



# **Phenomenology of Perception as a Qualitative Methodology to Study Contemporary Architecture**

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## **ABSTRACT**

The studies on contemporary architecture based on the scientific or positivist methods are mostly expanded on measurable quantitative, not able to achieve the qualitative dimensions and hidden meanings of phenomena in perception of space. The studied phenomena in this field are based on the user experience about the space and creation of its memories in his/her mind that are seen in many architectural studies. So, it is important to replace a new alternative method with the old positivistic approaches in architectural studies. One of the alternatives in this field is phenomenological research method. The present qualitative research, by descriptive-analytical method, attempted first to explain the phenomenological research methodology and then determine the nature of this method, different types of it, and its applications for study the perception of space in contemporary architecture. Later, the first-person, existential and hermeneutic methods of phenomenology were explained. Finally, the results of discussion showed that phenomenological research methods study the true essence of the things and follow inter-subjectivity support of the studied phenomenon and this leads to the deep understanding of some phenomena such as perception of space.

**Keywords:** *Phenomenology, Phenomenological Research Method, Phenomenology of Architecture, Phenomenology of Perception, Perception of space*

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## **1. INTRODUCTION**

The environmentally oriented design method is globally accepted as the fundamental path to sustainability in architecture. However, one of the fundamental problems in contemporary architecture is that environmental design methods in today's technological world generally deal only with "problem solving" and remain largely uncritical of Cartesian assumptions. This dilemma has led to the inaccuracy of the deep evaluation and examination of aspects on feeling, emotion

and place narrative which affect the perception of space. Therefore, the widespread discussion of Cartesian critique and its implications in the field of architecture has also been raised and has become the subject of much debate. Following some aspects of this critique in the works of contemporary philosophers leads us to various researches in architecture, including studies that use phenomenological method. Necessity of explaining the phenomenological method in study the perception of space is based on the premise that in today's architectural culture, the

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objectification of both the natural and human sciences has turned every phenomenon into objects that are devoid of meaning. During 20th century, as we know, great changes were occurred in epistemology and various cognitive methods were emerged regarding the recognition of phenomenon. One of these methods is phenomenology which was developed by Edmond Husserl and opened a new world to ontology. By rejecting awareness via empirical tests (realism) and mental rebuilding and assigning some mental issues to the external reality (idealism), Husserl founded a type of radical and combined philosophy which fundamentally tried to review the process of getting awareness and experience from natural and social realities. Phenomenological research method is anti-reductionism and mostly focuses on “totality” of social or physical phenomena with all the involved components.

Thus, the response to the nature, role and its application as research method in architecture and built space researches will be important. So the questions are what the phenomenological research method is and what is its role in perception of architectural space? How are the data collection and discussion methods to achieving meaning in this methodology? Which approaches to phenomenological method are introduced and what are the steps of any kind of phenomenological research method? The present article aimed to answer these questions to determine an efficient method in architecture researches to include semantic study which can explain latent qualities of any built-space and tries to introduce a useful research method to recognize and recreate spatial qualities and identity components in perception of architectural spaces.

### **1. Literature Review and Research Background**

Juhani Pallasmaa, a prominent contemporary architect and phenomenologist, considers every great architectural work “generates similarly an indivisible complex of impressions, or ideated sensations, such as experiences of movement, weight, tension, structural dynamics, formal counterpoint and rhythm, which become the measure of the real for us” (Pallasmaa, 2009: 102). In recent centuries, however, scientific and positivist methods of recognizing phenomena have often been ineffective in assessing environmental qualities and perception of spaces. “Through sciences over the past five hundred

years after the Renaissance, humans have come to believe that living, feeling and thinking are measurable by mechanical body, reactions and body systems is accepted as the basis of modern science; while the real life of human beings is full of emotions, interests and their mutual and complex interrelations and this was ignored; because these were illogical, unimportant and worthless issues” (Partovi, 2013: 26).

Then, Martin Heidegger, one of the greatest German philosophers of the twentieth century, turned to poetry with a phenomenological approach and emphasized the poetic nature of places. “The impact of Heidegger’s phenomenological method on the two pioneers of Post-Modern architecture, Christian Norberg-Schulz and Christopher Alexander, made some new ways in architectural design. They submit phenomenon of place to solve the problem of Identity in architecture, which was rejected completely in Modern architecture under the name of International Style” (Tahoori, 2018: 73).

In Norberg-Schulz’s (2000: 15-20) view, scientific approach to objects make them separated from their real ground and considered them as “measurable” affairs. He discusses “When architecture is investigated by analytical methods, the environmental-objective feature, the specific quality that is the subject of human identity and cognition, is lost” (Norberg-Schulz, 1980). If some phenomena as attachment to place, individual and collective memory of people, manifestation of imagery power of an architect or artist are investigated, not only the positivistic scientific methods are inefficient, but also some scientist said research in these fields are non-scientific. However, the main element in any artistic work is imagination based on intuitional knowledge and beliefs of the artist leading to the creation of special space and its effect on audience is possible via sensory perceptions. Thus, it is necessary to investigate in this regard.

### **2. Materials and Methods**

Knowledge in this research is arising from the interaction between the researchers and the subject matter which is the research methodology, and from methodological aspects, knowledge is created by presenting various analyses of the issue. So the study method should be selected among one of the qualitative research methods. The present qualitative research, by descriptive-analytical method, attempted to first explain the

phenomenological research methodology basics reliant on awareness structures experienced of the first-person view and then determine the nature of this method, different types and its applications for study the perception of space in contemporary architecture. By using grounded theory research design, after data collection via library studies and written sources, this study classified the items and by identifying the more important items, tries to respond the research questions.

### 3. Phenomenology

#### 3.1-Philosophical Movement of Phenomenology

Phenomenology is a philosophical approach and movement attached most closely to the names of Edmund Husserl and Martin Heidegger, it is introspective in nature, in contrast to the desire for objectivity of positivist standpoint. Phenomenology strives to depict phenomena appealing directly to the consciousness as such without any theories and categories taken from the natural sciences or psychology. Phenomenology thus means examining a phenomenon of the consciousness in its own dimension of consciousness. That, using Husserl's concept, means "pure looking at" the phenomenon, or "viewing its essence." Phenomenology is purely theoretical approach to research in the original sense of the Greek word "*theoria*", which means precisely "a looking at" (Pallasmaa, 1996: 450).

For Husserl, commonly referred to as the 'father of phenomenology', the aim of phenomenology was "to disclose the world as it shows itself before scientific inquiry" (Pickles, 1985: 3). In following this philosophy, phenomenologists have commonly conceptualized the major task of their inquiry to be one of getting "back to the things themselves". This is not, however, pursued through the scientific-positivist assumption that the objects of study 'speak' their truths, but rather, through the deeper 'stripping away' of all the assumptions and premises of human minds the outcome of scientific and common-sense understandings of the world. This process of stripping away, or of 'bracketing out', is referred to as the *Epoché*<sup>1</sup> or phenomenological reduction (Johnston, 1983), which then provides the researcher with the basis to discover the true essences of objects that reside in humankind's deepest intentional relationship with these objects (Smith, 1993: 42-43).

According to Husserl in *Crisis of European sciences* (1970), the positivistic concept of science

in this time is a waste concept. Thus, phenomenology claims to be associated to reality, the reality that was imagined it had no position in academic and philosophical issues of 19th century namely in Neo-Kantian tradition. Phenomenology beside pragmatism, logical positivism and structuralism is one of the dominant philosophical movements in early 20th century (Carman, 2008). "Phenomenon" literally means an object, recognized manifestation via the senses not through thinking and is mostly opposite to "reasonability" as "what is grasped by thinking". But phenomenology is beyond the description of what is emerged. According to Maurice Merleau-Ponty (2005), phenomenology is studying essences and to comply with it, for all problems we can present a definition of its essence and nature. Phenomenology reveals the secret of world and intellect (Merleau-Ponty, 2005: xvi-xxiv). It, insistently, asks us not to give up to this temptation and enter our experience into pre-defined conceptual boxes which are at service of tradition or theories. Thus, phenomenology is descriptive, not deterministic or inferential; tries to make explicit basic forms of experience and understanding as they are experienced or understand, not theorize them or infer outside of their limits (Carman, 2008).

#### 3-2. Phenomenological Study on Perception of Space

In architectural encounters, with "sensory perception, an object is placed in front of our eyes as a matter of course" (Husserl, 1977). So we can say that human being encounters with external issues via senses and thus, in this kind of cognition, what is perceived is sensory. Visual, smelling, touching and hearing senses are natural organs components of perceiving architecture. Husserl's phenomenology, which is based on systematic research of awareness and sensory perception, is the foundation of phenomenologist philosophers. "One aspect of the interdisciplinarity postmodernism's defining theoretical paradigms is the reliance of theory on the philosophical method of inquiry known as phenomenology. Prompted by the availability of translation of works by Martin Heidegger and Gaston Bachelard from 1950s," many theorists were not satisfied with rational intellectual perceptions due to the problem of science in targeting the intangible emotions of human being and phenomenological

consideration of architecture has begun to displace formalism (Nesbitt, 1996: 28-29).

Phenomenology was used as an effective approach to recognize and improve the quality of places and built spaces by a number of architects and theorists in the last decades of the twentieth century (Sharifian, Tahoori, Etessam, & Zabihi, 2020: 64). Norberg-Schulz asserts that phenomenology does not aspire to replace the natural sciences, but rather to replace the interrelations and all principles and criteria that those sciences express (Norberg-Schulz, 2000: 21). Generally, in phenomenology of place and environment three main issues are investigated: First, basic features and internal relations of environmental experience. Second, main features of environment like voice, topography, light and spatial qualities improving the specific character of place and landscape. Third, the relationships between human being and environment and improving the visions and views regarding a type of planning and programming that is more in contact with the place spirit (Partovi, 2013: 165). On the other hand, nowadays in architecture, the concept of innovation is what structures the type of exposure and spatial experiment, bringing the technology to the level of perception as progressive design (Tahoori, & Ghasemi, 2018: 48). This is another great challenge that shows that the perception of space in the contemporary period requires in-depth studies by architects.

### 3-3. Phenomenology of Architecture

The purpose of phenomenological study of architecture is to describe a "lived experience" of architectural phenomena such as perception of space. As the Finnish architect and phenomenologist Juhani Pallasmaa gives us a description using the "phenomenological method" of the marble-paved courtyard at the Salk Institute (1959-65) in La Jolla, California, designed by Louis Kahn (Figure 1):

"When entering the extraordinary space delineated by two rows of buildings, with the sky as its sublime ceiling and the horizon of the Pacific Ocean as its hypnotising back wall, I felt immediately compelled to walk to the nearest concrete wall surface and sense its temperature, the suggestion of silk and live skin was overpowering. Louis Kahn actually sought the grey softness of 'the wings of a moth' and added volcanic ash to the concrete mix in order to

achieve this extraordinary inviting matt softness" (Pallasmaa, 2009: 102).



**Figure 1.** Louis I. Kahn, Salk Institute for Biological Studies, La Jolla, California, 1959-65 (Source: Pallasmaa, 2009: 101)

The effect of architecture stems from more or less common images and basic feeling connected with building. It is basic feeling like these that phenomenology analyses, and it has become a more common method of examining architecture, too, in the last few years (Pallasmaa, 1996: 450). According to Bachelard (1994: xix) "transsubjectivity of the image could not be understood, in its essence, through the habits of subjective reference alone. Only phenomenology – that is to say, consideration of the onset of the image in an individual consciousness- can help us to restore the subjectivity of images and to measure their fullness, their strength and their transsubjectivity". According to Brentano, physical phenomena affect our external perception while mental phenomena affect our internal perception. The challenge of architecture evaluation is the stimulation of both internal and external perceptions (Holl, Pallasmaa & Perez-Gomez, 2007: 42) and the research on internal perception of the building is not possible without phenomenology.

The study of the perception of "atmospheres" in architecture is another area of application of phenomenology. From the viewpoint of Juhani Pallasmaa, "the judgement of environmental character is a complex fusion of countless factors which are immediately and synthetically grasped as an overall atmosphere, feeling, mood, or ambience" (Pallasmaa, 2014: 19). Peter Zumthor, a Swiss architect known for his sensuous materiality and attention to place, refers to the "atmosphere" as a fundamental quality of architecture: "I enter a building, see a room, and -

in the fraction of a second - have this feeling about it. We perceive atmosphere through our emotional sensibility - a form of perception that works incredibly quickly, and which we humans evidently need to help us survive" (Zumthor, 2006: 13). Undoubtedly, the explanation of the perception of atmospheres in built space is not possible except through the descriptive method of phenomenology.

However, usually there is on the whole great suspicion of an introspective approach to art because it is thought to lack objectivity. But people do not seem to demand the same kind of objectivity from the artist's creative work. A work of art is a reality only when it is experienced, and experiencing a work of art means recreating its dimension of feeling (Pallasmaa, 1996: 450). Thus, this approach can be useful for the studying artistic issues including architecture and perception of space. According to Pallasmaa, phenomenology is fragile art of encountering with the world. Merleau-Ponty asks how the painter or the poet would express anything other than his encounter with the world<sup>2</sup>. An architect is bound to explore and express this very same encounter (Pallasmaa, 2011). In phenomenology, perceiving any phenomenon is possible only via the Inside of phenomenon itself. Inside of phenomenon means that no phenomenon can be observed from outside as an object and we cannot imagine ourselves as subjects and give some prescriptions for it. We should perceive aspects of objects deeply and then, find the solution. Thus, the main phenomenology rule is that we should consider the things themselves (Pakzad & Bozorg, 2012: 35).

Space and place are two important key components in architectural studies. These concepts have some differences and do not mean the same in phenomenological method and approach. Space usually refers to something more abstract and without any inherent meaning, while place often refers to space of activities and meaning which show how people are attached to/aware of a certain piece of place. Generally through the phenomenological method of architecture, a place always has a special meaning that is different from other places for people. Yi-Fu Tuan and Edward Relph are two prominent phenomenologist thinkers attempted to explain the difference between space and place.

According to Tuan meaning of place can be given or derived from in area in two different ways,

namely: In a direct and intimate way, for example through the senses such as vision, smell, sense and hearing. An in an indirect and conceptual way mediated by symbols, arts etc. (Tuan, 2001: 6). While 'Space' can be described as a location which has no social connections for a human being. No value or meaning has been added to this space. So it is more or less abstract. In fact 'place' exists of 'space' that is filled with meanings and objectives by human experiences in this particular space (Tuan, 2001: 4-7).

In his works, Edward Ralph describes the connections between space and place: "they are dialectically structured in human environmental experience, since our understanding of space is related to the places we inhabit, which in turn derive meaning from their spatial context" (Seamon & Sowers, 2008: 44). Figure (2) show the relationship between space and architectural place through the phenomenological method to point out their differences in the form of a concept diagram.



**Figure 2.** Space, place and their differences through the phenomenological approach (Source: Authors)

#### 4. Phenomenology as a Research Method

Phenomenology can be used as a good way to critique and evaluate our knowledge of phenomena, including the phenomenon of constructed spaces or perception of architecture. As for Husserl, "the method of the critique of cognition is the method of phenomenology; Phenomenology as a general teaching of essences in which the science of the nature of cognition is located" (Husserl, 1977). Phenomenology is one of the common qualitative research methods (Bazargan, 2012: 46). According to some of the theorists (Denzin & Lincoln, 1994), qualitative research is multimethod grounded on in interpretive and naturalistic approaches to its object matter. In other words, the researchers using qualitative study method, investigate the studied phenomena in their natural conditions and attempt to find about the meaning the relevant people attributes to this phenomenon. Generally,

qualitative research is regular searching process to find about a social or human situation (Bazargan, 2012: 29). Briefly, it can be said that if a researcher wants to reveal the implicit structure of any phenomenon (including feelings, thought or object) based on the meaning people experience in their life, he uses phenomenological research method (Ibid: 156-157).

#### **4-1. Procedures and Steps of Phenomenological Methods**

According to some theorists (Hein & Austin, 2001), we cannot present fixed stages for phenomenological research and this depends upon the skill of the researcher. Holloway (1997) states that researchers who use phenomenology are reluctant to prescribe techniques. Hycner (1999: 143) concurs by stating that “[t]here is an appropriate reluctance on the part of phenomenologists to focus too much on specific steps”. He goes on to say that one cannot impose method on a phenomenon “since that would do a great injustice to the integrity of that phenomenon” (Ibid: 144). Despite this views, some phenomenological study methods are introduced (Bazargan, 2012: 157) and some guidelines are necessary, especially for novice researchers (Groenewald, 2004: 6). In the following, each of these methods and their steps will be introduced and explained.

##### **4-1-1. First-Person Method**

In first-person phenomenological research method, the researcher uses his/her own first-hand experience of the phenomenon as a basis for examining its specific characteristics and qualities. For example, the works of Violich (1985 & 1998), who examined the contrasting qualities of place for several Dalmatian towns with different spatial layouts. Using such techniques as sketching, mapping, and journal entries, he immersed himself in each place for several days and attempted to re-read each as a whole. In first-person approach, the understanding of phenomenon is dependent upon the personal life experienced world of the researcher; he/she must find ways to involve the worlds of others. This need leads us to the method of existential phenomenological research (Partovi, 2013: 169-170).

##### **4-1-2. Existential Method**

The basis for generalization in existential phenomenological research method is the experiences of individuals and groups involved in actual situations and requires four steps in the process:

- (1). Identifying the phenomenon in which the phenomenologist is interested;
- (2). Gathering descriptive accounts from respondents regarding their experience of the phenomenon;
- (3). Exact studying the respondents' accounts with the aim of identifying any underlying commonalities and patterns;
- (4). Presentation of findings, to the respondents and to fellow researchers in the form of question and answer (Partovi, 2013: 170-171).

Examples of existential method are investigations the experiences of individuals and groups involved in real-world situations (Ibid: 170). Examples of phenomenological research on the living world and place are Million's studies on the forced displacement of people (Million, 1992) and study of Nogue i Font about the phenomenology of the landscape, in which the generalization of results is based on the real-world experiences of displaced people or farmers and painters (Nogue i Font, 1993).

Indeed, no step to step procedure is mentioned for existential phenomenological study beyond the stages mentioned. In fact, the main factor in selection of the research, techniques and tools and required descriptions, is the personal style of the researcher and special nature of the studied phenomenon. It can be said that sampling method in phenomenological approach is different from positivist science sampling methods. In positivism approach, random sample of subjects representative of the population to which findings will be extended to the whole, are selected in positivism approach. However, some respondents will be selected because of their particular situation in relation to the phenomenon studied or because they seem more perceptive than others according to the researcher, thus better able to articulate their experience (Partovi, 2013: 171-172).

##### **4-1-3. Hermeneutic Method**

Hermeneutics deals with the text interpretation. In this type of phenomenology, the researcher attempts to consider the human being experiences as the written text and analyze the phenomenon

but in empirical phenomenology, data collection is done by regular framework (Bazargan, 2012: 157). As interpretation is not completely “closed”, very often the phenomenological researcher uses the first-person, existential, and hermeneutic approaches in combination as Chaffin's study of Louisiana river landscape. According to Partovi (2013: 172-173) Chaffin to explore this place, first, by presenting the region's history and geography, then by interviewing residents reached full information, and, finally, by canoeing the River, he become aware of a rhythm of water, topography, vegetation, and human settlement. In this study, he begins with a hermeneutic study of the natural and cultural landscape through scientific and historical documents. He also attempted first-hand views of the place; he could identify the strong sense of place. Then he described more fully through an existential stage of study involving interviews with residents “sense of place”. Finally, through the first-person experience (canoeing on the river), he completed the study. As it was said, conceptual example of Chaffin to study this place is simple but effective: Moving from outside to inside. It should be mentioned that in this method “there is no pre-defined instruction to determine the study procedures. A set of cycle movements are encountered and the researcher deeply is directed the studied phenomenon” (Million, 1992: 66).

#### 4-2. Data collection and Discussion

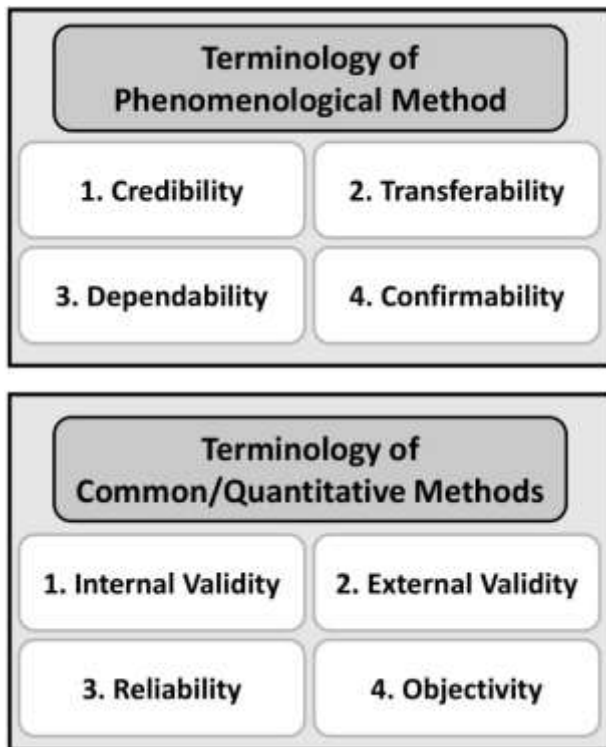
Bentz and Shapiro (1998) and Kensit (2000) caution that the researcher must allow the data to emerge: “Doing phenomenology” means capturing “rich descriptions of phenomena and their settings”. The main methods by which the phenomenologists attempt to achieve a real and pure relation with the phenomenon are as: thinking and reflection, deep qualitative descriptions of subjects, accounts from imaginative literature, group inquiry, careful observation of the places and environments or similar methods. Personal experiences are raw data of each phenomenological study. Such experience is achieved via interview, observation, reading, writing and living. Literature, poem, biography and art are rich life experiences resources. The people with whom the researcher interviews to have better understanding of routine experience are not subjects and they are active participants in the research process. The aim of the research process is not merely testing the

participants and it is creating the situation in which mutual training is done (Partovi, 2013: 176).

#### 4-3. Trustworthiness of the Phenomenological Study

From phenomenology aspects, the term “reliability” refers mostly to the interpretation appropriateness. In spite of the relativity of phenomenological reliability, phenomenologists attempt to identify qualitative criteria that can help to judge the validity of phenomenological interpretation. For example, Polkinghorne (1983: 64) presented four qualities to help readers judge the effectiveness of phenomenological interpretation: vividness, accuracy, richness, and elegance<sup>3</sup>. Regarding the investigation of reliability of phenomenological studies, the important issue is not subjectivity, especially in first-person interpretations, but, rather, power of convince the reader and whether the researchers’ conclusions are strong enough to engage the reader and get him/her to accept them. Therefore, the most significant test of reliability for any phenomenological study is its relative power to draw the reader into the researcher's depth of discoveries. The best phenomenological work gets people free from their usual recognitions and moves them along new paths of understanding (Partovi, 2013: 182-186).

In phenomenological research, trustworthiness was less based on sample size and was mostly based on the richness of collected information and dates and the researcher analysis ability. The researcher capability is improved via the data collection (observation, interview and study). Trustworthiness of the study can be evaluated via “reviewing the members’ descriptions”. The respondents are questioned about the support of the results and descriptions. Generally, in phenomenological researches, viewing reality is different from that of positivistic common methods and three characteristics are included: 1. There is no unit reality; / 2. Reality is based on the perceptions different form one person to another one and it changes over time; / 3. What we know and recognize, are meaningful only about the certain situation (Figure 3).



**Figure 3.** The differences of criteria in phenomenological methods and common/quantitative methods (Source: Authors based on Partovi, 2013: 187)

## 5. Conclusion

Given that the emphasis of the phenomenology as a qualitative method is on finding commonalities, continuity and reliability of perception of spaces, immortal patterns and intuitive understanding of the lower order in the structures of peoples throughout historical and contemporary architecture, can be a great basis for orienting architectural and perception to the sources of meanings in different cultures and it matters in that sense. Accordingly, various methods for conducting phenomenological research were described in this article. Each of the three phenomenological methods, including first-person, existential, and hermeneutic, has unique applications and can be selected according to their more appropriate circumstances or special position in relation to the phenomenon in architecture. Also, a combination of these three methods can be used to give a comprehensive understanding of the phenomenon of architectural spaces.

Any phenomenological study is done without any bias from the researcher. Since everything that appears and is visible is a phenomenon, it can be

said that in practice the realm of phenomenology is infinite. It should be considered that being released of biases means overcoming the imposition of the traditions and not accepting the dominance of the study methods. Thus, no dogmatic view is acceptable and we should doubt about all the metaphysic assumptions and essence of science. We should consider the objects themselves. Since the return to things themselves, is the main goal phenomenological approach, such a method can lead to a deep understanding in the way of studying the real nature of phenomena. It can be said that scientific methods of the study of the phenomena based on quantitative data and positivistic methods where the study subject is about existing qualities in specific meaning realm of space built by the people, the architectural works and cities, the numerical data-based methods will not be adequate. The presence of a person in the space, data and his sensory receiving, his experience of space, imaginations, his assumptions, legends and his mental myths are important here. All these factors should be investigated in the related researches and some methods are necessary in this regard and there is no way but phenomenological approaches.

In this way, the study of phenomena such as existential understanding and multisensory perception of spaces is done using the method of phenomenology and finally makes it possible to evaluate "architectural atmospheres". Atmospheres are not only studied mentally, but can also be studied objectively through the themes they create. Therefore, in the phenomenological method, the analysis and study of atmospheres will be based on theoretical texts, writings and speeches of phenomenologists and architectural theorists, statements, conversations and descriptions of designers about their projects, and all images, technical documents and project descriptions. Then, the factors that make up the atmospheres in each project are explained and evaluated qualitatively, and at the end, a conclusion of the study of the architectural atmospheres of the projects will be made.

## Notes

1. *Epoché* is an ancient Greek term which, in its philosophical usage, describes the theoretical moment where all judgments about the existence of the external world, and consequently all action in the world, is suspended. This concept was developed by



the Greek skeptics and plays an implicit role in skeptical thought, as in René Descartes' epistemic principle of methodical doubt. The term was popularized in philosophy by Edmund Husserl.

2. As quoted in: Richard Kearney, "Maurice Merleau-Ponty", *Modern Movements in European Philosophy*, Manchester University

Press (Manchester and New York), 1994, p 82.

3. As quoted in: Seamon, D., (2000), "A Way of Seeing People and Place, Phenomenology in Environment Behavior Research", In: *Theoretical Perspectives in Environment Behavior Research*, p. 171.

## References

1. Bachelard, G. (1994). *The Poetics of Space*. Boston: Beacon Press.
2. Bazargan, A. (2012). *An Introduction to Qualitative and Mixed Methods Research* (2nd Ed.). Tehran: Didar Publication.
3. Bentz, V. M., & Shapiro, J. J. (1998). *Mindful enquiry in social research*. Thousand Oaks, CA: Sage.
4. Carman, T. (2008). *Merleau-Ponty*. London: Routledge.
5. Denzin, N. K., Lincoln, Y. S. (Eds.) (1994). *Handbook of Qualitative Research*. Thousand Oaks: SAGE Publications.
6. Eden, T. (2004). "Lebenswelt", In: Ebner, K., & Kadi, U., *Wörterbuch der phänomenologischen Begriffe*, Hamburg: Meiner.
7. Groenewald, T. (2004). "A Phenomenological Research Design Illustrated", *International Journal of Qualitative Methods*, 3 (1), 1-26.
8. Hein, S. F. & Austin, W. J. (2001). "Empirical and hermeneutic approaches to phenomenological research in psychology: a comparison". *Psychological Methods*, Vol. 6(1), pp. 3-17.
9. Holl, S., Pallasmaa, J. & Perez-Gomez, A. (2007). *Questions of Perception: Phenomenology of Architecture*. San Francisco: William Stout Publishers.
10. Holloway, I. (1997). *Basic concepts for qualitative research*. Oxford: Blackwell Science.
11. Husserl, E. (1970). *The Crisis of European Science and Transcendental Phenomenology*. Translated by David Carr, Evanston: Northwestern University Press.
12. Husserl, E. (1977). *Cartesian Meditations: An Introduction to Phenomenology*. The Hague: Martinus Nijhoff Publishers.
13. Hycner, R. H. (1999). "Some guidelines for the phenomenological analysis of interview data". In: A. Bryman & R. G. Burgess (Eds.), *Qualitative research* (Vol. 3, pp. 143-164). London: SAGE Publications.
14. Johnston, L., (1983). "Bracketing Lifeworlds: Husserlian Phenomenology as a Geographical Method", *Australian Geographical Studies*, Vol. 21, pp. 102-108.
15. Kearny, R. (1994). *Modern Movements in European Philosophy*. Manchester and New York: Manchester University Press.
16. Kensit, D. A. (2000). "Rogerian theory: A critique of the effectiveness of pure client-centred therapy". *Counselling Psychology Quarterly*, 13 (4), 345-342.
17. Merleau-Ponty, M. (2005). *Phenomenology of Perception*. Translated by: Colin Smith, London: Routledge.
18. Million, L. (1992). "It was home: A phenomenology of place and involuntary displacement as illustrated by the forced dislocation of five southern Alberta families in the Oldman River Dam Flood Area". Doctoral dissertation, Saybrook Institute Graduate School and Research Center, San Francisco, California.
19. Nesbitt, K. (1996). *Theorizing a New Agenda for Architecture: An Anthology of Architectural Theory*. New York: Princeton Architectural Press.
20. Nogue i Font, J. (1993). "Toward a Phenomenology of Landscape and Landscape Experience: An Example from Catalonia". In: David Seamon (Ed.), *Dwelling, Seeing, and Designing: Toward a Phenomenological Ecology*. Albany: State University of New York Press, pp. 159-180.
21. Norberg-Schulz, C. (1980). *Logic der Baukunst*. Braunschweig: Vieweg & Sohn.
22. Norberg-Schulz, C. (1991). *Genius Loci: Towards a Phenomenology of Architecture*. New York: Rizzoli.
23. Norberg-Schulz, C. (2000). *Architecture: Presence, Language, Place*. Milan: Akira.
24. Pakzad, J. & Bozorg H. (2012). *An Introduction to Environmental Psychology for Designers*. Tehran: Armanshahr.
25. Pallasmaa, J. (1996). "The Geometry of Feeling: A Look at the Phenomenology of Architecture". In: K. Nesbitt, ed., *Theorizing A New Agenda For Architecture: An Anthology of Architectural Theory 1965-1995*, New York: Princeton Architectural Press.
26. Pallasmaa, J. (2009). *The Thinking Hand: Existential and Embodied Wisdom in Architecture*. Chichester: John Wiley & Sons.
27. Pallasmaa, J. (2011). *The Embodied Image: Imagination and Imagery in Architecture*. Chichester: John Wiley & Sons.
28. Pallasmaa, J. (2014). "Space, Place, Memory and Imagination: The Temporal Dimension of Existential Space". In: C. Borch (Ed.), *Architectural Atmospheres: On the Experience and Politics of Architecture*, Basel: Birkhauser, pp. 18-41.
29. Partovi, P. (2013). *Phenomenology of place*. Tehran: Art Academy Press.
30. Pickles, J., (1985). *Phenomenology, Science and Geography: Spatiality and the Human Sciences*. Cambridge: Cambridge University Press.
31. Polkinghorne, D. (1983). *Methodology for the Human Sciences*. Albany: SUNY Press.
32. Seamon, D. (2000). "A Way of Seeing People and Place: Phenomenology in Environment Behavior Research". In: S. Wapner, J. Demick, T. Yamamoto, and H. Minami (Eds.), *Theoretical Perspectives in Environment Behavior Research*. New York: Plenum, pp. 157-178.

33. Seamon, D., & Sowers, J. (2008). "Place, and Placelessness: Edward Relph". In: Hubbard P., R. Kitchen, & G. Vallentine (Eds.), *Key Texts in Human Geography*. London: SAGE Publications, p43-51.
34. Sharifian M. A., Tahoori N., Etesam I., & Zabihi, H. (2020). "Comparative Study of Architectural Phenomenology in Theories of Juhani Pallasmaa and Steven Holl". *kimiahonar*, 8 (33), pp. 63-80.
35. Smith, C. J. (1993). "The Acoustic Experience of Place: An Exploration of the Soundscapes of Three Vancouver Area Residential Neighborhoods", Ph.D. Dissertation, Department of Geography, Simon Fraser University, Canada.
36. Tahoori, N. (2018). "Learning from Heidegger: Phenomenology in Architecture, The Impact of Heidegger's Philosophy on Architectural Theory – The Identity of Place in Theories of C. Norberg-Schulz and C. Alexander". *kimiahonar*, 6 (25), pp. 73-92.
37. Tahoori, N., & Ghasemi, F. (2018). "BMW Museum: A Symbol of German Contemporary High-Tech Architecture". *International Journal of Applied Arts Studies (IJAPAS)*, 2 (4), pp. 39-52.
38. Tuan, Y. (2001). *Space and Place: The Perspective of Experience*. Minneapolis: University of Minnesota.
39. Violich, F. (1983). "Urban reading and the design of small urban places: The village of sutivan". *Town Planning Review*, 54, 41-60.
40. Violich, F. (1998). *Dalmatia: A Search for the Meaning of Place*. Baltimore: Johns Hopkins University Press.
41. Zumthor, P. (2006). *Atmospheres: Architectural Environments - Surrounding Objects*. Basel: Birkhäuser.