

**CULTURE – HOUSE RELATIONS IN THE CONTEXT OF
CULTURAL SUSTAINABILITY: EVALUATION ON
EXAMPLES**

**Res. Asst. Meryem Geçimli¹
Asst. Prof. Mehmet Nuhoglu²**

¹ Anadolu University, Turkey

² Yıldız Technical University, Turkey

ABSTRACT

There are close relationships between the cultural structures of societies and residential areas. The place where the society chooses to live and the ways it is organized is an expression of the cultural structure. Traditional houses are accepted as the most obvious indicator of this situation. One of the ways of preserving cultural sustainability today is to read the design principles of these houses correctly. Culture is about what kind of environment people live in and how they live. Human behaviors are based on cultural references. Religion, view of life and perceptions of the environment are both dialectically shaped culture and shaped by culture. Culture is about where and how human meets his needs throughout his life. It can be said that culture is one of the basic factors that direct human behavior and life. Therefore, the cultural embedding of sustainability thought is important in shaping the world in which future generations will live. Regarding various cultures in the literature; the structure of the society, their way of life and how they shape their places of residence, etc. there are many studies. The riches that each culture possesses are considered to be indisputable. These important studies are mostly based on an in-depth analysis of that culture, concentrating on a single specific culture. In this study, it is aimed to make a more holistic analysis by examining more than one culture. Thanks to this holistic perspective, it is thought that it will be possible to make inferences that can be considered as common to all societies. This study, which especially focuses on Asian and African societies, is the tendency of these societies to maintain their cultural structure compared to other societies. The reflections of cultural practices on residential spaces are examined through various examples. The dialectical structure of Berber houses, integration of Chinese houses with natural environmental references, Toraja houses associated with the genealogy in Indonesia, etc. examples will be examined in the context of cultural sustainability in this study. With this holistic approach, where the basic philosophy of cultural sustainability can be obtained, important references can be obtained in the design of today's residences. This paper was produced from an incomplete PhD dissertation named Evaluation of Cultural Sustainability in the Application of House Design at Yildiz Technical University, Social Sciences Institution, Art and Design Program.

Keywords: *cultural sustainability, house, culture, place*

INTRODUCTION

The most obvious difference between human systems and the natural ecosystem is the presence of symbols that include language in human systems as well as the time and space that direct both systems [1]. While time and space are the main factors in the formation of all systems, the production and use of symbols are unique to human. Since culture is a phenomenon that has accumulated over centuries; It has a close relationship and continuity with history. A house meets many needs; the place of self-expression, the memory container, the shelter against the outside world, a cocoon where we feel full and leave our shield [2].

THE CONCEPT OF CULTURAL SUSTAINABILITY

Culture can be described as something that covers the whole of human life. People always experience and live it. Behaviours both are formed by the culture and form the culture [3]. The most obvious difference between human systems and the natural ecosystem is the presence of symbols that include language in human systems as well as the time and space that direct both systems [1]. While time and space are the main factors in the formation of all systems, the production and use of symbols are unique to human. Since culture is a phenomenon that has accumulated over centuries; It has a close relationship and continuity with history. Throsby [4] separates the concept of sustainability into natural capital and cultural capital. According to him, natural capital forms the basis of sustainable development, but cultural capital forms the basis of the equality that must be achieved between future and current generations. Cultural features are generally used in spatial design to create architectural product identity on the global stage, which more often ends up as kitsch [5].

EVALUATION

In this paper the reflections of cultural practices on residential spaces are examined through various examples. These examples are almost completely destroyed or changed by virtue of social and technological changes. However, we can collect the data from a large number of academic researches about cultural studies. In the literature there are many studies on cultural issues both conceptual and applied.

Bourdieu [6] in his study of Berber houses emphasizes that there are contrasts in the design principles of these houses. Water-fire, cooked-raw, high-low, light-shadow, day-night, male-female, culture-nature. The house consists of two parts (Figure 1.). The large part is for people and the small part is for animals. The wall with the double-door entrance is called the dark wall. Opposite the wall that divides the house into two parts, there is a wall with a fire and various kitchen items. Man sleeps on low bench leaning against dark wall [7]. In the space above the section for animals, women and children sleep. Spouses do not sleep together, but women get up at night during fertility periods and meet with their spouse in the dark.

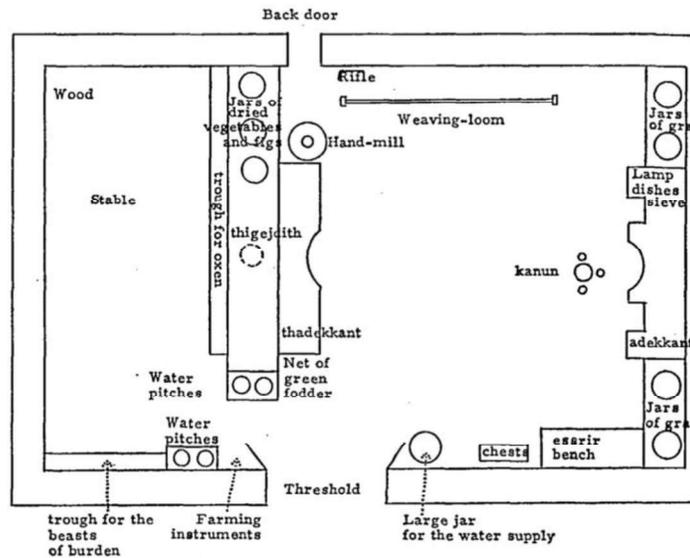


Figure 1. Berber House[7]

In his study, Zhang [8] examines the evolution of Chinese Traditional Courtyard Houses from past to present in a historical process. Important concepts of Chinese philosophy in terms of form and function of these houses;

- Harmony with the Sky: form and environmental quality of the house (facade, entrance, windows, courtyard, gardens and roof)
- Harmony with the Place: space and building quality (indoor, floor height, furniture, materials, technological facilities, car park, management)
- Harmony with Human: social adaptation issues (education, profession, home purchasing power, neighbourhood, visual interaction in indoor-outdoor)
- Harmony with Self: time and cultural activities (philosophy, religion, cultural activities in the home / courtyard, indoor / outdoor cultural celebrations, birthday, marriage, anniversary)

At the same time, these concepts are directly related to the Confucian and Taoist teachings that govern traditional life (Figure 2). Zhang [9] conducted a field study in Beijing and Suzhou, two regions where both these newly renovated and newly built residences are located, and made studies on architectural and spatial design dimensions on this very important cultural heritage of China. In the Yin-Yang philosophy of Chinese culture, Yin symbolizes the world, while Yang symbolizes heaven. In order to create Feng Shui houses should sit north to the south, that is, to carry Yin at back, to embrace Yang in front or in other words, there should be a stream in front of the house and hills behind the house.

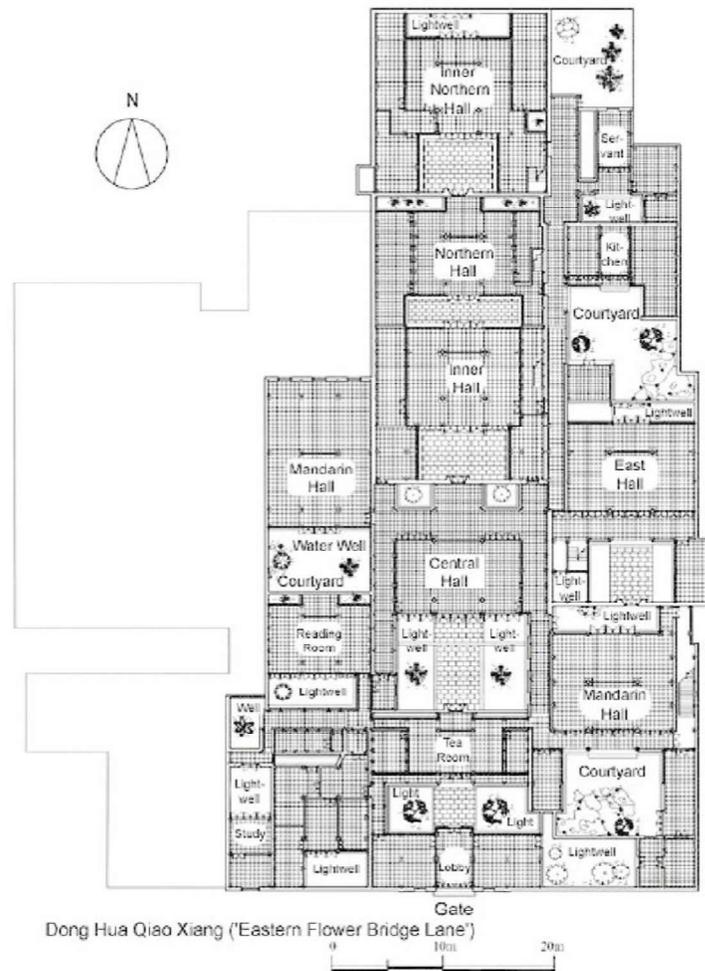


Figure 2. Chinese Traditional Courtyard House[8]

In his study Beynon [10] explores how the relationship between architecture and culture is defined through examples of Southeast Asia. He begins to investigate whether architecture, which is a field where cultural symbolism (cultural flow in the modern sense) is embodied, can be preserved whether the traditional role of architecture in a contemporary environment can be preserved. It examines the versatile and complex relationships between contemporary architecture, culture and identity in the Southeast Asian region. Beynon [10] conducted studies in three different fields within the scope of the research. In this study, which includes a village with new buildings in traditional and local culture, there are also two cities that can be defined more locally and globally. In the examinations he made in the villages of Toraja region in Indonesia, the researcher; He states that there are some local cultural influences besides the increasing effectiveness of Christianity. In the

Section GREEN DESIGN AND SUSTAINABLE ARCHITECTURE

teaching of the traditional animist belief Aluk to Dolo (the path of the ancestors), buffalo fights, victims, mummification and burial rituals are also culturally important [10]. On the other hand, in the Traditional Torajan Structures called banua Toraja with their remarkable structures, there are houses left from the ancestors, also called Tongkonan or origin houses. These houses are indispensable not only for the family to meet and live, but also for the ritual relationships of the society. It also has an architecturally original appearance with its interesting saddle-backed roofs. There are different rumors about the origin of this roof form. This form is associated with both the buffalo horn and the boat. Tongkonan is a living entity for society with this culture (Figure 3). It is not only a place where ancestors reside, but actually ancestors themselves. They are even described as mother-tongkonan or daughter-tongkonan, like some kind of family tree. Many new Toraja houses are built in a classic lowland style with high ground and hipped roof, while others use this local typology by interpreting it. The most common are double-decker houses.



Figure 3. Tongkonan in Indonesia[10]

Hanan [11] investigated Traditional Batak Toba houses, which are better preserved than other regions on the island of Samosir in Indonesia. In this study, it is aimed to reveal the sociocultural and economic factors that ensure the sustainability of the houses. Even some parts that are not structurally essential have a decorative cultural role. The house, raised on wooden poles and lintels, has wooden walls and a hipped roof. The interior is dark, cramped and smoky. It is used for working, cooking and sleeping. All household activities take place in the common room whereas the cooking stove symbolizes the existence of the inhabitants. Most of the day is spent outside. The exterior of the house is decorated with paint or wood carving. Original Batak Toba houses consist of only one common room, no walls or separators [11]. The insufficiency of the single common rooms in the original houses and the changing living conditions required the addition of these houses. In the house shown in Figure 4, a new house was added to the original building in front with a bridge from the back. This new supplement,

which draws attention to the original dwelling, contains the necessary spaces for private life and contributes to cultural sustainability.



Figure 4. Traditional Batak Toba Houses[11]

Ismail [12] examined the Traditional Bugis Houses in Malaysia in his works. The origin of the people of Bugis is based on Indonesia, but for various reasons they have brought their traditions to Malaysia, where they came through migration. Primitive religious traditions have Buddhist and Hindu beliefs. The plan of the Bugis house is a rectangular form consisting of 2-8 parts called lontang. The simplest plan is 2 sections; central area (ri tegnga) and rear kitchen area (ri laleng). There is no separator in the original Bugis house plan; It is an open interior where all functions, including sleeping, preparing food, are performed in the same place. In addition, the houses of those who are superior in terms of social status can be in 8 sections [12]. However, in this case, it emerged with the additions made later. For example, in the plan, a space (ri saliveng) and a veranda (lego-lego) were added to the front part. Before the guests coming to the house are invited to the front floor, they are kept on the veranda, which is reached by stairs and located lower than the house (Figure 5). The door to the house is lower than the others, and the guests entering the house are allowed to bend slightly due to the respect for the owners of the house.

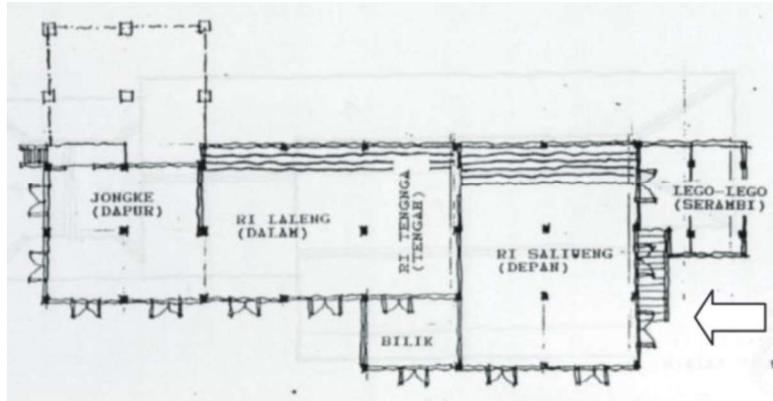
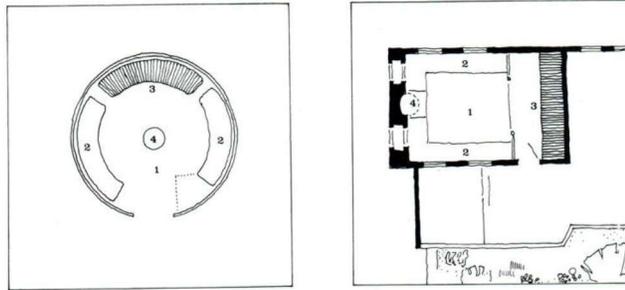


Figure 5. Bugis House[12]

The concept and form of the traditional Turkish house existed in accordance with a number of factors. Like economic conditions, regional features, physical influences, lifestyle etc. It is accepted that the Turkish house is rooted from nomadic tents. When nomads had started to dwell, they carried their habits and lifestyles to their dwellings. Turkish House planning is based on two main space. First is the rooms and second is *sofa*. Sofa is a kind of intermediate and semi-private place between rooms. In the house each parent has their own room which is designed to meet all daily needs. All the rooms open to this intermediate and common space. Sofa is for the whole family, while rooms are for the nuclear families. If it is compared of life a tent and a house, both share similarities in the arrangement of living units and the common area (Table 1).

Table 1. The comparison of the structure and use of tent and Traditional Turkish House based on Küçükerman [13].

Tent	House	Comparison
		<p>Comparison of life in a group of tents and rooms in house. There can be seen similarities between room units of house and tents with common area. a. common area, b. living units.</p>



Comparison of the general arrangement and use of the tent and the room.

1. Multi-purpose central area; eating, sleeping etc.
2. Periphery used for seating
3. Closed utility areas; cupboards, chests, bedding.
4. Heating. The central heath in the tent is moved to a side wall in the room.

The relationship between the individual tent and common area is the same as that between the rooms and the sofa. Moreover, there are also similarities between the use of the individual tent and the room, as it can be seen in Table 1. Multi-purpose central area, periphery used for sitting, closed utility areas that transform chests inward tent to cupboards in room. And of course the hearth of the tent and room is the same which is fire.

CONCLUSION

House is a place that has close relationships with culture. The expression of any cultural structure is the place where people choose to live and also the ways it is organized. It is known that traditional houses are the most obvious indicator when it comes to place of culture. What kind of environment people live in and how they live are both related with culture directly? In this paper we can see that house can be a dualistic structure that symbolizes basically man and woman as Berber House. And another point of view a house should negotiated with natural references like Chinese example. On the other hand, each of the Indonesian ethnic groups has a unique form of housing. It is the centre of the social and religious life of those living in houses. Tongkonan is regarded as not only a house from ancestors but also an ancestor itself. Due to cultural structure of living styles, Batak Toba house has only one room, no wall or separations inside. Bugis house in Malaysia also has no separations interior. The door of main entrance is lower than others in order to make the guests bending. Finally, it can be said about Turkish house that the house of a culture can show old habits and lifestyles.

As a result of this paper it can be said that if we take a glance at different culture of house type, we can see different kind of philosophy. The house can be related different things around us. Not only concrete things but also abstract. And this can be identified with culture itself. People of today is in need of feeling wholeness.

Feeling of wholeness might be created via house design that inspired by cultural codes.

REFERENCES

- [1] Westley, F., et al., Why systems of people and nature are not just social and ecological systems. In: Gunderson, LH and CS Holling (eds.). *Panarchy: Understanding Transformations in Human and Natural Systems*, 103-119, vol. /issue, 2002.
- [2] Marcus, C.C., *House as a mirror of self: Exploring the deeper meaning of home*. USA: Nicolas-Hays, Inc. pp, 2006,
- [3] Fellows, R. and A.M. Liu, Use and misuse of the concept of culture. *Construction Management and Economics*, vol. 31/issue 5, pp 401-422, 2013.
- [4] Throsby, D., Linking ecological and cultural sustainability. *The International Journal of Diversity in Organisations, Communities and Nations*, vol. 8/issue 1, pp 15-20, 2008.
- [5] Postalçı, İ.E. and G.F. Atay, Rethinking on Cultural Sustainability in Architecture: Projects of Behruz Çinici. *Sustainability*, vol. 11/issue 4, pp 1069, 2019.
- [6] Bourdieu, P., The Berber house or the world reversed. *Information (International Social Science Council)*, vol. 9/issue 2, pp 151-170, 1970.
- [7] Lipstadt, H., "To See, to Record, to Photograph": Discovering Pierre Bourdieu's Rediscovered Photographs of the Berber House, *Uncovering Architecture as an Intellectualist Art*. *Thresholds*, vol. /issue 27, pp 12-17, 2003.
- [8] Zhang, D., *Courtyard Housing and Cultural Sustainability: Theory, Practice and Product*. Farnham: Ashgate. pp, 2013,
- [9] Zhang, D., *Courtyard housing and cultural sustainability: theory, practice, and product*. Routledge. pp, 2016,
- [10] Beynon, D., Architecture, identity and cultural sustainability in contemporary Southeast Asian cities. *RIMA: Review of Indonesian and Malaysian Affairs*, vol. 44/issue 2, pp 179-208, 2010.
- [11] Hanan, H. *Sustainability of the Traditional Form of Batak House in Samosir Island*. *Indigenous Architecture as Basic Architectural Design*, 2010. 102-109.
- [12] Ismail, W.H.W., Cultural determinants in the design of Bugis houses. *Procedia-Social and Behavioral Sciences*, vol. 50/issue, pp 771-780, 2012.
- [13] Küçükerman, Ö., *Kendi Mekanının Arayışı İçinde Türk Evi*. 2. bs ed. İstanbul: Touring and Automobile Institution of Turkey. pp, 1985,