designed higher than the typical storey height, with special architectural emphasis. As the active zone of transition is at the ground level, through heightening, the transition zone is tried to be extended. Therefore, the successful treatment of the base is a defining factor for the transition of exterior and interior. Considering the base height and accordingly the building height, the proportions is the element to define the active transitional space.

Formation of the surroundings is another effective factor for the limits of the active transition space. It is meant that, besides designing the building orienting to its surroundings, the surroundings can also be designed in accordance with the building, extending the active transition zone to the upper levels.

In tall public built structures, the communication with the surroundings becomes more difficult to achieve. This is because of the disharmony of its enormous scale with human scale. Again, façade articulation is important in the design to reduce the disharmony of the scale. The illustration in **Figure 2.5** shows how the façade treatments of a built form convert it to the human scale. In the third illustration, while the base is extended, accordingly the middle is curtailed.

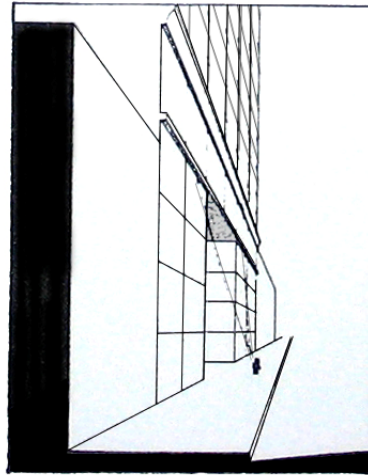
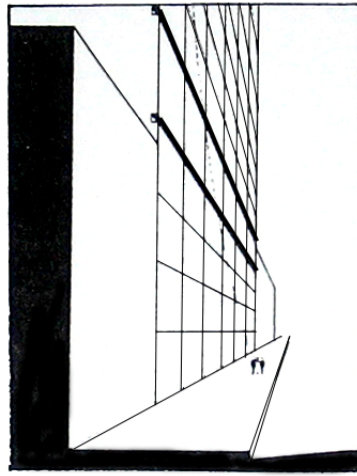
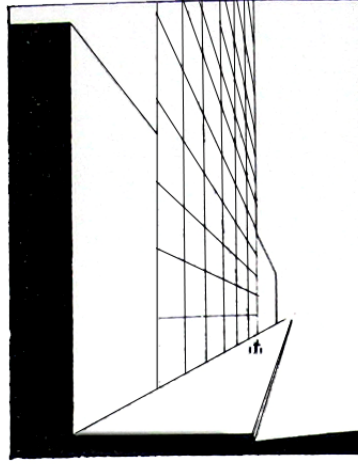


Figure 2.5: The treatment of the façade plane for lowering scale by Richard Hedman and Andrew Jaszewsky, 1984.

Özyörük, İnci. *The Interface of Architectural Built Form and Urban Outdoor Space*, Ankara, 1995, p. 71.

Generally, as the ‘middle’ part of the public wall can not be an active transition space, it can act passively. However it has the ability to gain dynamism through visual communication, which a public built form is expected to have: for the outsider to inform about its task; and for the insider to inform where on earth he is or what’s going on outside through letting him to see the surroundings. Namely, without isolation. Today, with the use of digital screens, middle part is activated in a sense. The changing images on screens or differing light effects transform the building façade into different forms of expressions. In this respect, the wall is de-materialized, losing its spatiality.

The top of a public wall is where it meets the sky, where the built form ends. Its design in creating a meaningful edge is significant as it also contributes the city fabric.

The General Silhouette

In the introduction chapter, building characteristics of the traditional and contemporary architecture are briefly explained in relation to **Figure 1.2** and **Figure 1.3**. The traditional buildings were contributing to the urban fabric, speaking the same language. Now, architectural products are varied in terms of their styles and coming together. Therefore, the public wall has the responsibility of being in company with the neighboring built forms for skyline formation, contributing to the city silhouette. In the integration into its surrounding context, the total design of public wall is influential. Also, the intersection of public wall and sky is also important. If the public wall expands on top, it also provides a transition space between the sky and the building.

2.2.2.7. The interaction of interior and exterior public space in contemporary architecture

Vincent Scully, in his book *Frank Lloyd Wright*, states that Wright has the goal of “the destruction of the box,” for creating a sense of open space while

simultaneously creating a sense of shelter and appropriateness to the landscape and human scale.⁵¹ In the architecture of twentieth century, contrary to the traditional, the definition of architecture has been breaking links with its conventional meaning of 'enclosed space.' The chronologic display of traditional architecture - that is a compilation of monumental symbolic structures which are in harmony with each other speaking the same language - continued with open plan principles that are against the strict division of the architectural built form and the surroundings through the structure's boundary. At present, under the influence of technological developments, contemporary architecture experience more developed open forms. Architecture's closed spatial unit is modified through openness and transparency. And the buildings are placed freely in space, independent from each other.

In fact, since the originary enclosures, the concept of boundary has undergone numerous changes as regards both the façade and the neighbourhood it fronts. From the palisade to the screen, by way of stone ramparts, the boundary-surface has recorded innumerable perceptible and imperceptible transformations, of which the latest is probably that of the interface.⁵²

This reversion of boundaries and oppositions has been introduced into everyday life. To illustrate, while the banks had thick stone walls to express high security in traditional architecture; at present, their boundaries are almost totally glass. Providing the security is not through heavy barriers, but in surveillance through transparent surfaces, where the opacity of building materials is reduced, and by the help of cameras. Light and transparent materials replace the heavy stone and concrete materials on façades, so there is a change in the notion of limitation. Apparently, this scheme is a product of technology mostly to satisfy security and display necessities.

The new scientific definition of surface demonstrates the contamination at work: the 'boundary, or limiting surface' has turned into an osmotic membrane, like a blotting pad...What used to be the boundary of a material, its 'terminus', has become an entryway hidden in the most imperceptible entity. From here on, the appearance of surfaces and superficies conceals a secret transparency, a

⁵¹ Scully, Vincent. *Frank Lloyd Wright*, George Braziller Inc, New York, 1960.

⁵² Virilio, Paul. "The Overexposed City," in *Rethinking Architecture*, ed. Neil Leach, Routledge, London, 1997, p. 382.

thickness without thickness, a volume without volume, an imperceptible quantity.⁵³

As figured out, there appears an obvious transformation of the boundaries of built forms. While the boundary was massive, now it is transformed into an almost de-materialized structure. On the other hand, the boundaries of traditional built forms also form the edges of the open public space that is the street or public square. Today, the massive, uniform interface has given its place to light structures that act on their own. In this case, the edges of the open public space fail, as the uniformity of the structures is lacking.

“If, despite the wishes of postmodern architects, the city from here on is deprived of gateway entries, it is because the urban wall has long been breached by an infinitude of openings and ruptured enclosures.”⁵⁴ As Virilio states, the building and street interface that forms the urban wall disappears.

In contrast with the boundaries becoming transparent or de-materialized, contemporary architecture witnesses the privatization of public spaces. Transparent boundaries have the ability to act as opaque, and reject the outsider.

2.2.2.8. Privatization / Ownership effects on communication

Public buildings can also be classified in terms of ownership. The building can be privately owned as shopping malls; it may be a government building; or it may be publicly funded places like libraries, mosques, etc. Ownership is significant in terms of the privatization of the public space it produces. The privatized public space tends to be introverted. In accordance with this formation, Donlyn Lyndon states: “if they are obscure, devoid of information, ‘dead on the street,’ they will structure an environment that is lifeless, one that is not only tiresome, but that conveys a disregard

⁵³ Virilio, 1997, p. 385.

⁵⁴ Virilio, 1997, p. 384.

for the lively exchange between people that lies at the base of democratic life.”⁵⁵ Being in contradiction with the ‘public’ concept, builders have been turning to interior, creating an isolated life in a closed box. As the main idea of those places became consumption, their design principles are no more in support of open architecture, but they present isolated places that are composed of shiny, attractive places devoted to consumption, and physical control becomes the dominant case.

The bureaucratic mind, dedicated as it is to control, and prediction, is not comfortable with the untidy. Places which come under the predominant influence of government and financial institutions tend to become emotionally arid, with little opportunity to find or express personal insight or initiative. Such places instead become the domains of material expression, expensive, hard places where investment is geared more to maintenance than to the proffering of enjoyment or even enlightenment for the many.⁵⁶

As Lyndon states, these kind of public places lose their quality of being ‘open to all’ through the articulation of their public wall. The public wall becomes a blind showy structure without having dialogue with the outsider, and the life turns to be ‘dead on the street’ as they prevent everyone to enter, and choose its participants. This is a kind of communication, where the look of the built form has a filtering effect. To illustrate, shopping malls have generally become highly privatized public buildings in the last two decades. Their public wall configuration represents which income group they address.

⁵⁵ Lyndon, 1987, p. 158.

⁵⁶ Lyndon, 1987, p. 159.

CHAPTER III

TWO MILIEUS OF COMMUNICATION WITHIN THE PUBLIC WALL: TRANSPARENCY AND DE-MATERIALIZATION

In the preceding sections, the public wall constructing a transition space between the public building interior and the open public space has been defined. In consequence with the declared theoretical approaches of communication, to display how public wall behaves in practical sense, two instruments which are potential bearers of communication are studied in this section. Beginning with the theoretical approaches, the thesis is aimed to continue in practical proposals of spatial organization: transparency and de-materialization. In order to clarify the contemporary formation of public wall and to evaluate its dominating aspects in architecture-public dialogue, an analytical examination of the milieus of transparency and de-materialization is fulfilled. The fundamental reason for the selection of the milieus is that, they are two of the foremost current approaches of design of the public wall in contemporary architecture which have stimulated architecture-public dialogue. In the architectural context, transparency and de-materialization are optical instruments of design. The notions are both related with material organization; transparency is based on the simultaneous perception of different formations, and de-materialization is based on materiality/immateriality of substance. They are both related with the dissolution of the public wall, but in different ways. Consequently, in this chapter, firstly the motives of consideration of these milieus are defined, and then their definitions in architectural context are clarified. The examination of these milieus is fundamentally based on their qualities of communication with the environment.

The investigation of these potential milieus of communication will also be more clarified and solidified through the inquiry into some examples of

contemporary public buildings in the following section. In light of the evaluation of the public wall through the use of the communicative qualities of these milieus, how public built forms have dialogue with the public through the interface, the public wall, is intended to be brought into discussion.

Motives of consideration of the milieus

For the exploration of the theoretical approaches of public wall through practical solutions, the motives of consideration can originate from the basic theoretical definitions of public space. Carr et al. determine the essential components of public space as: access, freedom of action, claim, change and ownership and disposition.⁵⁷ Among these components, accessibility –in physical, visual or symbolic terms- is the main characteristic of a public building in its service to public. Thus, transparency and material condition of public wall are the characteristics that define the degree of accessibility. These also determine the degree of freedom of action, claims to the building and disposition of it.

As stated, as well as configurational qualities of the public wall in accordance with the building's task, to achieve dynamism and a timeless architecture, *time* component is the instrument in the design of the public wall. As Hannah Arendt states, “if the world is to contain a public space, it cannot be erected for one generation and planned for the living only; it must transcend the life-span of mortal men,”⁵⁸ for a public building not to remain ‘dead on the street,’ but, on the contrary, to be a living place for public use, the public building is expected to adapt the needs of the present and the future. This means that the public wall, instead of remaining a static formation, can allow the transformation of itself through time. In this case, permanence, which is related with *change* (a Carr et al. component of publicness), becomes another motive of considering transparency and de-materialization of the public wall in practical sense.

⁵⁷ See chapter II, p.13.

⁵⁸ Arendt, Hannah. “The Public Realm: The Common,” in *The Public Face of Architecture*, ed. Glazer, Nathan and Lilla, Mark The Free Press, New York, 1987, p. 9.

Transformation of the public wall in time is possible just through the dynamic components it has. One approach can be the convenient participation of the interior public space into the public wall or vice versa. Hence, the public wall adjusts itself in accordance with how the interior public space is shaped. In reference to the unity of the public wall and the interior space, Kenneth Frampton quotes from Cornelis Van de Ven's book *Space in Architecture*:

The idea of space established a new concept that gave priority to the spatio-plastic unity of interior and exterior space and to the nonhierarchical assimilation of all instrumental forms, irrespective of their scale or mode of address, into one continuous space-time experience.⁵⁹

Additionally, the dynamism of the public wall brought by its interpenetration with the interior organization provides the user to a fuller reading of the built form through its mobile structure as a result of changing relationships. In this context, as Kepes illustrates, "change implies motion. The plastic image must also be articulated, therefore, in the time dimension."⁶⁰

Transparency and de-materialization can be considered as instruments of design for their ability to provide a dynamic relationship, connecting the form to the content of the built structure through their descriptive qualities.

As illustrated before, another characteristic of public wall is its being an area of representation and exchange. These are closely related with the material conditions of the public wall. In this sense, transparency or de-materialization of the public wall gains importance. A porous public wall makes the interaction of interior public space and exterior public space possible. As the degree of transparency and de-materialization of public wall is related with porosity, they are closely connected to the dialogue of public and the public building. Therefore, notions of transparency

⁵⁹ Frampton, Kenneth. *Studies in Tectonic Culture*, MIT Press, Cambridge, Massachusetts, 1995, p. 2.

⁶⁰ Kepes, Gyorgy. *Language of Vision*, Paul Theobald, Chicago, 1944, p. 52.

and de-materialization are important for a critical understanding of communicative role of public wall.

3.1. Transparency

3.1.1. Definition

Transparency is an optical instrument for the simultaneous perception of different formations. The term transparency cannot be limited to the material qualities of glass; there is another form of transparency that is phenomenal. Namely, transparency can be a material quality – that of glass– which is called “literal transparency,” as Colin Rowe and Robert Slutzky calls, or an organizational quality which is “phenomenal transparency.”⁶¹

Literal transparency

As being a material quality, literal transparency permits us to see what is behind. It creates a dynamism which is experienced as an interaction between outside and inside. Use of transparency gets more important in public built forms, for representing itself. In contemporary architecture, it is a significant instrument of open designs. As the level of technology permits, huge glass panels on façades are commonly used today. In many cases of public built forms, the wall is dissolved, and large glass panels decide on the interior-exterior relationship. The use of transparent glass panels has the ability to provide visual continuity of interior and exterior public space or on the contrary it can act as a barrier that hides the building through its reflective quality. Thus, literal transparency of glass can be categorized in three different ways as James Garrett Pressick quotes from Peter Rice: “one-way

⁶¹ Rowe, Colin and Slutzky, Robert. *Transparency*, Birkhäuser Verlag, Boston, 1997.

transparency,” “two-way transparency” and “the expression of the transparent surface” of glass.⁶²

The first one is while one side has visual connection with the other; the other side is not permitted to have this advantage. This kind of transparency is preferred just for the penetration of light, or in private places. In two-way transparency, both sides are allowed for the visual connection.

To illustrate briefly, as Robert Slutzky and Colin Rowe demonstrates, while Le Corbusier is primarily occupied with the plane qualities of glass in Villa at Garches; Walter Gropius is occupied with its translucent attributes.⁶³ (**Figure 3.1, 3.2**)



Figure 3.1 (left): Villa Stein at Garches, Le Corbusier, 1927.



Figure 3.2 (right): Bauhaus, Walter Gropius, 1925.

Rowe, Colin and Slutzky, Robert. *Transparency*, Birkhäuser Verlag, Boston, 1997, pp. 34-35.

⁶² Pressick, James Garrett. *Transparency*, Virginia, 2000. <http://scholar.lib.vt.edu/theses/available/etd-07202000-01130008/unrestricted/Transparency.pdf>. Last accessed in June 2006.

⁶³ Rowe and Slutzky, 1997, p. 35.

The third way of use of glass that is the expression of the transparent surface of it, varies as the technology develops. Glass can act even as an opaque reflective plane at present.

As glass has differentiating attributes, the use of it gets difficult to control because of its reflective character. In relation, Kati Blom in her article “Transparency and Catatonia” refers to Anthony Vidler as: “he has noted that transparency achieved with reflective surfaces flattens buildings, and excludes any hint of location or place, message is given to move from the idea of individuality towards identification of the abstract notion of state.”⁶⁴ Therefore, in the use of glass, the environmental effect is an extra issue of consideration.

Phenomenal transparency

If one sees two or more figures partly overlapping one another, and each of them claims for itself the common overlapped part, then one is confronted with a contradiction of spatial dimensions. To resolve this contradiction, one must assume the presence of a new optical quality. The figures are endowed with transparency; that is they are able to interpenetrate without an optical destruction of each other. Transparency however implies more than an optical characteristic; it implies a broader spatial order. Transparency means a simultaneous perception of different spatial locations.⁶⁵

As Gyorgy Kepes argues, phenomenal transparency is an organizational quality, which is related with the law of interpenetration and simultaneity. Namely, at the intersection of two entities, a third entity occurs having its own characteristics. There exists a spatial continuity between those interrelated spaces, thus a system of relations between spatial entities occur. The perception of phenomenal transparency is through types of relations as interpenetration, hierarchy, continuity, etc. which help us to configure the whole. Thus, it is an optical illusion, in which, mind completes the hidden parts behind. Bernhard Hoesli, in Colin Rowe and Robert Slutzky’s book *Transparency* states that “transparency exists where a locus in space can be referred

⁶⁴ Blom, Kati. “Transparency and Catatonia,” in *Constructing Place*, ed. Sarah Menin, Routledge, 2003, p. 196.

⁶⁵ Kepes, Gyorgy. *Language of Vision*, Paul Theobald, Chicago, 1944, p. 77.

to two or several systems of relations – where the assignment remains undetermined and the belonging to one or the other remains a matter of choice.”⁶⁶

Adrian Forty, in his book *Words and Buildings* indicates that Kepes was the first to use the term ‘phenomenal’ in 1944. And continues, before that, in Sigfried Giedion’s book *Building in France* (1928) there was reference to transparency in terms suggestive of the ‘phenomenal’.⁶⁷ Then Robert Slutzky and Colin Rowe wrote articles on phenomenal transparency. The concept of phenomenal transparency appeared firstly with the movement of cubism, in paintings representing overlapped entities that form a whole altogether. **Figure 3.3** is a painting by Le Corbusier, stating the interpenetration of objects without any optical destruction of each other, thus indicating phenomenal transparency. Bernhard Hoesli analyzed the painting by layering it. (**Figure 3.4**)



Figure 3.3 (left): Le Corbusier painting. *Still Life*, 1920.

http://www.moma.org/collection/browse_results.php?criteria=O%3AAD%3AE%3A3426&page_number=2&template_id=1&sort_order=1 Last accessed in September 2006.

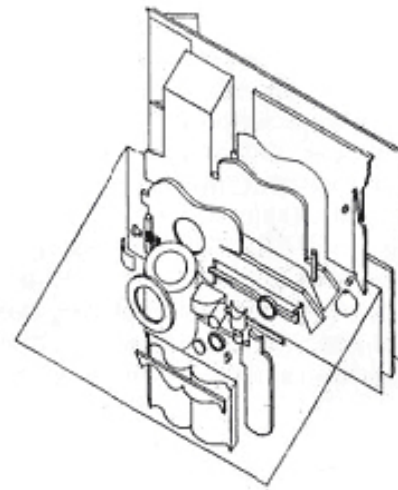


Figure 3.4 (right): Hoesli’s analysis of *Still Life* with Stacked Plates.

Rowe, Colin and Slutzky, Robert. *Transparency*, Birkhäuser Verlag, Boston, 1997, p. 60.

⁶⁶ Rowe and Slutzky, 1997, p. 85.

⁶⁷ Forty, Adrian. *Words and Buildings: A Vocabulary of Modern Architecture*, Thames & Hudson, New York, 2000, p. 287.

The cubists did not seek to reproduce the appearance of objects from one vantage point: they went round them, tried to lay hold of their internal constitution. They sought to extend the scale of feeling, just as contemporary science extends its descriptions to cover new levels of material phenomena.⁶⁸

As a result, there occurs a production of a total expression of the whole figure. Simultaneously, different kinds of readings are offered. This kind of reading of overlapping planes is something more than a physical transparency; not a planar, but a spatial quality it is. There appears continuity between the constituents, one leading to the other. Thus, this 'reading after reading' of a composition represents the dimension of *time* in design, and thus, movement.

3.1.2. Communicative Qualities of Transparency in the Public Sphere

Public wall is a limit and at the same time a point of contact. It makes distinctions but also enables the interaction of discrete items. The use of transparency on the public wall has a communicative quality, which differs according to material type, proportions and spatial organization. The use of literal transparency basically satisfies the dominating feature of publicness of a built form: accessibility, in terms of visibility. Glass panels have the ability to provide visual access into the building. One-way transparency, namely, generally the glass' acting as an opaque material on the exterior face, prevents the outsider to see inside. In contemporary architecture, the use of one-way transparent large glass panels on public walls lead to privatization of the built form, as those panels hide the building. The occupation of a level of transparency that encourages a visual fusion of interior and exterior spaces provides visual accessibility to the interior public space. Providing visual accessibility facilitates the built form to represent itself to the outsider.

In addition to literal, phenomenal transparency is also an instrument of design to provide communication of the interior and the exterior public space. Namely, while literal transparency provides visibility of the neighboring space, the visualized space

⁶⁸ Giedion, Sigfried. *Space, Time and Architecture*, Harvard University Press, Massachusetts, Cambridge, 1971, p. 436.

has the potential to be understood through its spatial organization. Then, literal transparency becomes a tool for the perception of a phenomenally transparent space.

Through its leading of ‘reading after reading’, and also providing dynamism, in successful compositions the built form reveals its task in a clear manner by phenomenal transparency. Namely, through reading the structure, the interconnected elements will lead the user’s attention to the other in continuity; guiding to decipher the formation of the building. In the public context, phenomenal transparency is an instrument to relate the interior and exterior public spaces. As the spatial continuity is constructed through phenomenal transparency, two public domains tend to provide unity, which inevitably produces a continuous movement. Therefore, organization of the public wall being phenomenally transparent, not just through façadist attributes but also making its thickness phenomenally transparent in terms of being the front layers of the interior organization, provides the decoding of the intentions of the architect. The observer gradually reads interrelated layers into the interior which help to understand the messages that the architect broadcasts. Each layer dissolves in the following layer. Thus there exists no discontinuity, or any definite stop. Namely, in such a successful configuration, the transition space dissolves in the interior. In this case, the built form gains dynamism and there appears a dialogue between the observer and the built form.

Since a transparent organization invites and encourages the fluctuation of multiple readings, and suggests individual interpretation, it activates and involves. The spectator remains not observer “on the outside”, he becomes part of the composition through his participation. He enters a dialogue. He has to decide and in “reading” a façade, choosing one of several possible readings of the composition he is, at the same time in his imagination, engaged in its creation.

If thus supremacy of the visual and its individual interpretation over the subject matter is assured, the *meaning* could be a *quality* that comes into being through accruing, through sedimentation, and not be “attached” to certain forms or motifs to which meaning is thought to be attributable by association or is believed to derive from precedent. Meaning can thus consist in the adhoc or repeated identification of the beholder with the object. Meaning then blossoms from personal involvement, it is created in the act of focusing on one of the possible readings of form relations that are latent, inherent or implied in the form-organization.⁶⁹

⁶⁹ Rowe and Slutzky, 1997, p. 99.

This confirms that phenomenal transparency is able to reveal the content of the built form through its organizational qualities. That is to say, it has the potential to bridge the relation of form-content through the association of elements of the whole design. As Rowe and Slutzky state:

Use and form of a building or urban context must be understood as but two *different aspects* of the same thing, and to design means that they have to become fused in a process of mutual adjustment, adaptation and reconciliation in which each is judiciously interpreted in terms of the other.⁷⁰

Hence, phenomenal transparency is a formal tool assisting to identify the content of a built form. This process is a kind of dialogue between the built form and the user. To illustrate the dialogue, as seen in Frank Lloyd Wright's Taliesin West (**Figure 3.5**), the layers interpenetrated into each other compel the viewer to examine the neighboring layer after you finish one. Because there is no stop, an apparent continuity forces you to follow up.

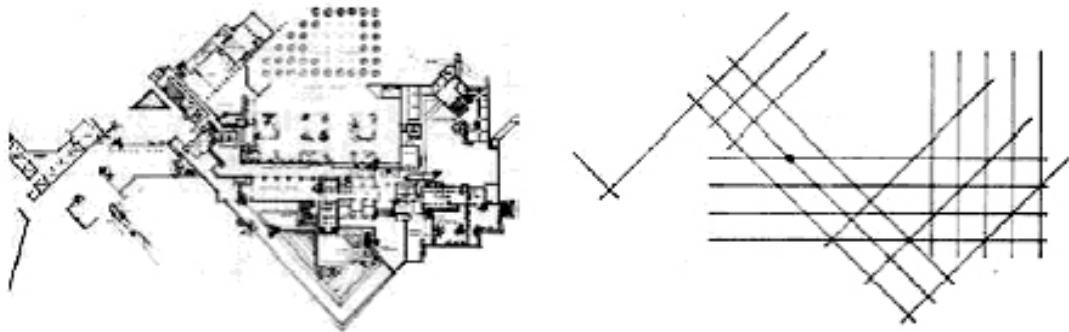


Figure 3.5 (left): Frank Lloyd Wright's Taliesin West.

Figure 3.6 (right): Hoesli's abstraction of the plan.

Rowe, Colin and Slutzky, Robert. *Transparency*, Birkhäuser Verlag, Boston, 1997, p. 65.

Hoesli's abstraction of the plan in terms of phenomenal transparency in **Figure 3.6** illustrates the interpenetration of layers. At the intersections of those layers there appear spatial transitions that create movement. Hoesli states that "transparency

⁷⁰ Rowe and Slutzky, 1997, p. 88.

arises wherever there are locations in space which can be assigned to two or more systems of reference – where the classification is undefined and the choice between one classification possibility or another remains open.”⁷¹ The spaces flowing into each other make the observer to follow-up; so the intentions of design are liberated. Phenomenal transparency, as being a spatial formation, can also be occupied in sections and façade organizations. As an illustration of façade organization, Bernhard Hoesli employs the sketches of façade of S. Lorenzo by Michelangelo. (**Figure 3.7**)

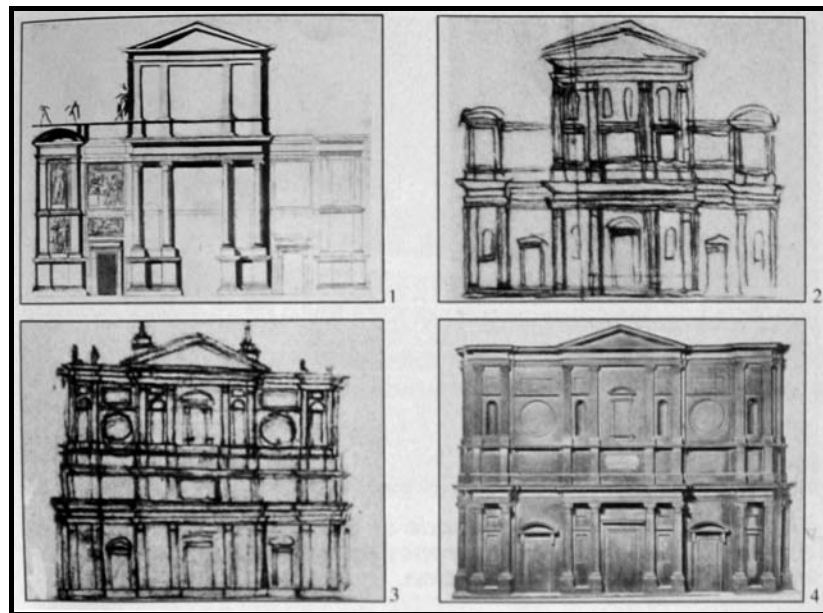


Figure 3.7: Michelangelo: Stages in the design of the façade of S. Lorenzo, Florence.

Rowe, Colin and Slutzky, Robert. *Transparency*, Birkhäuser Verlag, Boston, 1997, p. 75.

The first three sketches show the formation of the façade gradually. What he wanted to demonstrate on the façade is clear. And, in the forth one, the observer can read those demonstrations consecutively. In relation, Hoesli states:

In the last design, a situation has been reached whereby first the tectonically stratified organization of the vertical, then the horizontally laid rows of vertical elements lay equal claim to the observer’s attention with a continuous interaction, all taking place within the generally unified effect exerted by the façade.

⁷¹ Rowe and Slutzky, 1997, p. 85.

Each element in the façade organization is ambiguous, and can be seen in always new connections of form and meaning.⁷²

Those connections are established through Gestalt principles, which are similarity, proximity, continuity, and closure, and types of relations between elements of design as hierarchy and interpenetration. The observer tends to group elements through these qualities. Through the use of continuity relation, the eye is engaged by horizontal and vertical strips that form a grid. Elements are grouped and further figures are constructed through Gestalt principles. The co-existence of a variety of relationships is the result of transparency of organization.

Transparency as organization of form produces clarity as well as it allows for ambiguity and ambivalence. It assigns each part not only one definite position and distinct role in a whole but endows it with a potential for several assignments, each of which though distinct can be determined from time to time by deciding in which connection one chooses to see it. Transparency then is imposed order and freedom of choice at the same time.⁷³

In addition, transparency, in terms of referring to several references one after another, implies movement. As there appear a variety of locations, there is a dynamic continuity in following-up the references. In the case of the interior configuration's participation to the public wall formation provides dynamism and permanence as the public wall gets free of being just a static formation.

In the case of public wall, literal and phenomenal transparency definitions of Rowe and Slutzky can be enriched through the spatial character of public wall. A literally transparent building skin provides the interior and exterior to be seen from the space the observer is in. A phenomenally transparent public wall is a layered space which provides information. A further transparency can be achieved where the space beyond contributes the public wall formation. Namely, phenomenally and literally transparent transition space gains also a further depth through the space beyond. This can be considered as an articulation due to the conceptualization of the public wall.

⁷² Rowe and Slutzky, 1997, p. 75.

⁷³ Rowe and Slutzky, 1997, p. 97.

3.2. De-materialization

De-materialization is a well-known concept of contemporary architecture which means a partial or total disappearance of matter or a materialized form. It is a formation related with perception, in which materials lose their solidity. To illustrate, the partial dissolution of the public wall can create a spatial interpenetration of the public interior and exterior. The dissolution of it would not harm its wholeness as the eye would complete the de-materialized parts.



Figure 3.8: Dancers in night festival at Seagram building, New York.

Ashihara, Yoshinobu. *The Aesthetic Townscape*, the MIT Press, Cambridge, Massachusetts, 1983.

Glass is a crucial material in the case of de-materialization. When it gets dark at night, the glass façades de-materialize if the interior is illuminated. **(Figure 3.8)** Seagram Building has a strong effect in night and day reversal. The building expresses itself more in the night. The communicating part of the built form will be the ‘middle’ part, through which the transition zone stuck in the ‘base’ will be extended. Most contemporary architects use the de-materialization of glass at night.

If its reflective quality is minimized, daytime de-materialization of it also takes place as Gropius made use of. (**Figure 3.8**)

At the Bauhaus, Giedion tells us, the glass walls are “dematerialized”.... they “flow into one another”, “blend into each other”, “wrap around the building”, and in other ways (by acting as the absence of plane) “contribute to that process of loosening up a building which now dominates the architectural scene.”⁷⁴

The technology of glass guaranteed a world without boundaries in which information would be available to everyone, unimpeded by conventional spatial limitations. The democratization of information was an important theme in the ideology of the modern movement and glass was considered a material of “truth,” an instrument of disclosure. The dematerialization of the wall would lead to a more open and healthy society—a transparent architecture for a society with nothing to hide.⁷⁵

Other than glass, opaque materials can de-materialize to permit spatial interpenetration of spaces. De-materialization of the opaque wall, as being more difficult, is more willing to contribute to the spatial integrity. As glass just provides visual continuity –not in all cases-, de-materialization of the wall also provides the continuity of movement.

Contemporary architecture witnesses a distinct manner of de-materialization. It is the age of electronic communication; façades can be used as screens on which images are reflected. (**Figure 3.9, 3.10**) These screens are formed by led lights or plasma screens, and thus the screens support changing of the images at definite intervals. Thus, the wall becomes an active participant for the exchange of information, adapting the changing conditions of the environment and time through its ability of changing the image shown. Thus, the electronic media provides a distinct way of interaction.

⁷⁴ Rowe and Slutzky, 1997, p. 52.

⁷⁵ Hinterwaldner, Inge. “Diller + Scofidio: Post-paranoid Surveillance,” [http://hosting.zkm.de/ctrlspace/discuss/msgReader\\$347](http://hosting.zkm.de/ctrlspace/discuss/msgReader$347), last accessed in August 2006.



Fig 3.9 and 3.10: Digital screen of the T-Mobile Headquarters in Bonn by ag4.

http://www.medienfassade.com/bespielung_reaktiv.html. Last accessed in November 2006.

The digital screen of the T-Mobile Headquarters is an illustration of de-materialization of façade becoming an urban screen. Those screens invite the outsider to examine the images; they become tools for exchange of information. Thus, they become communicative instruments through de-materializing the spatiality of public wall into a virtual environment. These digital screens become an interactive public element. In the context of public wall, those screens are thresholds between interior and exterior public space; and between virtual and open public space. They become virtual transition spaces which have the potential of

establishing a dialogue of the declared spaces. It becomes an element of public sphere through visual accessibility of space or information. They make the public wall dynamic, as it is possible to meet the fast changing communication requirements for a place.



Fig 3.11: Tower of Winds by Toyo Ito, in Yokohama, Japan.

<http://www.archidose.org/Apr01/040901.html>. Last accessed in November 2006.

Tower of Winds is another example of transforming screens. **(Figure 3.11)** The building silhouette is totally transformed into differing figures out of colored lights. This method is a result of the desire for visual experience. The patterns of lights of

the building change according to outside cues such as wind and noise, giving the building an appearance of fluidity and movement. Toyo Ito states about the light patterns as visualization of the music of the city. The concrete building skin de-materializes and becomes a matter of light and surface effects. And the building skin becomes an active element rather than being a static formation.

Literal and phenomenal transparency definitions of Slutzky and Rowe are related with the permeability of material or space. There is a definite state of being opaque – through which, phenomenal transparency is achieved- or being transparent – which is the literal transparency. De-materialization is an inherent quality of material either as a static or temporal dissolution. In de-materialization, material has an unfixed, changeable character. So, there appears *time* component in de-materialization, which indicates dynamism. Building technologies have several current innovations in the last two decades where de-materialization feature of glass, its light-sensitive interactive quality can be defended to have developed and upgraded.

Literal and phenomenal transparencies and de-materialization are instruments of design that provide the dialogue of the public interior and exterior. The public wall, either reducing its materiality or gaining depth merging itself to the interior and exterior provides this dialogue through spatial continuity. If the continuity for the public use is properly designed, the integrated space will live with its other dynamic component: the public.

CHAPTER IV

AN EVALUATION OF CONTEMPORARY EXAMPLES OF PUBLIC BUILDINGS IN THE CONSTRUCTED FRAMEWORK OF PUBLIC WALL

In this chapter, in order to clarify the contemporary position and significance of the public wall and to evaluate its communicational aspects in architectural built form-public dialogue, an investigation of public buildings is fulfilled. The selected works of architecture, despite sharing the objective of ‘publicness,’ they have differentiating visions. Principally, the selection of the works is based on communicative roles of public wall. According to their functions, public buildings are diversified, and a classification of the buildings can be made as cultural, governmental, commercial, educational, health, transportation, sports, religious, etc. These categories can be increased or merged with each other. The intentions for the merge of them, designing multi-use public buildings are increasing in today’s architecture owing to user attraction. To illustrate, a public building designed for being a congress hall also includes public formations such as cafes and shops in order to attract the user and provide a living place. The functional distinctions of public buildings are also important in defining their formal character, and basically their public wall. To illustrate, both a courthouse and a museum are public buildings, however the roles of public wall differs in each building type. People go to the courthouse by occasion; they go to the museum as a leisure and cultural pursuit. While the presence of the user in the first one is an obligation, the other is a matter of choice. Consequently, it can be claimed that the public wall of a museum is more in charge to establish a dialogue with the outsider to invite him; because otherwise can lead to the decline of the building. A courthouse public wall is also responsible to represent the building, nevertheless, as to go to a courthouse is a necessity, it would work somehow. In considering these circumstances, in this chapter, among the categories of public buildings, cultural ones are selected to be investigated as

their public walls are responsible for inviting and making the building a place of attraction.

Another consideration point is the character of the environment of the public building. In preceding chapters, it is stated that there exists the user types as passer-by and ones purposefully go to the structure. Being situated in a settlement, to communicate and attract the passer-by is added to the responsibilities of a public wall. As public wall is a formation in between a public interior and public exterior, it is paid attention to the placement of the building neighboring to an open public space, or having a potential to be a public space.

As phenomenal transparency and de-materialization are studied as milieus of communication, in order to study these theoretical approaches in practical solutions of contemporary architecture, the use of these milieus is among the aspects of evaluation of the examples.

After examining the public buildings briefly, a comparative evaluation of the public walls of buildings are made at the end of the chapter. The evaluation is made through basic concepts about public wall, which are accessibility, spatial formation, permanence, material configuration and scale. The buildings are compared in light of these concepts in order to achieve certain results for the production of successful urban environments. These concepts of evaluation has also influence in the selection of works, as the variation of the formations of public walls would provide to observe different attitudes. Examination of the examples is made fundamentally through a brief general introduction of the building and an analysis of public wall formations and behaviors.

4.1. An Examination of Contemporary Public Buildings in Terms of the Communicative Qualities of Public Walls

4.1.1. Storefront for Art and Architecture, Steven Holl and Vito Acconci, New York, USA, 1993.

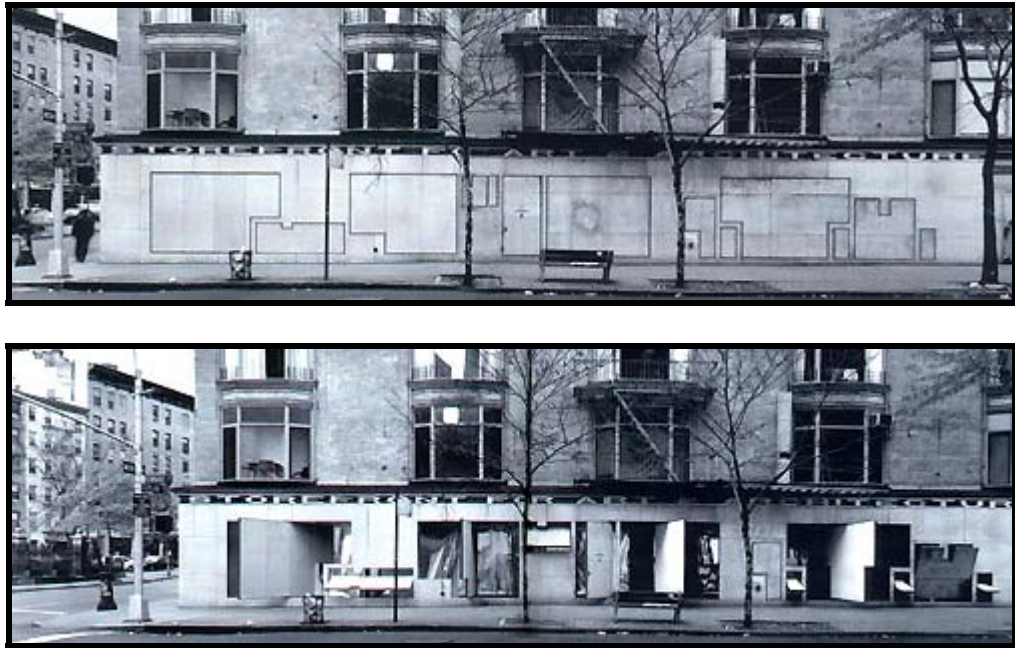


Figure 4.1 and 4.2: Exterior views of Storefront for Art and Architecture when it is open and closed.

<http://www.archiweb.cz>. Last accessed in November 2006.

General information:

Storefront for Art and Architecture is a gallery where exhibitions, events and publications of art and architecture take place. It was founded in 1982. In 1993, a collaborative building project by the artist Vito Acconci and architect Steven Holl was prepared for the redesigning the façade of the gallery. The new façade is designed both as a work of art and a functional approach. The new façade is arranged in a series of revolving panels in differing sizes and shapes. By the ability of revolving, the façade gains multitude of different possible configurations of

panels. The gallery has a triangular narrow space. Through the design of its public wall, its boundaries are redefined, and it is aimed to create space.



Figure 4.3: Storefront for Art and Architecture.

<http://www.archiweb.cz>. Last accessed in November 2006.



Figure 4.4: Uses of panels.

<http://www.japandesign.ne.jp/HTM/NY/0107/index2.html>. Last accessed in November 2006.

Communicative role of public wall of Storefront for Art and Architecture:

The exterior wall –the design element of Steven Holl and Vito Acconci- of the gallery is the main element of public wall of the structure. Through its ability to create space and to undertake differing roles, the exterior wall expands to interior and exterior; it creates a transition space, and thus, the public wall between the interior and exterior, gains a spatial character.

The panels of the exterior wall are multi-use; some become benches, tables, pedestals form models and surfaces for displaying the works of art. **(Figure 4.4)** Thus, the public wall's functions are diversified. The wall also carries on a gallery's interior functions of display, seating, serving. As a result of undertaking such responsibilities, public wall becomes a united whole with the interior, and also the exterior, providing fluidity and porosity of the spaces. It becomes a spatial formation providing the interaction between interior public space and the exterior public space. The design of the public wall supports the blurring the boundary between those spaces to invite the passers-by to the gallery space.

“The interactive dynamic of the gallery argued for an inside-out façade, turning it out to the public street...With this façade, the Storefront realized a new type of dynamic, urban interactive space,”⁷⁶ states Steven Holl. Instead of designing a static or permanent façade, the architects designed a dynamic façade, challenging the literal enclosure notions in architecture. The pivoting panels of the exterior wall define the relationship between the street and the gallery. The exterior wall either separates those spaces by closing, or unites by opening in some angle. While the panels are open, the gallery space becomes in intimate relation with the street sidewalk; it is visually and physically accessible. Reminding Carr et al. characteristics of public space as access, freedom of action, claim, change and ownership and disposition, public wall acquire the gallery to have a maximized accessibility and freedom of action. The other characteristic that the public wall defines in this built form is *change*. In this context, the ability of movement of the panels results in differing

⁷⁶ Holl, Steven. <http://www.archiweb.cz/buildings.php?type=arch&action=show&id=701>. Last accessed in November 2006.

organizations of the public wall in accordance with the characteristics of the activity on progress. Namely, the exhibition makes the façade. Hence, the public wall, instead of being a static formation, becomes an active participant of design. Besides providing movement of people through it, it is also a movable element. Its dynamism and adaptability to *change*, differing situations provides the gallery's permanence.

When the panels are open and used for certain purposes, the exterior wall becomes partially de-materialized, and the interior space of the gallery expands to the exterior public space, providing fluidity of spaces. Donlyn Lyndon's declaration of "a public structure's being dead on the street"⁷⁷ can be discussed through the **Figures 4.1** and **4.2**. The experience of the outsider is totally reversed when the wall panels are open or closed. When closed, the gallery becomes a blank wall devoid of information. Although the stripes show the potential to have a certain action, the gallery is still dead on the street, representing a lifeless formation. When the panels are open, the experience changes, all the energy of the interior reveals out. The dynamism and the changing qualities get the permanent attraction of the outsider. The clear division of spaces when the panels are closed disappears when they are opened.

The built form is a small-scale and mono-functioned structure. However, the public wall has more diversified roles than the other investigated public buildings. This may be an enforced result of its small-scaleness, and accordingly, compulsorily undertaking the built form's other responsibilities. But it makes the communication of the built form with the outsider possible. On the other hand, the difference of the built form from the other investigated built forms is the exterior wall is itself the design element. In the other built forms the exterior walls are characterized skins of the buildings, where they are one of the design elements. Just fitting their tasks, not undertaking the other elements responsibilities. However, if the Storefront for art and Architecture is accepted as a successful example, lessons can be taken for design approaches.

⁷⁷ See p.48.

4.1.2. Carré d'Art, Norman Foster, Nimes, France, 1993.



Figure 4.5: Carré d'Art, frontal view.

<http://www.fosterandpartners.com/>

General information:

Carré d'Art, finished in 1993 is designed as a cultural center in Nîmes. The building shelters a museum of contemporary art, a multimedia library and spaces for cinema, music and video. Thus, it is a multi-function building. The design is basically composed of glass walls and slender columns. Its placement in the city has a special importance as it faces to an ancient Roman temple known as the Maison Carrée. **(Figure 4.6)** Maison Carrée and Carré d'Art are aligned on the same axis, sharing the same open public space. Thus, Maison Carrée becomes a significant design element of the architect. In keeping with the scale of the environment, four floors of the Carré d'Art are under the ground. Norman Foster let the neighboring temple influence the proportions and shape of his building, but he made use of modern materials and technology. The result is a minimalist high-tech and transparent architecture.



Figure 4.6: Carré d'Art facing Maison Carrée on the front.

<http://www.fosterandpartners.com>. Last accessed in September 2006.

Communicative role of public wall of Carré d'Art:

Maison Carrée stands very firmly opposite the Carré d'Art, having a powerful impact on its surroundings. When the section by Norman Foster is analyzed, the spatial relation of the two built forms is observed. (**Figure 4.7**) Being aware of the relation, Foster also paid a special attention to the front façade of the building facing Maison Carrée. In his concept sketch of Carré d'Art, the architect assumes the front part of the design which is in relation with the surroundings and which welcomes the participants, putting a thick mark to define it as 'the site symbolic.' (**Figure 4.8**) This shows that the architect defines the material formation of interaction not as a planar, but as a spatial formation.

The public wall of the Carré d'Art, as the in-between formation between the interior public space and the exterior public space, becomes a spatial formation. The complete glass façade and the canopy with slender columns are material components of the public wall. "The line of those columns defines a kind of invisible wall: it encloses the space. It is a space –making device,"⁷⁸ Foster states.

⁷⁸ Quantrill, Malcolm. *The Norman Foster studio : consistency through diversity*, E & FN Spon Press, New York, 1998, p.46.

The exterior skin of Carré d'Art is almost totally glass. The glass of the public wall seems to have two opposing responsibilities: one is for the building to reveal itself; and the other is to have the reflection of the temple Maison Carrée on its façade, which is a kind of dialogue between the two. As being a public built form, the building is designed as accessible to everyone, and it strengthens this quality through providing an open public space on the front. Consequently, the Maison Carrée, acting as the opposite the edge of the public open space, appears as a monument standing on the open part of the museum.

Additionally, the canopy on the front defines an intermediary space that belongs both to the open public space and the building itself. This quality softens the transition of interior and exterior. Hence, the public building presents itself to the outsider with the phenomenal transparency of the public interior being employed with the literal transparency of the public wall –and de-materialization of it at night. As a result, the glass façade -with its questionable character of permeability and reflectance- and the canopy define a space of transition: public wall. It is also extended to the open public space on the way to the temple Maison Carrée. **(Figure 4.5)** And end with the temple's body, which acts as the largest monument of the museum Carré d'Art.

Besides the transparent public wall, the roof café also overlooks the open public space and the temple. **(Figure 4.9)** Thus, in the vertical sense, the 'middle' of the exterior wall contributes to the dialogue with its transparency; and the 'top' is activated with the roof café in a spatial interrelation with the open public space. For Foster, the open public space is the generator of the communication of Carré d'Art with the city fabric.

Lined with café tables and thronged with people, the new square has reinvigorated the social and cultural life of Nîmes. Together with these urban interventions, the Carré d'Art shows how a building project, backed by an enlightened political initiative, can not only encourage a dialogue between ancient and modern architectures but can also provide a powerful catalyst for reinvigorating the social and physical fabric of a city.⁷⁹

⁷⁹ Foster, Norman. <http://www.fosterandpartners.com>. Last accessed in September 2006.

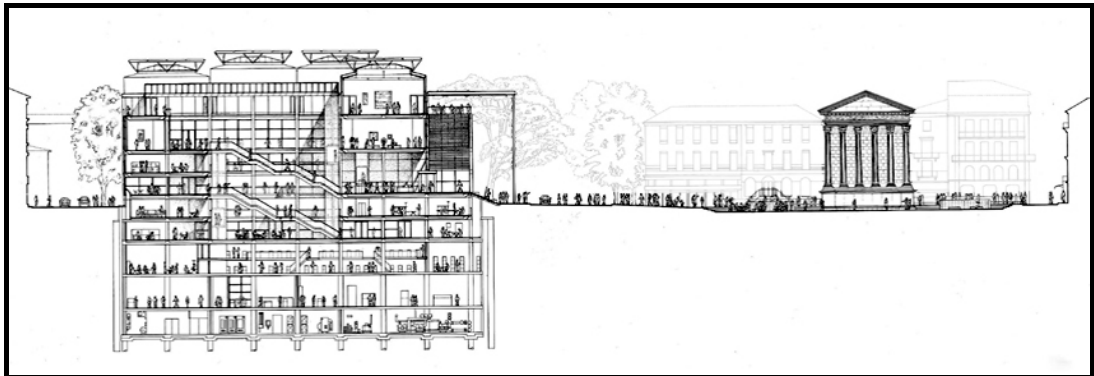


Figure 4.7: The section of Carré d'Art and Maison Carrée.

Foster, Norman. <http://www.fosterandpartners.com>. Last accessed in September 2006.

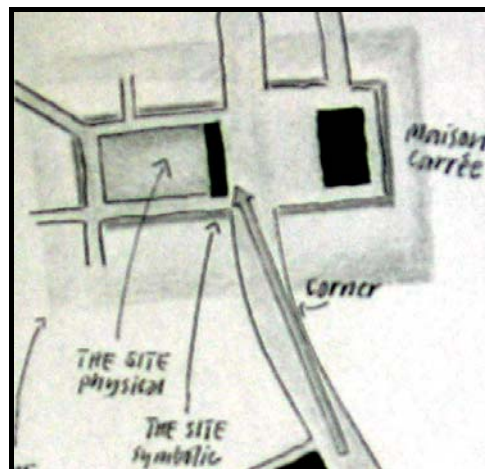


Figure 4.8: A concept sketch of Norman Foster.

Quantrill, Malcolm. *The Norman Foster studio: consistency through diversity*, E & FN Spon, New York, 1998.



Figure 4.9: The roof café overlooking to the open public space and the temple.

Foster, Norman. <http://www.fosterandpartners.com>. Last accessed in September 2006.

On the other hand, the success of the open public space of being a space of attraction in the city is questionable. The public space is bland in character, at the edge of emptiness. The only energizers of the space are the two built forms on each side. The temple stands with all its grandeur, but it does not embrace the open public space, it turns its right side to the space. (**Figure 4.9**)

In Nîmes, the interaction within the same building of these two cultures - the visual arts and the world of information technology – held the promise of a richer totality. The urban context of Nîmes also acted as a powerful influence. The site faces the Maison Carrée, a perfectly preserved Roman temple. The challenge was to relate new to the old, but at the same time to create a building that represented its own age with integrity.⁸⁰

As Foster states, to harmonize the building with the temple has great importance for him. Carré d'Art also defines its vertical formation taking Maison Carrée into consideration. Namely, neither its height nor its width competes with the monument. Foster mentions that “the Carré d'Art is articulated as a nine-storey structure, half of which is sunk deep into the ground, keeping the building's profile low in sympathy to the scale of the surrounding buildings.”⁸¹ Although the building provides harmony

⁸⁰ Foster, Norman. <http://www.fosterandpartners.com>. Last accessed in September 2006.

⁸¹ Foster, Norman. <http://www.fosterandpartners.com>. Last accessed in September 2006.

of proportion with the surroundings, the sunken part of the structure becomes a location having no connection with the outside.

Moreover, in the physical formation of the front façade, Foster makes use of patterns of the temple in the front. As they share the common open public space, there exists a regardless association between the structures and the character of the space. Foster reinterpreted various motives of the Maison Carrée and used them in his new design in terms of proportion, scale and arrangement. For instance he interpreted the grandeur columns in a high-tech manner. And he re-iterated the right façade proportions of the temple which faces to the building. Namely, the temple side façade, in a high percentage, has its columns semi-attached to the wall behind. Just the entrance portion gains depth. Foster also recedes the entrance portion of his building's front façade. And, the large portion that carries the roof café on top, acts as a side façade. The entrance part gains depth as the temple, and the part that comes front, gets closer to the colonnade, as the temple's wall does. Consequently, Carré d'Art can be stated as having a 'site scale,' because, when the environmental interaction is considered, the whole concentration is on the neighboring temple. The architect intended to construct a building with the aim of integrating it into the site, of establishing a dialogue with the neighboring built environment. The building reveals that it appreciates Maison Carée, through its public wall's directional, proportional and spatial characteristics. Facing Maison Carée makes it impossible to evaluate the Carré d'Art just by itself. The observer regardlessly evaluates the structures in relation. This confirms that, the public wall expands to the temple.

4.1.3. The Extension of Museum of Modern Art, Yoshio Taniguchi, New York, USA, 2004.



Figure 4.10: The Museum of Modern Art.

<http://www.archiweb.cz>. Last accessed in November 2006.

General information:

The first building of Museum of Modern Art (MoMA) was opened in 1939 in New York. The first part was designed by Philip Goodwin and Edward Durrell Stone, and the 1964 addition by Philip Johnson. In the course of time, MoMA needed more spaces for exhibition and education. In 2004, the expansion and renovation of the building was built which is designed by the Japan architect Yoshio Taniguchi. The design has two building blocks, almost identical on façades, both turned towards a courtyard. The eight-storey building blocks are composed of glass, black granite and aluminum panels. Taniguchi masterly controls transparency and opacity, of

both the spatial and material varieties. They house a library, archives, a theatre, and study centers. The design has a clean cut and conservative outline. It is sensitive to circulation needs; first of all, the whole configuration is formed around a courtyard.

Communicative roles of public wall of MoMA:

Public wall of the built form on the street side is designed as a huge blank black wall, preventing the outsider to access inside visually and physically. Black walls on both sides have just one window-like void on each. Also the interface of the sculpture garden and the street is a blank high wall, with transparent entrances on both sides. Such a placement of a hole allowing visibility on a blind surface makes the outsider to focus on the opening to see the inside. Here, the 'inside' becomes the sculpture garden. Through the glimpses provided by these holes, the public is invited to participate. First, the user enters in the garden. It is an in-between space; the user is neither in the street sidewalk, nor in the building. Thus, its public wall is a spatial formation. The built forms on both sides' receding from their skins, namely, their building skins extending to the sculpture garden, also support the transitions between the formations of the exterior bounding wall, the sculpture garden and the building. When he enters in the garden, the guidance ends, the user becomes free to stroll. The garden façades of buildings on both sides are totally glass, allowing the outsider to see inside. As long as the point of view allows, the observer sees inside. Consequently, in the design of MoMA, public wall turns out to be a transition space basically shaped by the wall structures facing the street, the sculpture garden and the façades of the buildings. The contrasts of formal arrangement make the desired action to be easily understandable. In relation, public wall becomes successful in guiding the outsider. At first, the blind surfaces make the outsider pass-by, and the focal openings make him to stop and have a look to inside. The façade of black granite, aluminum panels, and glass reveals and protects its contents, clearly responding to what happens inside a given space.



Figure 4.11: Building block on the west.

<http://www.archiweb.cz>. Last accessed in November 2006.



Figure 4.12: Building block on the east.

<http://www.archiweb.cz>. Last accessed in November 2006.

Taniguchi's building, as being an extension, has to adapt the existing MoMA buildings. (**Figure 4.13, 4.14**) Not simply adapting the existing buildings, it

transforms MoMA's buildings and additions into a unified whole, as Taniguchi states on his design in his own words, "transform MoMA into a bold new museum while maintaining its historical, cultural, and social context."⁸² The new building is in harmony with the old ones; it has a modern style with its rectilinear lines and glass façade. Materials, proportion and movement are given importance. Being placed in a dense area of New York City, its interaction with the city becomes more important. In this sense, the building tries to integrate with the urban environment through its domestic scale, proportions and style. The architect achieves the harmony and adaptation basically through centralization around the sculpture garden of the museum. The architect gives a great importance and attributes intensity to the garden. The sculpture garden becomes the social heart of the museum, where people come together and enjoy something to eat from one of the museum's two cafés, and stroll among works by Rodin, Picasso, Calder, and other modern masters.

The interior spaces are designed to provide transparency of organization. The entrance lobbies on both sides have two storey-heights, and also atriums are designed to provide the vertical connection of the levels. The whole front façades of the two buildings are transparent, and the interior organizations are open designs. Accordingly, from the outside, the perception of the levels, organizational aspects and functions is possible. The glass skin de-materializes and makes it possible to read the layers behind. Consequently, the sculpture garden offers a clear view of the organization of the entire gallery. The design enables the user to decide on the route that he/she is going to take through the gallery. The exhibition spaces with the displayed objects and the stairs to the exhibition spaces upstairs are clear to see. The levels flow into each other through the holes in the slabs. The organization offers connections in multiple directions. Providing transparency, the levels provide vistas through the entire depth of the building. While having a horizontal perception, the user perceives the interior vertically. Hence, the interior organization is phenomenally transparent. And through a de-materialized skin, the organization becomes readable, having a dialogue with the user. Another point is that, through the

⁸² Taniguchi, Yoshio. www.moma.org/about_moma/newmoma.html. Last accessed in November 2006.

transparent organization of the exhibition spaces, all the levels become the vertical continuation of the sculpture garden with their displayed objects. So, there exist a flow of interior and exterior spaces, which make the outsider to follow the flow, and define the movement of him. The basic organization of the spaces is apparent. Thus, the outsider and the insider are informed about the interiors, which make him to decide how to proceed strolling.

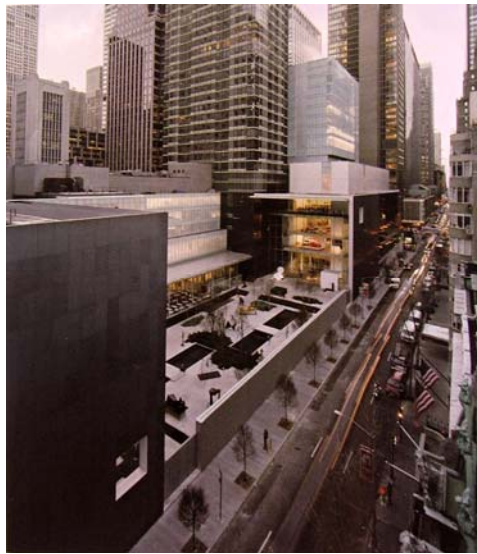


Figure 4.13: Model of the Museum of Modern Art.

Stephens, Suzanne. "Criticism With Yoshio Taniguchi's design New York Museum Of Modern Art finally becomes what it wanted to be all along," *Architectural Record*, January 2005, Vol. 193, Issue 1

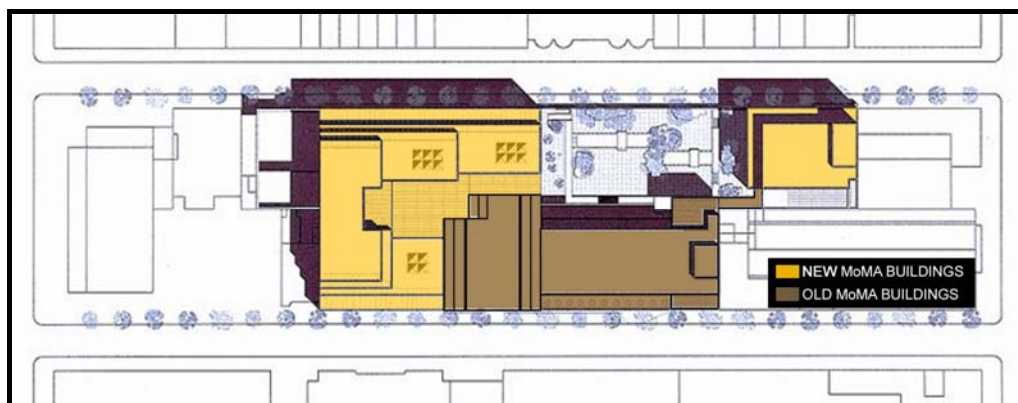


Figure 4.14: Site plan of the Museum of Modern Art.

<http://www.archiweb.cz>. Last accessed in November 2006.

The architect also provides a passageway through one of the entrances to across the street, which offers a shortcut between the streets. Thus, passers-by also enter the museum complex. Instead of being an isolated entity, the museum also acts as a connective part of the city.

Besides the organizational qualities that inform the user about the content, another communicative role of the public wall is about the physical formation. The bounding black walls rotate 90 degrees on top, assisting to form a definite skyline of the built forms. So, the skyline is not an anonymous formation, it has definite stages. The differing heights of buildings provide a balance between the whole configuration; for instance the old apartment tower does not alienate, it becomes a part of the composition. The architect has placed skylights, through which you also see the apartment tower. Seeing this kind of references makes the observer to be aware of his/her location. This is a form of communication, which helps the user to orientate himself/herself.

4.1.4. Foundation Cartier, Jean Nouvel, Paris, France, 1994.



Figure 4.15: Fondation Cartier.

<http://www.archiweb.cz>. Last accessed in November 2006.

General information:

Foundation Cartier is a mixed-use building that includes public exhibition space on the ground and basement floors, office space on the upper floors, storage facilities and car parking. The building is placed in a park facing a busy boulevard. The building has a glass and steel based construction, which is based on lightness. Its front and back glass façades are extended in both side directions; they do not end at the edges of the side façades. Nouvel also placed a large freestanding glass screen adjacent to the street, identical in formation of front and back façade screens. In the space between the screen and the building, trees are planted. Through the reflectivity and transparency of glass screens, it is aimed to create ambiguities of interiority-exteriority, front-back, material-immaterial and real-virtual. The transitions of spaces are intended to be blurred. Jean Nouvel's architecture is about virtuality and reality. "Nouvel's Foundation Cartier consciously plays with the dissolution of solid materials into transparencies, translucencies, and opacities that suggest a fleeting vision of tangible and intangible presence."⁸³

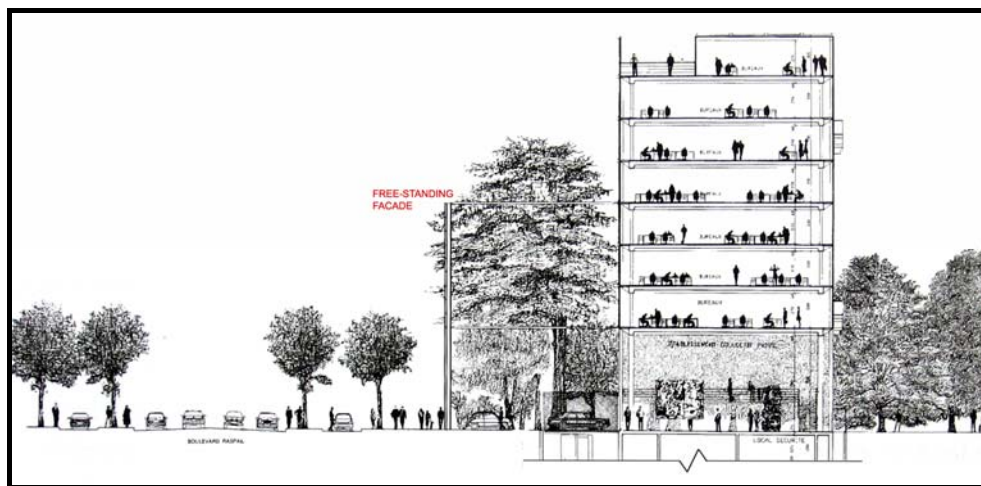


Figure 4.16: Transversal section of Foundation Cartier.

Fierro, Anette. *The Glass State : the technology of the spectacle, Paris, 1981-1998*, MIT Press, Cambridge, Massachusetts, 2003.

⁸³ Bermudez, Julio and Hermanson, Robert. "Tectonics After Virtuality: Re-Turning to the Body," <http://faculty.arch.utah.edu/people/faculty/julio/tecto.htm>. Last accessed in December 2006.

Communicative role of public wall:

Looking from the front, the building is extended to both sides, and looking from the sides, it is also extended to the front through the use of a free-standing glass screen. **(Figure 4.16)** Through the extensions, spaces which have certain significance in design, are created. Those extensions provide a transition space between the open public spaces around and the main body of the building. It is aimed to merge the structure into the garden. The boundaries of the building are blurred through those layers created. Thus, the public wall of the Foundation Cartier becomes a transition space which is extended to the street edge through the freestanding transparent façade and the trees in between. Moreover, on the sidewalk there is a considerable amount of trees, so the reproduction of layers of glass and tree makes the building gradually adapt to the surroundings. The public wall gains spatiality to provide an in-between space and the interplay of the built form and nature through that space attempts to avoid the alienation of the built form. However, the building's recession and the glossy screens facilitate the hiding and preserving of the building. While it is visually and physically accessible, the public wall rejects you standing upright in front of the outsider. Namely, the straightness, largeness and glossiness potentially make the outsiders not to stop, but pass by.

Basically, the design programme of the building included the preservation of the park in which the building is located. Especially, the 170 year-old cedar tree in front of the building had significance. Under these circumstances, together with the boulevard consideration on the front, the architect states the motives behind the use of screens as:

The urban strategy is important...I needed to build a very important building and so I made it high. The building line on Raspail Boulevard is very strong but I had to put my building behind it. I could not put a tall building like this without a relation to the urban context, so I decided to put two glass walls at the height of the other buildings on each side of the cedar.⁸⁴

⁸⁴ Nouvel, Jean. *Jean Nouvel / edited and photographed by Yukio Futagawa; interview by Yoshio Futagawa*. A.D.A. Edita, Tokyo, 1996, p.66.

There are three parallel screens, the two being façades of the building, and the third being the very front façade. front and back glass façades are larger than the building so that the blurring of the limits is aimed. The stairs are placed attached to those extensions, and the observer cannot decide whether they are inside or outside. The glass screens provide transparency, and in turn facilitate the visual penetration of the boulevard into the interior space and gardens. The trees have significant role in the perception of the layering of façades. The observer sees trees behind the first screen, but also behind the second and the third, which makes the confusion of interior and exterior. The observer outside confuses virtuality and reality; when he looks at a tree he doesn't know whether it is real or he is seeing a symmetrical reflection of another tree. Moreover, through the façade you see the sky through transparency but also through reflection, so there is ambiguity between virtuality and reality on which the architect constructed his design. Extension of the public wall into the sky higher than the building also provides a transition space in terms of earth and sky relationship. The building also tends to dissolve on top, as on sides.

On the other hand, the stretching of the front and back skins to sides show the building larger than it really is. The building through its scale and glossy appearance behaves as a unique formation on its site, which result unusual juxtapositions at the neighborhoods. **(Figure 4.17)** Although the scale of the freestanding façade is adapted to the neighboring building, a strong division of the structures is apparent. The architect's desire to adapt the public wall to the surroundings is limited with the adaptation to the nature. The juxtapositions of public wall with the neighboring buildings result in the alienation of the building. This can be designed consciously to provide the autonomy and domination; however, it draws a strict line outlining the buildings exterior. Consequently, however, the public wall is extended and attempted to be a transition space in-between, the edges of the public wall becomes definite, which makes a strict division of spaces. The freestanding screen acts as a guard that emotionally limits the physical access.

Transparency of the layers of the public wall provides visual accessibility of the exhibition inside. The exhibition space façade is composed of eight-meter high sliding windows, which are entirely opened to expand the exhibition to the

in-between space of public wall. Nouvel states “the exhibition hall transforms into the extension of the park.”⁸⁵ The freestanding façade has a height almost half of the main body’s façade. Together with the recession of the main body, the freestanding façade endeavors to bring the building to human scale. The trees behind the freestanding façade make it unclear whether they are inside or outside. The architecture plays with transparency and reflectivity depending on daylight. Either the city image is reflected or the exhibition inside is revealed.



Figure 4.17: Foundation Cartier neighborhood.

<http://www.archiweb.cz>. Last accessed in November 2006.



Figures 4.18 (left) and 4.19 (right): Foundation Cartier ground floor.

<http://www.archiweb.cz>. Last accessed in November 2006.

⁸⁵ Nouvel, Jean. <http://www.jeannouvel.fr>. Last accessed in November 2006.

As understood by its ‘standing and rising’⁸⁶, it is a cityscape approach, through which the city image is reflected. The building is a show of relations of sky, trees and reflected environment. As the trees are reflected, the reflections and the real trees behind and in front of the freestanding screen are confused. So is the steel frame and glass of the freestanding screen and the main body’s façade. The effect is to create multiple layers of transparency in which the building seems to dematerialize. These ambiguities result in multiple readings of the objects, reflections and the spatial formations. In this context, phenomenal transparency is used as a tool for reading the structure, creating interdependent layers. And also to integrate the nature with the building is another aim.

Nouvel named his use of reflection “environmental design,” implying that through reflection he devised a mechanism to reengage the contemporary city actively in its controlled and uncontrolled states: a morphology of static material and moving imagery.⁸⁷

As Anette Fierro states, through his design approach, Nouvel also aimed to achieve dynamism through the reflection of moving imagery. This shows the architect’s aim to provide permanence; adaptation to changing needs of the environment. Besides reflection, display of the interior, is also a tool for permanence as it has the ability to transform through time.

Nouvel’s conception is that of a vibrant collage of material, subject, and urban surround that quintessentially embraces timeliness. It is quite clear from the architect’s writings that he poses the dynamic notion of the architectural object as a static and stable entity: “A building has no meaning and cannot be read except through movement, through a series of carefully pre-established sequences.”⁸⁸

The building may adapt time through the stated characteristics. Its public wall, more than a spatial formation, acts as a huge screen for the city.

⁸⁶ A phrase of Christian Norberg-Schulz on wall characteristics, see p.10.

⁸⁷ Fierro, Anette. *The glass state : the technology of the spectacle, Paris, 1981-1998*, MIT Press, Cambridge, Massachusetts, 2003, p.110.

⁸⁸ Fierro, Anette, 2003, p.116.

4.1.5. Seattle Central Library, OMA, Seattle, USA, 2004.



Figure 4.20: Seattle Central Library.

<http://www.archiweb.cz>. Last accessed in November 2006.

General information:

Seattle Central Library is a multifunctional building, mainly designed as a social center. There are five programmatic platforms for parking, staff area, meeting rooms, books, and administration. Each platform is designed for a unique purpose; they are different in size, density, opacity. Koolhaas pushed and pulled the platforms of interior functions to provide light and views. And he enveloped those platforms with a diamond-patterned steel grid. So, the library's appearance comes from the positioning of functional platforms. The slopes of the grid provide a large amount of daylight and sight of vision. The building has a large scaled sculptural silhouette. Illuminated at night, the steel skin gets transparent, exposing its interior through its framed steel skeleton.

Communicative role of public wall:

The building skin of the library is a folding entity on its own, without any material transformations on any of the façades. There is a strict division between the three formations: exterior public space, the skin and the interior public space. Accordingly, the public wall of the library becomes just the skin itself. It neither expands to the interior public space nor the exterior public space. The public wall of the library gains its shape in accordance with the interior organization decisions. It may just have a decisive role in forming the entry spaces. The building has two entrances. The texture of glass changes just on the entrance parts. (**Figure 4.21, 4.22**) For the first one, the skin becomes an eave, and for the other, it becomes an arcade. When becoming an eave, the space below becomes a transition space into the building, so it tends to be an extension of the public wall. So, the public wall endeavors to gain spatiality. Also, the arcade of the other entrance provides a space in-between.



Figure 4.21 and 4.22: Seattle Central Library entrances.

Olson, Sheri. *Architectural Record*, *Thanks to OMA's blending of cool information technology and warm public spaces, Seattle's Central Library kindles book lust*, July 2004, Vol. 192, Issue 7.

However, the building skin is a dominant form of its own, rejecting any sharing with the neighboring spaces. So, it remains as a clothing material, standing as an autonomous entity. Its unusual form creates the greatest distance from its

neighbors. There is a dispute about its form and structure in the context of its social function. Neutrality and anonymity of the structure does not communicate with the outsiders as a foreigner. It does not speak or say something about the place in which it stands. The attraction of an exciting figure remains as its visual language. The interior is sealed off from the exterior. It has a totally glass skin, but closed like a fortress, confronting its neighbors with no sense of public attribute. The modification of the entrance areas attempt to gain a character to be noticed. In order to guide the user, the modifications are stretched to the whole entrance façade. Seattle. However the building does not have much dialogue with the outsider; this does not mean the fail of the public building, as it works as public in its interior. While accessibility characteristic of public space definition is not much fulfilled, another characteristic, *freedom of action*, is fulfilled through flexible, open spaces.

From the outside in, the concave and convex forms of the public wall that meets the ground is a fact that has influence on accessibility is. When it is concave, wrapping the outsider up, as in the first entrance eave (**Figure 4.21**), the building seems to accept your participation, whereas, convex edges like the outer surface of the second entrance arcade, reject the outsider, acting as an introverted formation. In this respect, public wall's being a strict edge can be questioned in terms of publicness: rejecting or inviting the potential users.

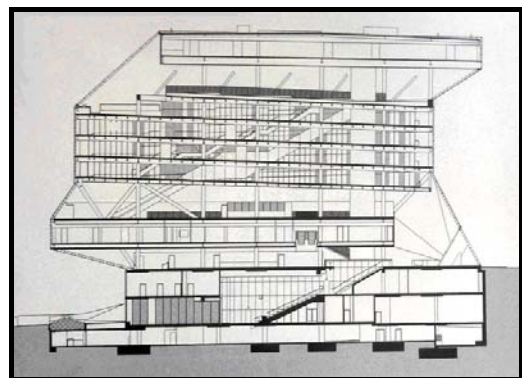


Figure 4.23 (left): Seattle Central Library model showing the platforms.

Figure 4.24 (right): Seattle Central Library section.

Olson, Sheri. *Architectural Record*, *Thanks to OMA's blending of cool information technology and warm public spaces, Seattle's Central Library* kindles book lust, July 2004, Vol. 192, Issue 7.

From inside out, the public wall is more generous. The platforms create a complex geometry forming angled forms of the glass skin with fascinating views of city, sky, and street from almost everywhere inside. In this context, Koolhaas states, “The glass goes beyond transparency to absorb every vibe of the city.”⁸⁹ Almost the whole skin is transparent from inside out. As the social spaces of the library as meeting room and reading terraces have open flexible designs, together with the transparent skin, those spaces become integrated with the city. The insider becomes comfortable as he recognizes his place with reference to the surrounding city formation. The large interior atriums provide relations between levels. The levels become overlapping, floating boxes, which makes the reading of interrelated spaces possible. Thus, the design is phenomenally transparent in its interior organization.



Figure 4.25: Seattle Central Library, night view.

<http://www.archiweb.cz>. Last accessed in November 2006.

The amorphous skin, different in every direction, provides a dynamic presence. The unseen faces cannot be guessed just looking from one side. This arouses the user's

⁸⁹ Olson, Sheri. Architectural Record, *Thanks to OMA's blending of cool information technology and warm public spaces, Seattle's Central Library kindles book lust*, July 2004, Vol. 192, Issue 7.

interest to perceive the whole form. Thus, it succeeds in motivating to perceive the formal arrangement, but it gives no clues about the content. There appears a conflict at this point. The building skin is an outcome of interior functional configuration; however, it does not notify this information to the outsider. As a result, the public wall of the library provides a one-way relation: from inside out, it provides an extreme visual dialogue with the city formation; however, from outside in, it acts as an opaque bounded formation in daytime despite the glass skin. At night, the glass becomes de-materialized, allowing visual access to the library. But still it acts as a bounded formation; the strong steel frame makes the sensation of protection of the library from outside. **(Figure 4.25)** This results in the privatization of the public space. Therefore, to provide a successful communication with the outside, just the visual access is not sufficient.

4.1.6. Sendai Mediatheque, Toyo Ito and Associates, Sendai, 2001.



Figure 4.26: Sendai Mediatheque.

<http://www.archiweb.cz>. Last accessed in November 2006.

General information:

Sendai Mediatheque is a multiple-use cultural center that mainly contains library, galleries for exhibitions and multimedia spaces. It additionally includes café, theater, meeting rooms and an entrance hall. It serves as a public place for gathering and sharing information through the electronic, digital, visual, and printed materials. The building is placed within a dense urban fabric. The building architecture is based on three fundamental elements: plates (as floors), tubes (as columns), and skin. Ito designed a block with transparent skin, whose supports are dematerialized. Seven steel floor planes are stacked on tubular steel frames. The building's dominating feature is its transparency and the spaces' being free of walls to achieve maximum flexibility. Each level has a different function, having a "different mode of communication between people or between people and different types of media," as Toyo Ito states. Mediatheque has few functional or spatial divisions inside it.

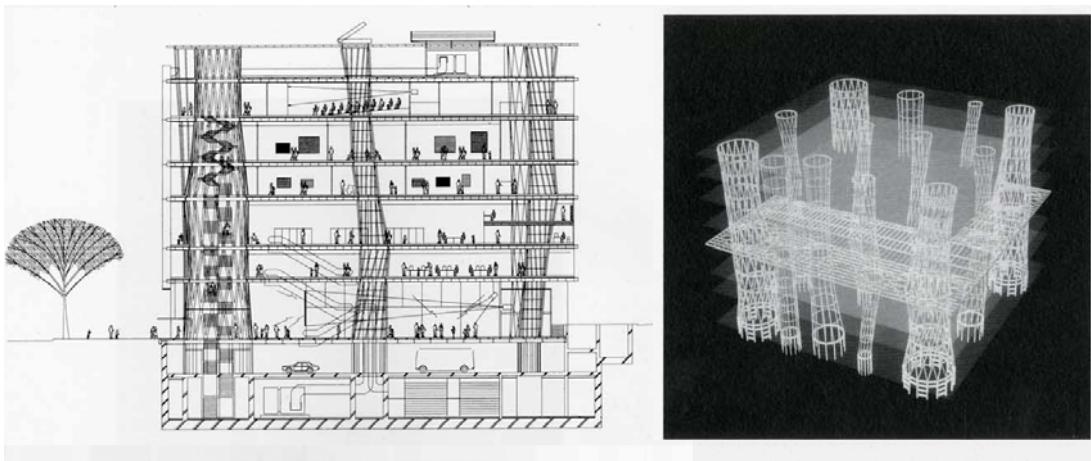


Figure 4.27: Section and diagram of Sendai Mediatheque.

<http://daap.space4.daap.uc.edu>. Last accessed in November 2006.

Communicative role of public wall:

The building is a clear-cut box, having no extensions to its surroundings. Its public wall begins at the glass skin. The transparency of the skin provides visibility of interior formations. The building has an open design. Literal transparency of the

skin enables to understand the layers of the building. Thus, it becomes a tool for phenomenal transparency of the building. Sendai Mediatheque can be accepted as a phenomenally transparent structure as it reveals its basic formation: its vertical planes are pierced by horizontal tubes that reach to the roof ceiling. The tubes are also skeletal, so they reveal what is inside them. To illustrate, one tube houses a glass elevator, and another the stairs. So, the user inside, as well as the user outside, read the layers of the structure. The completely transparent façade is intended to provide interaction between the outside and the inside. The transparency of interior space, together with the glass skin informs the outsider. As a result, it becomes an extension of public wall, achieving spatiality. And the space in sight, informing the user, has a dialogue with him. As a result of transparent organization, the public wall –the glass façade and the space behind– reveals the social structure of the building.

An important desire of the architect is to attain freedom from all solid barriers, which also maximize accessibility of the structure. The front façade of the building is totally transparent. It invites visitors inside with its column-free wholly transparent façades. From inside out, the complete glass skin also offers views over the city and to nearby mountains. The transparent façades reveal the floor divisions to the outside. So, the formation of the building with its tubes and plates is wholly visible. While the visible floor divisions and differentiating lighting on each floor provide a separation of function, the vertical continuity of the tubes provide a wholeness of the structure. The construction appears to be a single transparent volume.

In terms of physical accessibility, the glass on the front façade can be totally opened. As seen in **Figure 4.28**, the interior space and the sidewalk of the street become totally integrated; the boundary between inside and outside public space becomes more dissolved. The ground floor is two-storey height, having reception, an open square that supports film screenings and other events, a café, a shop and sitting places. Through the transparency of the façade and also through their opening, the interior space can be read as a continuation of the surrounding open public space.



Figure 4.28: Opening façade of Sendai Mediatheque.

<http://www.archiweb.cz>. Last accessed in November 2006.

The flexibility of design in plan is also continued in section. The tubes are hollow entities, allowing visual contact between levels. The architect aimed to achieve fluidity of spaces through relating each space to the other, which lead to levels of transparency. Thus, while the floor planes cut the building horizontally, the hollow tubes bond them vertically. As they are hollowed out, they create vertical continuity of visibility between the levels. So, the skin, levels and the tubes are successfully integrated to each other. While the façade is like a non-existent layer, the architect created horizontal and vertical porosity through open plans and vertically continuous transparent tubes. There are openings on the rectangular plan, which display horizontal porosity, and are vertically connected leading to a vertical porous formation.

Sendai Mediatheque acts as a showcase to display its various functions on each level. The continuity of each floor is rarely interrupted. Instead of solid walls, movable or transparent panels are used where necessary, to encourage communication between people. The open plan is not intended to create homogeneity but differentiation of activities within. The tubes, the lighting, the design present a variety of activity. Each level has a certain function, and according to its function, the floor

height, materials, furnishing and lighting changes. The city witnesses those unique identities of levels as the public wall is de-materialized. **(Figure 4.26)** Lighting effect provides an important aspect in the design, each level is specially illuminated. During the day, the spaces are filled with diffused light from the outside with minimized reflection while at night the entire structure is filled with artificial light.

The glass of the front façade is etched with dots and dashes to reduce glare. At night it totally disappears. Only the skeletal structure with the interior activities is visible. On the contrary, the other three façades of the building are not as transparent as the main façade. They have transparent, translucent and opaque panels, hiding the building interior. They conclude the same spaces, but they are in different characteristics, which mention the diversity of content. Thus, in a symbolic manner, they inform the outsider.

Besides invitation, the domination of the interior organization in the formation of public wall provides dynamism. The changeability of interior make the building adapt to transformations through time, which provides the permanence of it. As a result, the Mediatheque has an expressive language that displays a harmonious dialogue between user, space, skin, movement, and technology.

4.2. Evaluation of the Public Wall Formations through Basic Communicative Patterns

In order to clarify the variations of public wall patterns, the architectural examples can be evaluated through dominating key concepts of public space. In light of the comparison of the examples, certain outcomes of design approaches in terms of communicative values can be clearly observed. Concepts are utilized to clarify the examples of public wall formations, and in turn, the public wall formations clarify the values of the concepts. The key concepts of public space are classified as: accessibility, spatiality, permanence, material configuration and scale of public wall. Under the light of the use of transparency and de-materialization in the formation of public wall, the interaction of interior and exterior public spaces and the

potential of public wall to invite the outsiders, those key concepts are examined. Concepts of accessibility, spatiality, permanence, material configuration and scale are not separated, but dependant on each other.

4.2.1. Accessibility

As stated before, accessibility, which is the primary characteristic of public space, is related with the public wall characteristics at a large scale. Physical, visual and symbolic accessibility of a public built form largely define the degree of the structure's publicness.

The public wall of The Storefront for Art and Architecture gains a porous character through its movable panels, when they are open. Its exterior wall partially dematerializes, which result in an active dialogue of the street sidewalk and the interior public space. This feature allows the interior public space to be both physically and visually accessible. While the Storefront design succeeds in integrating the structure with the street, the Seattle Library behaves as being insulated from the sidewalks around, so the spaces around are becoming dead zones. Information isn't accessible from the outside. This difference of behaviors of exterior skins results in differentiating communications. The sidewalk in front of the Storefront and the sidewalk in front of the Seattle Library differ in character. While Storefront presents a transition space that makes the sidewalk its part, the library mostly excludes the sidewalk. Either its convexity or its mass of large scale and free of emotion makes the passer-by to pass without any stop. Storefront also presents flexibility of entrances.

In Seattle Central Library, there is a large living room in the entrance floor with computers, seating places, a coffee stand and a gift shop: a public space to enjoy. Regardless of the fact that the building succeeds with its public space in its interior, the outsider is informed of neither the content nor the organizational aspects. For the outsider, it becomes private, as the building skin wraps up the interior formations. This condition limits the accessibility of the 'public' space. Its independence from

the context and ostentation conflicts with being a public space. The users aimingly arrive there to have a good time. Its introversion and independence make the library building difficult to fit into the existing urban fabric. Its areas which are connected to the street are passive in activating the dialogue of interior and exterior.

While Seattle Library hides its content through its skin, Mediatheque Sendai reveals its content through its transparent façade, thus, provides an active dialogue with the outsider. The façade of Sendai Mediatheque is literally transparent, allowing reading the layers of interior, which is phenomenally transparent. This is an approach to invite and inform the outsiders to participate. On the other hand, why Seattle Library remains private comparative to Sendai Mediatheque is because it does not attempt to communicate with its environment. The public wall of Seattle Library does not invite the passers-by to participate through making its content accessible from outside. Excluding the sidewalks, the sidewalks tend to be residual areas.

Carré d'Art does not present its publicness as Storefront or Sendai Mediatheque does. To illustrate, Storefront activates visual and physical accessibility to the structure. In this context, the public wall of Carré d'Art remains passive. Two revolving doors provide the entry. The glass façade is not so much transparent as the architect wishes to reflect the temples image on the façade. Together with being sunken in the ground, these facts prevent the exterior to reveal the content to some degree. Still the semi-transparency of the façade provides visual accessibility, thus the interior has a partial role in activating the public wall, which facilitates the permanence of the building.

4.2.2. Spatiality of Public Wall

As observed from the definitions of public walls of the example buildings, public wall can have either a spatial or a planar character. It can be extended into the spaces beyond, or stay as a plane in-between. These formations have differentiating outcomes in providing publicness of the structure.

In the comparison of the Storefront and Carré d'Art, the characterizations of public walls are both endeavoring to have a spatial formation; one to form a transition between the street and the interior, the other to form a transition between the building and the temple. The public wall of Storefront both extends to the interior and exterior when the revolving panels overflow to both spaces. Not also the outsider has a dialogue with the interior, but also the insider has both a physical and visual dialogue with the exterior public space. This is provided not just by the de-materialization of the exterior wall, but also by the spatial quality it gains. Instead of a strict transition, the public wall embraces the participant, and then places him in the neighboring space.

The public wall of MoMA has a spatial character as Carré d'Art. However, the two public walls are different in their formational qualities. While Carré d'art public wall is expanding outside, MoMA expands to inside, even including the levels of interior. This shows that the environmental conditions largely effect the formation of public wall. As placed in a busy district of Manhattan, the MoMA building layers the public wall into the building to achieve more quiet space of a museum.

The design of Foundation Cartier also provides the public wall's expansion to inside. Regardless of the fact that, from a certain distance, the free-standing façade, which gains the public wall spatiality, dissolves in the large, dominant scale of two-dimensional front façade of the building. Thus, the spatiality of public wall turns out to be a mere 'wall.' While the public wall of Foundation Cartier seems as a 'wall,' in its real meaning, the public wall of Sendai Mediatheque has no wall, but as its horizontally cut, vertically bonded interior space becomes an expansion of public wall to inside, it has a spatial character revealing the whole content. The exterior glass wall, being an element of public wall of Sendai Mediatheque, as a result of light effects and domination of interior organizations, dissolves and acts as a non-existent material. In this respect, it contrasts with the Seattle Central Library, where the skin dominates. The building skin of Seattle Library does not form a spatial transition as Storefront or MoMA does, it forms an edge between the spaces.

And accordingly, it limits accessibility even located among busy districts. The public wall of Seattle Library can be discussed for its independent formation.

MoMA, providing a layered transition space, can also be a modal as the material and spatial layers inform the user of the content and organizational qualities. Its sculpture garden wall neighboring the street forms the external edge of the public wall. It expands to the garden, and the garden to the interior spaces of buildings through the transparent façades. So, the building gradually takes the participant in. Instead of alienation to the place, this makes him identify the building gradually.

4.2.3. Permanence

Permanence of a public space is related with the lifespan of a building. For public buildings, adaptability to time, changing environment and action provide the permanence of the building. Instead of serving one generation, the public building becomes successful if it also serves to future generations. Those features of adaptation to changing conditions also provide dynamism of the structure. Dynamism and permanence makes it possible to interact with the changing conditions.

In this context, the Storefront for Art and Architecture provides permanence through adaptability to action. Its panels are utilized for differing functions. The ongoing exhibition defines their tasks. So, the Storefront for Art and Architecture is also an approach of enriching the dialogue of the built form and the public adapting to time. Its adaptation to changing conditions also provides dynamism. Instead of being a static formation, the Storefront becomes a dynamic formation, keeping up with time. Dynamism is achieved not through the role of panels as exterior wall, but through their contributions to the functions of the gallery.

Foundation Cartier also endeavors to achieve dynamism through the reflection of moving imagery on its public wall surface. It acts as a screen to the city, reflecting the dawning, nature, and buildings of the city. So, it provides not a physical

dynamism as Storefront does, but a visual dynamism. Moreover, Cartier always provides a complete visual accessibility to its exhibition space. As the exhibition changes, it also contributes to the public wall, as it is visually accessible. So, it provides a dynamism and changeability to the structure. On the other hand, the unusual relations with the neighboring buildings make the observer feel that the building does not belong to the present day. While the building endeavors to fit in the city formation, its neighborhoods alienate the building. As a result, permanence and dynamism are basically related with the relationships that public wall establishes with the surroundings.

As the interior organization of Sendai Mediatheque is an expansion of the public wall, the transformations of the interior also mean that the transformation of the building appearance. So, its public wall can change through time, where visibility provides a pattern of movement to the public wall.

Therefore, the contribution of interior public space to the public wall through transparency or de-materialization, or public wall's bearing roles of interior functions have the potential to provide permanence of the building.

4.2.4. Material Configuration of Public Wall

Material configuration of public wall assists in guiding and informing the users. The organizational aspects of public wall help to construct the visual patterns of public wall. Gestalt principles of proximity, similarity, closure and continuity; and types of relations of elements as interpenetration, hierarchy and figure-ground lead to various readings of the public wall, and thus to explain the building tasks which leads communication of the built form and the user.

In this context, MoMA has its contrasting façades that dominate in the exterior perception: the blind and transparent façades. Storefront and Carré d'Art public walls include just the front façade of the built structures, however, MoMA communicates through its blind and transparent façades, garden wall, and voids, which

enrich the dialogue with the users. And the relation between these components are one within the other, they are strongly connected. As the distinctions between those layers are transparent, those spatial configurations interpenetrate into each other. This makes the observer to read those layers one after another in a hierarchical manner. As a result, the observer is guided and informed about the building. MoMA and Carré d'Art have similar attitudes in providing associations with a certain neighboring building. New MoMA buildings are in association with the old MoMA buildings and Carré d'Art is in association with Maison Carrée. However, Carré d'Art and Maison Carrée (although Maison Carrée is not a constituent of Carré d'Art, it is an effective design element) relation remains weak, comparing to MoMA. Although the space in-between holds them together, the proportions of spaces and the material organization is not powerful as MoMA buildings have in relating the old and new MoMA buildings.

From the point of view that the building draws a boundary and makes the outsider pass-by through its public wall's plain surface, Foundation Cartier is comparable with MoMA. MoMA also makes the outsider pass-by, but directs him in terms of focal points to stop. Full transparency of Cartier and changing relationships of transparency and opacity of MoMA result in differentiating effects of public wall.

Another decisive aspect about the material configuration of public wall is the modes of design approaches. The Storefront gallery is a renovation project, and accordingly the design is based on investigation and experience of the streetscape relations. Public wall of Carré d'Art, largely because of Maison Carrée, is a form-based design approach, as the temple has a powerful presence in the site. The temple has a constructive energy in making public wall of Carré d'Art to gain spatiality; expansion to the outside. The public wall of the Seattle Library is completely based on architectural programmatical decisions. To illustrate, for the sake of creating qualified spaces in the interior, to fulfill the functional programme, the public wall remains as an entity just serving inside. The building remains 'public' in itself.

4.2.5. Scale

Although the scale of a building is not only a matter of design approach, change of the scale result in differentiating communications. Public wall conception can be discussed in built forms in every scale. While it can be evaluated just on one façade – as in the Storefront-, on the whole mass –as in the Seattle Central Library- or in the layers of open and closed spaces of the building –as in MoMA. The results of interaction with the environment and the user changes in accordance with the changing scale.

Storefront is a street-scale modest structure. Except Storefront, the other investigated public buildings have large scales. Cartier addresses to a city-scale approach, like a screen of city. Its public wall expands on sides and top, it is larger than the building itself. MoMA has a city block-scaled structure. Cartier endeavors to reduce its scale through its freestanding façade. However, the free-standing façade still acts as an oversize structure that dissolves in the front façade, which is larger in size. In this respect, MoMA is more successful, the proportions of MoMA are more reduced to human scale through the gradations of its public wall and the balance of transparent and opaque formations. As a result, however large is the building's scale, through organizational design approaches of public wall, the scale can be reduced to human scale through a gradation. The reduction of scale provides intimacy, which creates a kind of invitation as Storefront for Art and Architecture does.

CHAPTER V

CONCLUSION

5.1. Overview

In this chapter, after highlighting the important points in this thesis, critical roles of public wall in communicative terms are pointed out. Then the use of transparency and de-materialization on public wall formation are considered in terms of their communicative qualities. Additionally, public building examples of the last two decades are utilized in discussing the value of public wall in architectural context.

Throughout this thesis, it is discussed that contemporary architecture witnesses transformations of relationships between architectural built forms and their environment. There has been a shift in the experiencing of architectural built forms in relation with the surrounding open public spaces. Contemporary architecture gives credit to openness and transparency, and buildings tend to be freestanding structures. These characteristics are results of technological developments. Privatization of public buildings has effects on being a freestanding structure as well. During this development process, large spans of construction and the use of glass take a considerable part. The new vision and the developments affected the dialogue between architecture and public. In light of this change, architectural built forms began to act as independent entities more than being a part of the city fabric.

Under this changing socio-cultural network of relationships, the most influenced built form type is the public ones, as they are in relation with their surroundings and the public at most - in consideration with the private built forms. Consequently, the main objective of the thesis is examining the dialogue of public built form and the public in the framework of the interface of them: the public wall.

A truly public space bears the notion of “being open to everyone,” which is basically related with *accessibility* of the space and the *freedom of action* in it. Together with these objectives Carr et al. define other characteristics of public spaces as *claim*, *change* and *ownership* and *disposition*. These five elements shape the formation of public space in terms of experience quality, and accordingly the publicness of the space. The limitation of these objectives leads to a privatization of the public space, which has many examples in contemporary public buildings.

Mainly, the formation of the boundary of a public space defines the publicness, as it is the principal tool of the limitation or at the same time, liberation of the objectives of publicness. It is the representer of the building; it defines the building’s character to the outsider, so, it informs him of the degree of publicness or privacy. Therefore, the nature of the boundary becomes the main subject matter in defining the relationships of a public building with its exterior and user. The boundary of a public building together with the spatial formations of transition between spaces, located in a public environment is a public wall. Its publicness comes from the surrounding spaces’ –interior and exterior- being public on all sides. Hence, it is a transition in-between two public spaces.

Like any boundary of a built form, it has *existential* reasons shaping its concrete formation. At the beginning, it is a shelter for protection, and is shaped in accordance with the functional needs. And it is characterized through the architect’s design decisions; for instance representing conceptions of culture, religion etc. The reasons that differentiate a public built form from private ones are *communicative* ones. Communicative patterns of a public wall define the publicness of the building, as it informs the user about its publicness. Public wall creates a visual language providing references of the inner organization, function or characteristics that guides the behaviors of the users of the building. Besides its communicative quality with the user, public wall defines the concrete formation of the transition between interior and exterior. Perception of the spaces of interior and exterior changes in accordance with which space the observer is in. So, the transition must be articulated considering simultaneous awareness of what is significant on either side. As a result,

public wall becomes a formation balancing the two roles of limiting and de-limiting. Public wall is a limit and a point of contact; it makes distinctions but also enables the simultaneous existence of those distinct items. Simultaneous existence calls for certain symbolic references of interior and exterior public spaces, or transparency of the public wall, which provides the information to be available on both sides. In relation, transparency and de-materialization concepts are important in terms of simultaneous existence of both spaces' characteristics in public wall. They become tools for the interaction of interior and exterior public space; they function in producing architecture-public dialogue.

In the architectural context, transparency and de-materialization are optical instruments of design. The notions are both related with material organization providing simultaneous existence; transparency is based on the simultaneous perception of different formations, and de-materialization is based on materiality/immateriality of substance. They are both related with the dissolution of public wall. These milieus have importance in defining the degree of visual and physical accessibility. Through these milieus permeability to strengthen the interior-exterior dialogue and information about the public built form content are presented. A multi-layered quality and porosity of the public wall can be achieved to soften the transition of the spaces. The examples of contemporary architecture and the theoretical approaches show that instead of a strict boundary, blurring the transition is a more appropriate solution to provide the dialogue of architecture and public. Public wall providing permeability and visual continuity of interior and exterior enhances the structure's publicness through a porous interface. Porosity is a concept associated with continuity, permeability, and the potential of a visual interaction between spaces. Then, the structural attributes, the spatial formation and the material qualities of the public wall derive from porosity, yielding an overall conceptual strategy of architectural design.

5.2. Findings and Conclusions

The distinction and definitions of *public* and *private* are adjusted to the cultural specifications of each different society. Consequently, perception of the character of public wall alters as publicness becomes a subjective concept. Throughout the thesis, it is aimed to produce a universal attribute of in terms of conceiving and designing public wall and thus, to produce a general description leading to an awareness and a consensus on the reception of public wall. The variation of design approaches of the contemporary public buildings in the preceding chapter provides generalized clues that have the potential to describe and qualify the thingness of the public wall. Through those samplar public buildings, certain dominating patterns which diversify public wall formations are produced as accessibility, spatiality of public wall, permanence, material configuration of public wall and scale, in accordance with the theoretical research. Through the comparative evaluation of the public buildings, it is observed that physically and visually accessible public buildings are more successful in terms of invitation and informing the outsider about the content and publicness. To achieve dynamism becomes another goal for designing public wall. Through the expansion of public wall to interior and exterior spaces, those spaces contribute the transition, and their changeable components make the public wall dynamic and adaptable to those space characteristics. So, expansion of public wall, namely its spatiality becomes a tool for permanence. Spatiality of public wall also softens the transition between interior and exterior public spaces, which provides a comprehensive gradual perception of the public building. The layers crated also have the potential to present the building in an intimate scale, which facilitates the participation of the outsiders. Through a more comprehensive research, these patterns which have a role of characterization of public wall, and thus the public building, can be increased. In this point of view, together with theoretical and methodical contributions, the thesis demonstrates that public wall has a place-making value and quality for providing a successful urban environment.

As the first illustration in **Figure 5.1** demonstrates, the investigation methodology of the thesis was to attain findings through theoretical and practical analysis of

public wall. Nevertheless, those findings lead to a new theoretical research, through which new findings leading to new horizons can be achieved. Thus, it is a productive cycle as shown in the second illustration in **Figure 5.1**. Through new public building examples and new design approaches, more findings regarding new design values and quality attributions can be produced. The fundamental aim of the study was to propose a universal definition of public wall through these findings in order to generate a successful dialogue through examining the communicative roles of public wall.

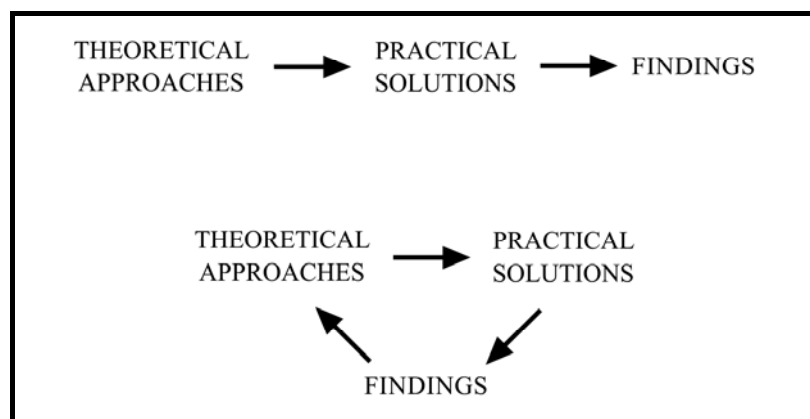


Figure 5.1: Illustration of investigation methodology.

It is realized through the study that, while the terms exteriority and interiority sound having opposing characters, softening of the transition between them in the public context becomes more valuable as the layers formed provide interaction possible. A porous public wall makes the interaction of interior public space and exterior public space possible. As the degree of transparency and de-materialization of public wall is related with porosity, they are closely connected to the dialogue of public and the public building. In turn, notions of transparency and de-materialization are important for a critical understanding of communicative role of public wall.

With respect to skins acting as barriers, the transitional quality enhances accessibility, both visual and physical. It is also observed that doors do not correspond to physical accessibility by itself; moreover they can be a rejecting

element. The quality of public wall defines the accessibility to a public built form, and the quality of it is based on experimental decisions of design. Namely, the formation of the surroundings and the attitudes of public are factors that affect the design of public wall.

The thesis had an intention to increase the quality of life and living environment through improvisation of public awareness and public participation in the transition space between the open public space and the built form. It was also intended to liven up the interface, so to avoid the open public spaces becoming residual areas. In this manner, public wall becomes a significant design element undertaking roles of communication of spaces and people.

Public wall conception can be discussed in built forms in every scale. While it can be evaluated just on one façade, on the whole mass or in the layers of open and closed spaces of the building. The results of interaction with the environment and the user changes in accordance with the changing scale. But more important is the architect's design approach. The architect constructs what he understands from *publicness*; how he provides his building to have a dialogue with its surroundings and the public. As the interaction is based on experimental approaches, the thesis presents a variety of contemporary examples. Thus, the quality of the dialogue can be exposed under the light of the theoretical characterization of public wall. As understood from the examples in the preceding chapter, the formations and characterizations of public wall are varied, and as a result of variation, they constitute a pattern. Considering the outcomes of this variation in terms of the quality of the dialogue of the built form, public and the environment, public wall can be rendered as qualifying the public sphere. In this context, the thesis aims to develop the perspective of the architect on the subject of the interface. The transition context hasn't been considered as such before; it has been considered as a façadist approach. However, when we consider the spatial situations providing interaction between the built form, user and the surroundings, as public wall, an enriched dialogue of them can be constructed.

The importance of the subject also comes from defining the status of the public buildings in the society. Public wall formation influences whether a public building works or not, as it introduces the building to the inhabitants. The behaviors of the passers-by vary in accordance with the characteristics of the neighboring public wall. This difference basically demonstrates the public wall's task of providing accessibility and information. In relation to these consequences, the development of the concept of public wall brings enrichment of the building's fitting into its context.

Public wall is a normative concept. When the thesis is examined, it is observed that public wall is an expression of the dispersion dynamic forces a building creates in relation to its surroundings. As a contextual and experiential issue of architecture, it has a striking potential to be a concept utilized on the design desk. Enriching the field of vision, public wall is a concept that bounds the theoretical approaches to the everyday life. The thesis puts forward that public wall is an aspect contributing to the formation of the urban space, and accordingly, it proves that public wall has a vital value of design and practice.

Preserving values in the already built environment is important in terms of perception of the environment. The deformation or disregarding the formation of public walls of the built environment narrows perception of the environment; the relations; the dialogue. Public walls are spaces which are the most vulnerable and open to change. For increasing profit or the need for extra space, public walls can be deformed by closing the undersides of canopies, gardens, namely the spatial formations, transition spaces of the public wall. However, these spaces of public wall have the roles of guiding and representing, and through deformation, the integration of the spaces fail, ending up in detached relations in the city network. Aiming to emphasize the importance of public wall formations and how it shapes the perception of the environment, the thesis is an instrument to attach sufficient value to public wall.

The thesis also puts forward the importance of the public wall in the context of open and enclosed public space relationships considering the rapid change and

development of the architectural circumstances which produce new inputs. Throughout the route it exposes, the thesis recommends more comprehensive and intensive researches to be carried out in the course of local and universal; national and international architectural and urban formations in order to enrich the quality of urban space.

REFERENCES

Ag4, Mediafaçade Projects, http://www.medienfassade.com/bespielung_reaktiv.html. Last accessed in November 2006.

Archidose, <http://www.archidose.org/Apr01/040901.html>. Last accessed in November 2006.

Archiweb, <http://www.archiweb.cz>. Last accessed in November 2006.

Arendt, Hannah. "The Public Realm: The Common," in *The Public Face of Architecture*, ed. Glazer, Nathan and Lilla, Mark The Free Press, New York, 1987.

Arnheim, Rudolf. *Dynamics of Architectural Form*, University of California Press, Berkeley, 1977.

Ashihara, Yoshinobu. *The Aesthetic Townscape*, the MIT Press, Cambridge, Massachusetts, 1983.

Bachelard, Gaston. *The Poetics of Space*, Orion Press, New York, 1964.

Bermudez, Julio and Hermanson, Robert. "Tectonics After Virtuality: Re-Turning to the Body," <http://faculty.arch.utah.edu/people/faculty/julio/tecto.htm>. Last accessed in December 2006.

Blom, Kati. "Transparency and Catatonia," in *Constructing Place*, ed. Sarah Menin, Routledge, 2003.

Carr, Stephen; Francis, Mark; Rivlin, Leanne G.; Stone, Andrew M., *Public Space*, Cambridge University Press, New York, 1992.

Curran, Raymond J. *Architecture and the Urban Experience*, Van Nostrand Reinhold Company, New York, 1983.

Fierro, Anette. *The Glass State : the technology of the spectacle, Paris, 1981-1998*, MIT Press, Cambridge, Massachusetts, 2003.

Forty, Adrian. *Words and Buildings: A Vocabulary of Modern Architecture*, Thames & Hudson, New York, 2000.

Foster, Norman. <http://www.fosterandpartners.com/internetsite/html/Project.asp?JobNo=0344>. Last accessed in November 2006.

Frampton, Kenneth. *Studies in Tectonic Culture*, MIT Press, Cambridge, Massachusetts, 1995.

Giedion, Sigfried. *Space, Time and Architecture*, Harvard University Press, Massachusetts, Cambridge, 1971.

Hinterwaldner, Inge. "Diller + Scofidio :Post-paranoid Surveillance," [http://hosting.zkm.de/ctrlspace/discuss/msgReader\\$347](http://hosting.zkm.de/ctrlspace/discuss/msgReader$347). Last accessed in August 2006.

Holl, Steven. <http://www.archiweb.cz/buildings.php?type=arch&action=show&id=701>. Last accessed in November 2006.

Japan Design Net, <http://www.japandesign.ne.jp/HTM/NY/0107/index2.html>. Last accessed in November 2006.

Kepes, Gyorgy. *Language of Vision*, Paul Theobald, Chicago, 1944.

Lyndon, Donlyn. "Public Buildings: Symbols Qualified by Experience," in *The Public Face of Architecture*, ed. Glazer, Nathan and Lilla, Mark The Free Press, New York, 1987.

Madanipour, Ali. *Public and Private Spaces of the City*, Routledge, London, 2003.

Meiss, Pierre von. *Elements of Architecture*, Van Nostrand Reinhold, London, 1990.

Moule, Elizabeth and Polyzoides, Stefanos. "The Street, the Block and the Building" in *The New Urbanism*, ed. Peter Katz, McGraw-Hill, New York, 1994.

Norberg-Schulz, Christian. *Intentions in Architecture*, MIT Press, Cambridge, Massachusetts, 1965.

Norberg-Schulz, Christian. *Concept of Dwelling*, Rizzoli International Publications, New York, 1985.

Nouvel, Jean. *Jean Nouvel / edited and photographed by Yukio Futagawa; interview by Yoshio Futagawa*. A.D.A. Edita, Tokyo, 1996.

Nouvel, Jean. <http://www.jeannouvel.fr>. Last accessed in November 2006.

Olson, Sheri. "Thanks to OMA's blending of cool information technology and warm public spaces, Seattle's Central Library kindles book lust," *Architectural Record*, July 2004, Vol. 192, Issue 7.

Özyörük, İnci. *The Interface of Architectural Built Form and Urban Outdoor Space*, Ankara, 1995.

Pressick, James Garrett. *Transparency*, Virginia, 2000.
<http://scholar.lib.vt.edu/theses/available/etd-07202000-01130008/unrestricted/Transparency.pdf>. Last accessed in June 2006.

Quantrill, Malcolm. *The Norman Foster Studio: consistency through diversity*, E & FN Spon Press, New York, 1998.

Rapoport, Amos. *Human Aspects of Urban Form*, Pergamon Press, New York, 1977.

Rowe, Colin and Slutzky, Robert. *Transparency*, Birkhäuser Verlag, Boston, 1997.

Scully, Vincent. *Frank Lloyd Wright*, George Braziller Inc, New York, 1960.

Scruton, Roger. "Public Space and the Classical Vernacular," in *The Public Face of Architecture*, ed. Glazer, Nathan and Lilla, Mark The Free Press, New York, 1987.

Sennett, Richard. "The Public Domain," in *The Public Face of Architecture*, ed. Glazer, Nathan and Lilla, Mark The Free Press, New York, 1987.

Simmel, Georg. "Bridge and Door," in *Rethinking Architecture*, ed. Neil Leach, Routledge, London, 1997.

Stephens, Suzanne. "Criticism With Yoshio Taniguchi's design New York Museum Of Modern Art finally becomes what it wanted to be all along," *Architectural Record*, January 2005, Vol. 193, Issue 1.

Taniguchi, Yoshio. www.moma.org/about_moma/newmoma.html, last accessed in November 2006.

The Museum of Modern Art, http://www.moma.org/collection/browse_results.php?criteria=O%3AAD%3AE%3A3426&page_number=2&template_id=1&sort_order=1 Last accessed in September 2006.

University of Cincinnati, http://daapspace4.daap.uc.edu/~larsongr/Site/Ito_files/ito-sendai.pdf. Last accessed in November 2006.

Venturi, Robert. *Complexity and Contradiction in Architecture*, Museum of Modern Art, New York, 1966.

Vidler, Anthony. *The Architectural Uncanny*, MIT Press, Cambridge, Massachusetts, 1992.

Virilio, Paul. "The Overexposed City," in *Rethinking Architecture*, ed. Neil Leach, Routledge, London, 1997.

Whyte, William H. "The Social Life of Small Urban Spaces," in *The Public Face of Architecture*, ed. Glazer, Nathan and Lilla, Mark The Free Press, New York, 1987.