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Continuity of regional identity: A case study of facade elements in traditional Çeşme houses

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Abstract

A clear understanding of the meaning of sustainable conservation is crucial for cities and settlements. Sustainable conservation can be achieved by protecting the architectural identity of a region. The continuity of historic civic elements preserves the identity and image of cities and settlements. In this context, this study focuses on the importance of sustaining a settlement's identity. In doing so, changes in the architectural characteristics of the facades of the traditional houses in the Çeşme Castle Conservation Area were considered. Herein, the research methods include field study procedures to identify and analyze the area, and the building materials and facade elements characterize the continuity of regional identity. The results of this research show that architectural facade elements in traditional houses strongly emphasized the regional identity of Çeşme.

Keywords

Continuity of Çeşme identity, Çeşme houses, Facade elements, Regional identity, Traditional Çeşme houses.

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1. Introduction

Traditional buildings located in historical parts of the city are important in terms of cultural heritage. Conservation of these regions is a widely accepted responsibility for humankind; rebuilding these structures to meet today's demands is carefully guided by preservation principles and rules. Conservation of these original buildings in historical regions and the incorporation of similar details and building elements in new settlements is important to ensure continuity of regional identity.

Traditional Turkish houses developed over many centuries by the local Anatolians provide an interesting living environment. These houses in Izmir Çeşme have been the subjects of several studies. This paper initially describes the importance of sustainability of a region's identity and image. Next, the sustainability of traditional facade elements, a significant factor that shapes the identity of a region, is discussed. The study considered 19 registered buildings in the Çeşme Castle Conservation Area. Each building's unique facade materials and architectural elements were identified and reported.

2. Importance of the regional identity and its continuity

Identity is the phenomenon of perceiving a living thing or an object through visual, aural, or other senses and making it distinctive. In this sense, identity is the status of uniqueness, individuality, and originality among other living things and objects (Ertürk, 1996). Continuity of identity can be sustained through common memories, traditions, and mutual feelings. Thus, identity is a product of continuity and accumulation. The meanings, traditions, and dependencies that belong to identity coalesce around the concept of place (Morley and Robins, 1995).

Lynch (2012, p. 132) defines a city as a clustering and organization of meanings and relations that have occurred in the context of civilization. Regarding cities and regions, identity has an extensive definition that highlights its visual dimension and includes natural, geographical, and cultural components as well as social cultural life. Regional identity and associated images comprise several different natural and artificial components constituting environment and urban sociocultural features (Kiper, 2004).

Each region symbolizes a particular culture. According to Mumford (2013), a region or city is a symbolic world in its components and as a whole. Each part of the city has its own meaning; the parts convey a bigger picture. An important criterion that builds settlement identity is architecture. Architecture best reflects a city as it emerges within the interaction of social structure, habits, activities, and relations. Life models developed by cultures have laid the foundations of traditional architecture over time. The identity created by buildings can be perceived from several features. However, architectural identity develops in accordance with long-term environmental and building policies, materials and construction technologies, architectural styles, and behaviors and attitudes towards the environment (Oliver, 1998).

Cançelik (2014) emphasized that urban symbols include not only concrete or fixed forms, but also water, sounds, and lifestyles. Even past lives and events are in the scope of symbolic values. These urban values combine the past and future in our lives and imaginary worlds and concurrently lead us to spiritual worlds (Guénon, 2012b, p. 109, Cançelik, 2014, p. 31).

According to Ahunbay (2004), areas that carry traces of the past and comprise natural and cultural values are historical environments. Historical environments, with their traditional features, are tangible cultural components that document the continuity of the society, emphasize its identity, and form place memory. These environments also connect fragments of society together and to the local geography. Historical environments characterize their spaces with cultural, economic, and aesthetic values. This characterization becomes apparent in the identity of a region or a city. In the 21st century, a new consciousness of the historical environment has led to their perception as indispensable parts of urban culture. Decisions concerning the city have

Figure 1. *Çeşme Castle Conservation Area and registered buildings.*

considered new and old city centers, and the necessity to develop new methods for conservation has been widely acknowledged (Smith, 2001). For this reason, it is important to maintain the original features in regions and incorporate them into today's designs in order to achieve continuity in regional and urban identity.

To prevent regional identities in historical environments from disappearing and to integrate these historical areas with the developing region in a functional way, these areas must support the necessities of modern life. Presently, social changes cause differentiation of regional functions and changes in spatial structure. Widespread impacts of globalization affect identities of regions and cities, as well as our economic and social lives. Historical environments—reflecting lifestyles, building styles, and artistic sensitivities—do not adapt well to rapid consumption and technological development and have begun to disappear over time (Binan, 1999).

The use of traditional elements in facades is a motion to emphasize local identity and support historical environments in regions that have become monotonous. Traditional facade elements reflect characteristics of historical environments. Unique elements stemming from regional cultural life are observed in regions distinctively from other cities. The increased use of these elements makes historical urban identity more apparent.

A structure's identity is determined by its main characteristics and history. For this reason, necessary components that define its identity should be constructed accurately. According to Gindroz (2003), components that determine a structure's identity include mass composition, façade and color composition, construction materials, and landscape order. Gindroz (2003) considers facade and color composition as significant and rapidly perceived components emphasizing urban identity. In this context the rapidly perceived and emphasising component for Çeşme's urban identity is facade and colour composition in traditional structures.

3. Traditional Çeşme Houses and facade elements

3.1. Location and Brief History of Çeşme

Çeşme is a district in Izmir located in the southwest corner of the Karaburun Peninsula in the Aegean Region (Figure 1). It is 80 km from Izmir's city center via highway. The Çeşme district also borders the sea. The winter population of Çeşme is approximately 30,000–35,000, but the summer population rises to approximately 600,000 (upper- and middle-income tourist groups prefer to visit Çeşme in the summer).

The Çeşme region was one of the two harbors in Erythrai (Ildırı)—one of 12 ancient Ionian cities. During Ottoman times, the peninsula was continuously used as a naval base for military purposes. Bayezid II built the Çeşme Castle in the 16th century (1508). In the 19th century, Çeşme became a summer resort destination. After 1822, Muslim refugees settled in Çeşme. In the 20th century, settlements developed around the Çeşme Castle (Beyru, 1973).

Çeşme experienced social and physical changes attributable to the increased tourism in the 1950s and 1960s. During this time, the Ilıca coast was developed and settlements appeared along the northern coasts of Dalyan,

Şifne, Boyalık, Paşalimanı, Reisdere, and Germiyan villages. During the late 1970s and mid-1980s, summer housing density increased in Dalyanköy and Çiftlikköy (Master Plan and Report for Conservation Area of Çeşme Castle, 1:1000 scale).

The first master plan for Çeşme center was issued in 1951. In 1967, a master plan was prepared for the Ilıca region, and a subsequent master plan (1:25000 scale) was approved in 1984. The Ministry of Public Works and Settlement approved an environmental plan (1:25000 scale) in 1991 and the Çeşme Urban Area Master Development Plan (1:5000 scale) in 1992. In 1993, this Master Development Plan was applied in Ilıca, Dalyan, Ovacık, and Çiftlikköy The first decision to conserve the historical and natural beauty of the Karaburun Peninsula was made in 1992 by the Izmir Council of Primary Cultural and Natural Heritage Conservation. In 1995, the council designated most of the Çeşme Peninsula as a Natural and Archaeological Conservation Site. The Çeşme Castle Conservation Area and any streets requiring conservation were identified within the Çeşme urban site (Master Plan and Report for the Conservation Area of Çeşme Castle, 2006). As shown in Figure 2, the Çeşme Castle Conservation Area includes several registered monumental and civil buildings. These building are centrally located around the Çeşme Castle and along the coastal axis. Many were transformed into commercial buildings to support tourism. In commercially dense areas such as Inkilap Avenue, ground floors of buildings are used for commercial purposes. Squares and streets on and around Inkilap Avenue are known for busy commercial activities. In the streets behind Çeşme Castle, renovated buildings have replaced traditional Çeşme houses.

3.2. Çeşme Castle Conservation Area case study

The most important factor identifying Çeşme is the traditional housing architecture, which has survived until today. This architecture reflects the unique civil designs created by the Ottomans along the Aegean coasts. Houses built in the late 19th century reflect an architectural interaction of the Turkish–Greek population. During this time, most of the builders were Greek; consequently, Muslim houses look different from traditional Turkish houses (Kayın, 1990), And Çeşme houses include characteristics of traditional Turkish houses but impacts of Greek architecture are evident, particularly on the ground floors.

Buildings in central Çeşme were ad-

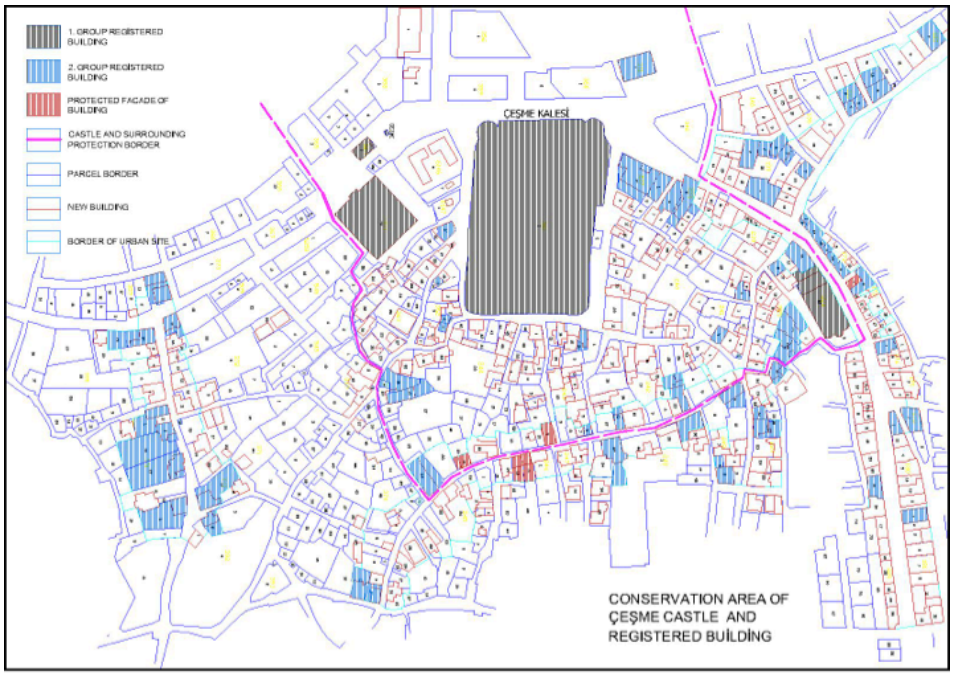

Figure 2. *Plan view of Çeşme Castle Conservation Area and registered buildings.*

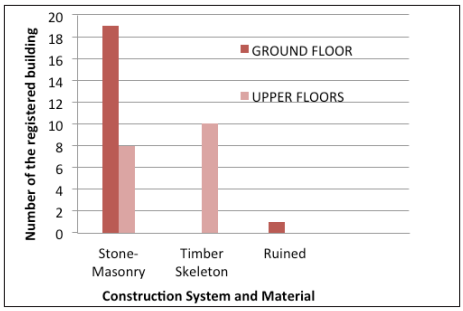

Figure 3. *Construction systems and materials for ground and upper floors.*

jacently constructed with back courtyards but no front gardens. House doors opened directly to the street. They were generally built as stone masonry or semi-stone masonry systems and constructed as two- or three- story buildings. As shown in Figure 3, ground floors were typically constructed of stone while upper floors were constructed of wood. Select buildings in the area had both ground and upper floors constructed primarily of stone material (Figure 4).

Stone masonry buildings were constructed with naturally acquired stones and mortar. In accordance with building heights in the area, one or two rows of wooden stretchers were used on certain levels to prevent bulging under the vertical load pressure. In buildings with stone ground floors and wood upper floors, a masonry system structure with a width of 0.50–0.60 m on the ground floors was observed. Upper floors were constructed using a wooden carcass system and mud brick sealants. Combined stone–wood buildings constitute approximately 50% of all buildings in the Çeşme Castle Conservation Area. In the stone–wood buildings, indoor partitions were built using the lath and plaster technique. On interior walls (15–18 cm thick), mud brick was used as covering material.

Figure 4. *Masonry and wood carcass construction systems.*

Figure 5. *New buildings in the central Çeşme Castle Conservation Area.*

Figure 6. *Facade elements of traditional Çeşme houses.*

In some buildings, kitchens and toilets are located in the courtyard instead of indoors. Gable or hip roof types constructed using mission (Ottoman) tile were common.

Presently, new buildings are being constructed in the central Çeşme Castle Conservation Area. As shown in Figure 5, some of the new structures reflect traditional building designs, and some do not. Compatibility in the architectural facade elements of these buildings is important for continuity of regional identity.

3.2.1. Architectural facade elements in traditional Çeşme houses

In buildings that constitute traditional housing structures in Çeşme, the most highlighted and rapidly perceived feature for Çeşme regional identity is facade and color composition. As illustrated in Figure 6, the main components that constitute facade and color composition in traditional Çeşme houses are triangle pediment, windows, shutters, window jambs, doors and courtyard doors, window board sunshades, and mouldings.

Triangle Pediments

Triangle pediments are observed on stone masonry buildings and are one of the most important building elements in facades of traditional Çeşme houses. Figure 7 depicts typical designs. Symmetrical or baroque decorations may be present in the middle of triangle pediments. Kirpi saçak (a Seljuk and

Figure 7. *Triangle pediment examples on traditional Çeşme houses.*

Ottoman type of fringe) is often located under triangle pediments. As shown in Figure 8, stone masonry buildings with triangle pediments constitute approximately 60% of all buildings in the Çeşme Castle Conservation Area.

Windows and Window Jambs

In traditional Çeşme houses, windows are another important architectural element. With rectangular or arched forms, they add identity to the flat or bay-windowed facades of the buildings. As shown in Figure 9, rectangular upper floor windows had a 1:2 ratio, consistent with traditional Turkish designs. They are made of wood; some have double casements. Select houses contained window sections that did not open upwards. Guillotine windows were also observed in some houses.

In stone masonry systems, windows were located at least 100 cm from building corners. On upper floors, windows were often rectangular, typically 80 cm wide and 160 cm high. As shown in Figure 10, ground floor windows were rectangular or arched (round, segmental) with a ratio of 1:1.5. In select stone masonry buildings, round motif decorations were observed on top of the rectangular windows. Figure 11 (a–b) shows the window characteristics for the ground and upper floors, respectively.

Referring to Figure 11(a–b), the ground floors mostly included rectangular windows with arches (1:1.5 ratio), and the upper floors included rectangular windows without arches (1:2 ratio). This prevalence was observed in both stone masonry and stone masonry-wood carcass buildings.

Window jamb is another important facade element in traditional Çeşme houses. In an authentic Çeşme house facade, stone window jambs were constructed using stone or fragmented stones. However, in stone–wood houses, the window jambs were made from wood on the upper floors.

Window jambs were typically 15–20 cm wide. Ground floors frequently included arched stone window jambs, while upper floors included rectangular wooden window jambs. Figure 12(a–b) shows the window jamb char-

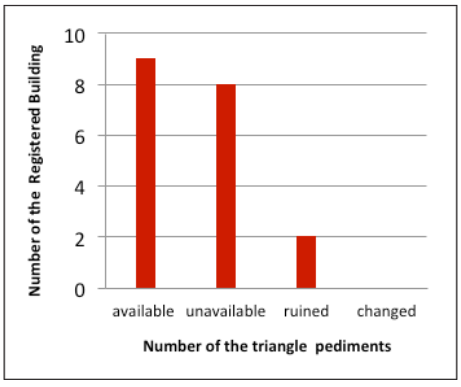

Figure 8. *Triangle pediment prevalence in 19 registered buildings.*

Figure 9. *Upper floor 1:2 window ratio.*

Figure 10. *Ground floor 1:1.5 window ratio with arch.*

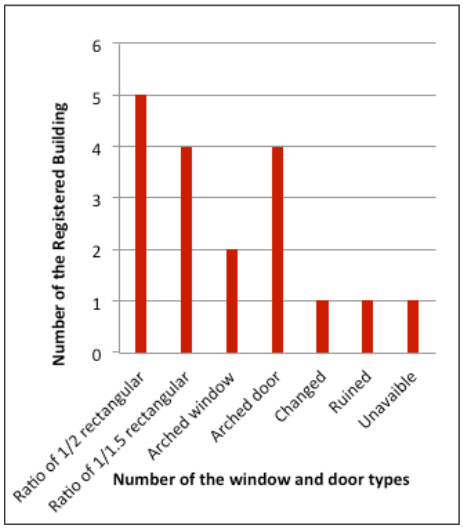

Figure 11a. *Ground floor window and door characteristics and prevalence.*

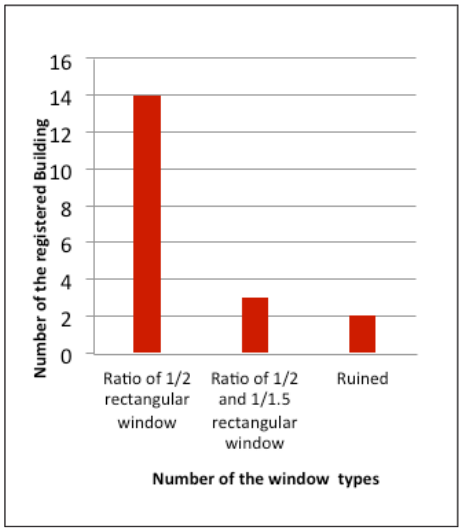

Figure 11b. *Upper floor window characteristics and prevalence.*

acteristics for ground and upper floors, respectively. Stone window jambs were generally made from andesite—a type of volcanic rock. Recent 20th century buildings include plaster and concrete window jambs.

Ground floors of select houses in the Çeşme Castle Conservation Area were built for commercial purposes. Ground floors of this type typically include double leaf wooden doors and may include segmental arched stone jambs. Figure 13 shows a typical design.

Sunshades, Window Board Mouldings, and Shutters

As shown in Figure 14, several traditional Çeşme houses have window sunshades and window board mouldings. These sunshades and mouldings provide decorative features on facades but also function to reduce the intensive sunlight entering the building. Wooden sunshades or board mouldings were observed in wooden carcass buildings. Sunshades or board mouldings in stone masonry buildings were made from stone or bricks. Window board mouldings wide can be made from stone, plaster over bricks, or wood (up to 10 cm wide). Window sunshades can be made from stone, metal, or wood. Wooden window sunshades can be up to 10 cm wide, while stone and metal sunshades and be 15–25 cm wide.

Window shutter prevalence

Window shutters on traditional houses in the Çeşme Castle Conservation Area are one of the most interesting building elements. The hot and sunny climate in the region requires

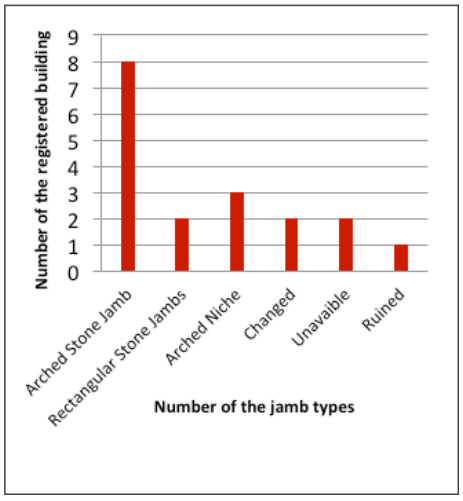

Figure 12a. *Ground floor window jamb characteristics and prevalence.*

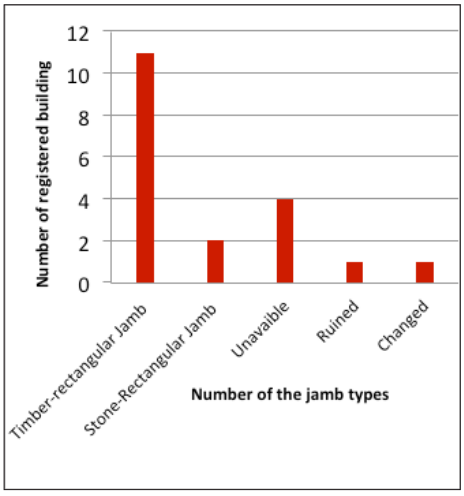

Figure 12b. *Upper floor window jamb characteristics and prevalence.*

Figure 13. *Mixed commercial and residential function in a traditional house.*

Figure 14. *Traditional window sunshades and window board mouldings.*

shutters. Shutters can be constructed from wood or iron and were frequently observed to be painted blue. Shutters are located on the sides of windows; sunshades are placed over windows. Contemporary shutters are observed on newly built building facades, as well as select registered buildings in study area. Figure 15(a–b) shows the prevalence of window sunshades/board mouldings and shutters, respectively.

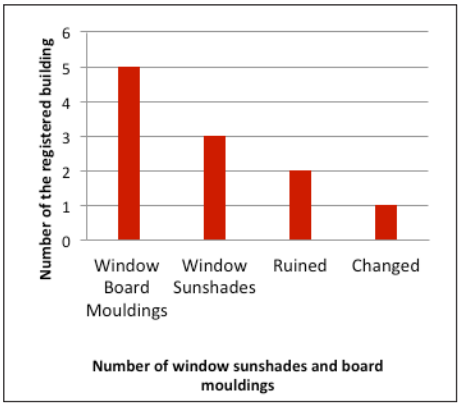

Figure 15a. *Window sunshade and board moulding prevalence.*

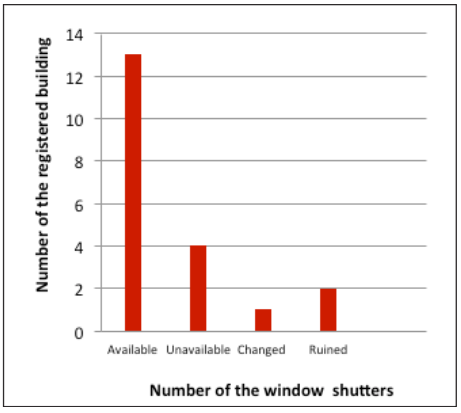

Figure 15b. *Window shutter prevalence.*

Building and Courtyard Doors

Doors in traditional houses in the Çeşme Castle Conservation Area were made of wood with decorations and knockers. Most were double leaf doors although single doors were also observed. Only one side of the double leaf door was used; use of both doors was reserved for special occasions or necessary situations. Doors open to stairs or to the street directly. Doors can be decorated barred windows and include stone jambs over or around doors. The door height was 220 cm and the door width was 100 cm for single doors and 55–60 cm per door for double leaf doors. Doors may also be decorated with laths and engravings. Figure 16 shows examples of various traditional entrance doors.

On large parcels, garden doors were located on the edge of courtyards at the street level. In modest houses, wooden doors were located in doorways with no doorframes. In elaborate buildings, stone doorframes (at least 24 cm wide) were built around courtyard entrance doors. Courtyard doors can include arches that are round, bucket, Roman, or Gothic style. Courtyard doors were commonly double leaf and wooden to allow vehicle or pack animal passage. Figure 17 shows examples of various traditional courtyard doors.

In newly constructed Çeşme buildings, entrance doors are 100 cm wide and 220 cm high. Larger, double leaf doors in traditional houses are no longer used. Courtyard entrance doors are also different in new houses. New houses in Çeşme are often located in gated communities; courtyard entrance doors are no longer needed. In

Figure 16. *Traditional entrance doors.*

Figure 17. *Traditional courtyard doors.*

traditional houses, humans and pack animals passed through courtyard doors. Today, outside of gated communities, these doors offer protection of a parcel's borders.

Oriels, Outbuildings, and Balconies

Oriels, outbuildings, and balconies in traditional houses in Çeşme's Castle Conservation Area are additional significant facade elements. A traditional house can have only one oriel, outbuilding, and balcony; some have a combination of several features. Oriels in traditional Çeşme houses can be built of stone; in combination stone-wood houses, oriels can be semi-stone. Oriels have windows on all three sides and extend toward the street. Figure 18 shows examples of various traditional oriels.

Three types of oriels exist in traditional Çeşme houses: single centered, single sided, and double sided. All are made from wood. In select houses, oriels can be located on the second or third floors. If their width is greater or equal to 150 cm, wooden or iron buttresses must support the oriels.

Outbuildings in traditional Çeşme houses are made from stone or wood and can cover the entire facade. Stone outbuildings in stone masonry houses extend 30–40 cm into the street and are supported by iron buttresses. Wooden outbuildings extend into the street. An outbuilding transforms the room shape from square to rectangular. This feature is common in traditional Turkish houses. Figure 18, presented previously, includes examples of various traditional outbuildings.

Balconies were observed in both stone and combination stone-wood buildings, often centered on the building but also located to the side. Iron and decorated parapets on balconies are prominent characteristics of traditional Çeşme architecture. Wrought iron buttresses often support balconies. Houses can have a single middle balcony, a single side balcony, or a double side balcony depending on their facade. Figure 19 shows examples of various traditional balconies. Figure 20 shows the prevalence of oriels, outbuildings, and balconies in the study area.

As shown in Figures 21 and 22, many traditional facade elements of the 19 registered buildings considered in this study were badly damaged or deteriorated and approximately 40% have lost their originality (i.e., are not

Figure 18. *Traditional oriels and outbuildings.*

Figure 19. *Traditional balconies.*

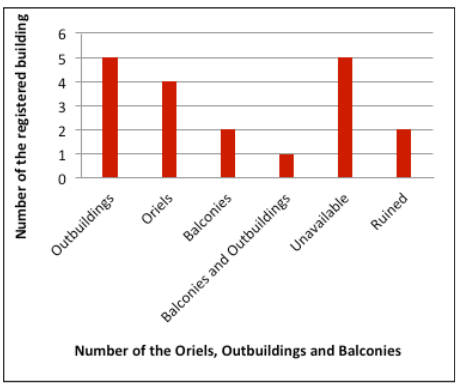

Figure 20. *Oriel, outbuilding, and balcony prevalence.*

Figure 21. *Damaged facades in traditional houses.*

as originally constructed). Nonetheless, unique triangle pediments; windows and door designs; sunshades, mouldings, and shutters; and, oriels, outbuildings, and balconies remain as features on the traditional Çeşme facade. In addition, these facade elements were often observed on non-registered buildings in the study area.

4. Conclusions

New structures in historical parts of Turkish cities are incompatible with the structural and spatial identity of traditional architecture and do not reflect features of sustainability. Historical building components constitute a significant part of cultural heritage. The conservation of Çeşme urban heritage is only possible through the preservation of historical buildings.

Çeşme has housed many monumental and civil architectural buildings; today, only a few remain. Monumental and civil architectural elements are major factors for determining and supporting the identity of a settlement. Traditional Çeşme housing and facade elements also support settlement identity. Building materials used in traditional houses and prominent facade elements are among the most interesting and remarkable visual images (The Urban Design Handbook, 2003).

In this study, building materials and facade elements for 19 registered houses in the Çeşme Castle Conservation Area were investigated. Building materials were original in all but six of these houses. Window and door ratios in these buildings changed over time; window frames, doorframes and shutters were removed and damaged. Only 12 houses maintained their original building materials. Upper floors of two registered buildings were completely demolished; lower floors were considerably damaged.

The ground floors of most registered houses were constructed using a stone masonry system, while upper floors were built using wooden carcass methods filled with mud bricks. Many of the buildings included triangle pediments, windows with a 1:2 ratio, windows with arches (1:1.5 ratio), door and window jambs, shutters, sunshades, oriels, outbuildings, and balconies.

In conclusion, this study confirmed that select new housing structures in the study area were incompatible with the structural and visual identity of traditional Çeşme architecture. In this context, all data regarding traditional houses should be used to benefit new house construction in and surrounding Çeşme's urban site. Materials and prevalence of facade elements (triangle pediments; windows and door designs; sunshades, mouldings, and shutters; and oriels, outbuildings, and

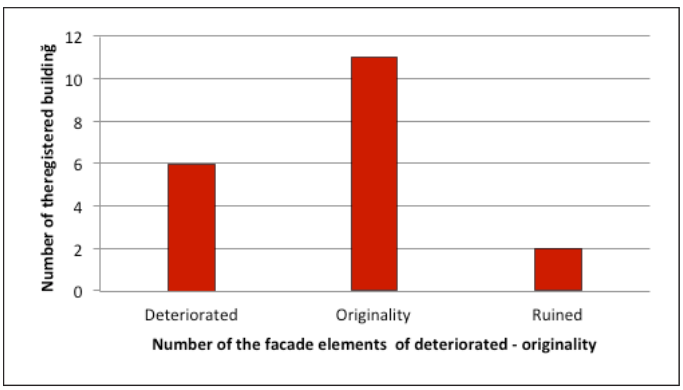

Figure 22. *Deterioration and originality prevalence of facade elements.*

balconies) are important components for determining the identity of traditional Çeşme houses. Registered buildings in the Çeşme Castle Conservation Area had a high prevalence of unique facade elements. For this reason, these traditional facade elements should be preserved in existing buildings and incorporated in new structures to sustain the identity in and surrounding Çeşme's urban site.

References

Abdelmonem, M. and Selim, G., (2012). "Architecture, memory and historical continuity in Old Cairo", The Journal Of Architecture, 17-2: 163-189, doi: 10.1080/13602365.2012.678634

Ahunbay, Z., (2004). Tarihi Çevre Koruma ve Restorasyon, Yem Yayın, İstanbul.

Bevan, R., (2006). The Destruction Of Memory, Reaktion, London.

Beyru, R., (1973), 19. Yüzyılda İzmir Kenti , İzmir: Literatür Yayınları.

Binan, C., (1999). Mimari Koruma Alanında Venedik Tüzüğü'nden Günümüze Düşünsel Gelişmenin Uluslararası Evrim Süreci, Yıldız Teknik Üniversitesi Basım-Yayın Merkezi, İstanbul, 116.

Cançelik, A., (2014). "Şehirler Ve Semboller", Şehir Üzerine Düşünçeler- I, Esenler Belediyesi Şehir Düşünce Merkezi Şehir Yayınları, İlbey Matbaa, İstanbul.

Çeşme Central Castle Conservation Zone and Implementary Master Plan Report for Conservation of Urban Protected Area with 1/1000 scale, http://www.cesmebelediyesi.com

Emeklí, G. and Soykan, F., (2008). Prospects For Rural Cultural Tourism In Turkey: Case Study Of Karaburun, Natural Environment and Culture In The Mediterranean Region, pp. 347-361(15), Cambridge Scholars Publishing İn Association With Gse Research, UK.

Erdönmez, E., (2014). " Kenti Bir Kamu Alanı Olarak Okumak", Şehir Üzerine Düşünceler- I, Esenler Belediyesi Şehir Düşünce Merkezi Şehir Yayınları, İlbey Matbaa, İstanbul.

Ertürk, T., (1996). Şehir Kimliği: Amasya Örneği, Yüksek Lisans Tezi, İtü Fen Bilimleri Enstitüsü, İstanbul.

Eyüce, A., (2007). Learning From The Vernacular: Sustainable Planning And Design, Open House International, December, 32:4.

Gindroz, R., (2003). The Urban Design Handbook, W.W. Norton & Company Ltd, Newyork.

Kayın, E., (1990). Ege'de Zaman ve Mekan, "Çeşme'de Geleneksel Konut Mimarisi, Konsollor, Kapılar, Pencereler", Ege Mimarlık 37, İzmir.

Kiper, P., (2004). "Küreselleşme Sürecinde Kentlerimize Giren Yeni Tüketim Mekanları ve Yitirilen Kent Kimlikleri", Planlama, Journal Of The Chamber Of City Planners, Http://Www.Spo.Org.Tr/Resimler/Ekler/31c83db8d2ff01b_Ek.Pdf

Krier, R., (1983). Elements of Architecture, Architectural Design, USA

Lynch, K., (2012). Kent İmgesi, (Çev. Başaran, İ.), Türkiye İşbankası Yayınları İstanbul.

Mumford L., (2013). Tarih Boyunca Kent, Kökenleri, Geçirdiği Dönüşümler ve Geleceği (Çev. Koca, G., Tosun, T.), Ayrıntı Yayınları, İstanbul.

Morley, D. and Robins K., (1995). Spaces of Identity: Global Media, Electronic Landscapes and Cultural Boundaries , Routledge, 105-124.

Nora, P., (1989). 'Between memory and history: les lieux de mémoire', Representations, 26.

Oliver, P., (1998). Enc. Vernacular Architecture Of The World, Cambridge Univ. Press, Vol. I, UK.

Rapoport, A., (1969). House Form And Culture, Prentice Hall, Englewood Cliffs Nj.

Rapoport, A., (1994). Sustainability, Meaning and Traditional Environments, Berkeley Center For Environmental Design Research, University Of California, Traditional Dwellings And Settlements Working Papers, 75: 75-94.

Rapoport, A., (2000). "Theory, Culture and Housing," Housing, Theory And Society, Vol. 17, No. 4, 145-165.

Rosenfeld, G. D., (2000). Munich and Memory: Architecture, Monuments And The Legacy Of The Third Reich, California University Press, London.

http://www.izka.org.tr/files/planlama/3_ilce_ calismalari/