



A NEW LANDSCAPE DESIGN SUGGESTION FOR THE ENVIRONMENT OF TRABZON OLD BUS-STATION

Tuğba DÜZENLİ* **Duygu AKYOL KUYUMCUOĞLU**** **Elif Merve ALPAK*****

*Assoc. Prof., Department of Landscape Architecture, Faculty of Forestry, Karadeniz Technical University, tugbaduzenli@gmail.com

**Res. Asst., Department of Landscape Architecture, Faculty of Forestry, Karadeniz Technical University, duyguakyol@ktu.edu.tr

***Assoc. Prof., Department of Landscape Architecture, Faculty of Forestry, Karadeniz Technical University, elifmervealpak@gmail.com

Received Date: 10.02.2023 Revised Date: 05.05.2023 Accepted Date: 10.05.2023

Copyright © 2023 Tuğba DÜZENLİ, Duygu AKYOL KUYUMCUOĞLU, Elif Merve ALPAK. This is an open access article distributed under the Eurasian Academy of Sciences License, which permits unrestricted use, distribution, and reproduction in any medium, provided the original work is properly cited.

ABSTRACT

Bus stations are important places that have formed the backbone of transportation for decades for our country, which, unlike many countries in the world, has stayed away from airplanes for socio-economic reasons, railway transportation due to investment costs, and sea transportation for geographical reasons. Trabzon Bus Terminal was put into service in 1990 and has always been a very busy place due to the importance of transportation in the city. The building, which has many restaurants, shops, bus operation counters, custodial offices and cargo workers in and around it, has served as a wedding hall for a long time and has taken its place in the memories. Today, it is expected that the existing 20-decare land of the terminal, which will be moved due to its unsuitable appearance and no longer meeting the needs of Trabzon, will be evaluated as a social area that will meet the needs of the city. After the new bus station in Trabzon will be moved to its new location in 2023, how the existing area will be evaluated is on the agenda of the designers and planners. In this study, it is aimed to shed light on the designs by examining the landscape design project process proposed for this area.

Keywords: Bus Station, Landscape Design, Environmental Design Project

TRABZON ESKİ OTOGAR BİNASI ÇEVRESİNE YENİ PEYZAJ TASARIM ÖNERİSİ

ÖZET

Otogarlar, dünyanın birçok ülkesinden farklı olarak, sosyo-ekonomik gerekçelerle uçaklardan, yatırım maliyetleri nedeniyle demiryolu ulaşımından, coğrafi gerekçelerle deniz yolu ulaşımından uzak durmuş ülkemiz için onlarca yıldır ulaşımın omurgasını oluşturmuş önemli yerlerdir. Trabzon Otogarı, 1990 yılında hizmete açılmış ve kentin sahip olduğu ulaşım konusundaki öneme bağlı olarak her daim çok yoğun kullanılan bir yer olmuştur. İçerisinde ve çevresinde birçok restoran, dükkan, otobüs işletme girişleri, emanet ofisi, kargocular bulunan yapı, uzunca bir süre nikah salonu olarak hizmet vererek de anılarda yer edinmiştir. Günümüzde ise Trabzon'a yakışmayan görüntüsü ve artık ihtiyacı karşılamaması sebebiyle taşınacak olan terminalin mevcut 20 dönümlük arazisinin, kentin ihtiyaçlarını karşılayacak sosyal bir alan olarak değerlendirilmesi beklenmektedir. Trabzon'da yeni otogarın 2023 yılında yeni yerine taşınacak olmasının ardından mevcut alanın nasıl değerlendirileceği tasarım ve plançaların gündemindedir. Bu çalışmada da bu alan için önerilen peyzaj tasarım projesi süreci incelenerek, tasarımlara ışık tutmak amaçlanmıştır.

Anahtar Kelimeler: Otogar, Peyzaj Tasarım, Çevre Tasarım Proje



1. INTRODUCTION

The term terminal, which is defined as 'the place where vehicles such as buses and planes first pick up or leave their passengers' in the dictionary of the Turkish Language Association, is a term that comes from English. The term bus station, which comes from French, is defined as 'a facility, garage, arranged to meet heavy tonnage vehicles used in both public transport and freight transport' in Larousse. There are various differences in the usage areas of these two concepts, which are defined differently. Although the concept of bus station is mainly used in road passenger transportation, the use of the terminal concept also includes the airline (Arsal, 2004).

It bus stations are important areas that serve the whole city, which can cause great effects in the urban structure. Today, the share of road transport, including buses, in our country's passenger transport is at the level of 95%. In line with the transportation policies adopted since the 1950s, the highway system was fed unilaterally. Alternative transportation systems were neglected and land transportation was encouraged. However, an organized system that does not disturb the city has not been developed for the rapidly growing road transport, just like railway, sea and air transport.

Accordingly, all elements of the road passenger transport system and, in this context, bus terminals must be carefully planned. The purpose of building bus terminals in cities is to organize passenger arrivals and departures in an order and discipline, and by providing all kinds of easy wages for shopping, food, communication and rest. It is to keep the negative effects of vehicles to a minimum on urban traffic. It allows passengers to reach bus stations and terminals as easily, cheaply, quickly and safely as possible. Ensuring access and ensuring that the arriving passengers are dispersed in the same way are the objectives that should be considered by the institutions and persons responsible for the provision of the service (Çetiner et al., 1994).

In addition to being the places where passengers get off and on, intercity bus stations also include a wide variety of functions and gain a new conceptual content. Areas such as shopping malls, restaurants, hotels, entertainment and exhibition areas, where people's daily needs will be met, are also planned at the bus terminals, making them a meeting center in terms of urban.

There is a reciprocal relationship between bus stations and cities, and in parallel with urban development and in line with various needs, bus stations have also undergone formal and functional changes. The comfort level of the buses that carry passengers between cities, which are getting more and more modern, has increased (Çubuk, 1993). In vehicles, comfort is increased in various aspects such as ventilation, lighting, heating and comfortable seating, which increases the attractiveness of vehicles. The bus industry, the road passenger transport system and the bus industry have an important role in this interaction. The developments in the bus industry are mutually reflected in road passenger transportation, and bus stations are also affected by these developments.

2. TRABZON OLD BUS TERMINAL

It is understood from the minutes of the Assembly that the first negotiations regarding the Municipal Bus Terminal were held in 1962. According to the parliamentary report on the subject, the terminal building was not considered in the city development plan. The first zoning plan of Trabzon after the Republic was made by the French Lambert in 1939 and the plan was accepted in the municipal council in 1941 with the accompanying discussions. The reflection of the issue in the city council in 1962 was as follows:



“As you know, there are about 9-10 auto establishments serving out of town in our town and they are formed in random places with their non-technical construction and qualifications. It is a known fact that this situation is objectionable both in terms of urban safety and traffic and aesthetically” (URL 1).

In the parliamentary debates of 1965, it was stated that the construction of a public garage had become a great need in the country, and it was stated that the motor vehicles of that day were disrupting the traffic, and it was stated that all streets and streets had turned into truck and bus garages. Considering that the Cement factory would start operating in 1967, it was thought that the land sold for the prison could be taken back to be used for this purpose, by saying, "We have to think about tomorrow today," with the estimate that between 200-300 trucks will enter and exit the city per day. Upon the decision to abandon the construction of a prison on the land sold to the Treasury by the municipality to build a prison in Değirmendere, it was decided to build a city terminal in the said area. “In order to build a prison in Değirmendere, it is planned to buy the land sold by the Municipality to the Treasury and build a public garage and terminal building here. At the end of the meeting with the Chief Public Prosecutor's Office, it was reported that the construction permit could not be granted since the place where the prison is planned to be built is located within the industrial zone. The land in Bahçecik Neighborhood, which was determined at the end of the communication made by the Ministry, was expropriated to be built as a prison. In this way, there is a necessity to build a terminal and a public garage building in the prison area by going for the exchange of places”. In 1972, during the period of Mayor Suat Oyman, it was decided to build the Municipality Terminal in Değirmendere in order to transfer the bus terminals to Değirmendere. Terminal construction started in 1973 and was completed in 1974 (Figure 1).



Figure 1: View of the Old Bus Station Building and its surroundings

However, the terminal located in Değirmendere today is not the terminal built in 1974. Because, after the old terminal served for 14 years, Trabzon Municipality built a new terminal in the same area in 1987, during the Orhan Karakullukçu period, with the İller Bank Project. Today, the Değirmendere Terminal has completed its life. Because Trabzon Metropolitan Municipality has started the construction of a new terminal on the Trabzon-Maçka highway for the new Terminal. So, as of today, it is time to relocate the terminal. Trabzon Bus Terminal was put into service in 1990 and has always been a very busy place due to the importance of transportation in the city. The building, which has many restaurants, shops, bus operation counters, custodial office, cargo workers and wash basins in and around it, has served as a wedding hall for a long time and has taken its place in the



memories (URL 1). While the urban fabric in its vicinity served mixed commercial and residential functions 20 years ago, with the change experienced in this period, today it has mixed with commercial functions such as small auto repair and spare parts; Small tradesmen, such as ironwork and glasswork, have also become common as you go down to the south.

The use of the area at night is very limited and close to zero, especially in narrow streets, the risk of security weakness can be observed strikingly. It is expected that the existing 20-decare land of the terminal, which will be moved due to its unsuitable appearance and no longer meeting the needs of Trabzon, will be used as a social area that will meet the needs of the city. After the new bus station in Trabzon will be moved to its new location in 2023, how the existing area will be evaluated is on the agenda of the designers and planners. Due to the density of buildings that do not suit the city center and the plans to move the industry from the region in the coming years, the idea of not using the existing area as a commercial area that will create a high-rise building and evaluating it as a social area comes to the fore.

This area was considered as a study area in Environmental Design Project 5, one of the 3rd year courses of the Department of Landscape Architecture at Karadeniz Technical University (KTU). In this study, new landscape design projects introduced in this course are examined. In the process, it is expected that the Trabzon Bus Terminal building will be re-functionalized by preserving its current structure, and landscape design solutions that include different functions that will reveal its location, problems and potential, meet the recreational and social needs of the city users, and take into account its importance in the city memory.

3. PROCESS OF ENVIRONMENTAL DESIGN PROJECT

In KTU Landscape Architecture Environmental Design Project Course, students were given the old bus station building and its surroundings as a study area (Figure 2). First, scaled maps containing the existing physical elements in the project area were obtained and used in all later stages of the design.



Figure 2: Study Area



Then, the missing data were transferred to the base map with on-site observations and examinations in the area. With the survey, information and documents related to the field were collected (Düzenli et al., 2018; Yılmaz,2015; Bayramoğlu and Seyhan, 2021; Kurdoğlu et al., 2022). The information collected within the scope of the fieldwork was obtained by traveling, viewing and observing the area and carefully recording it. In this context, the following criteria were examined in the light of the purpose of the study;

1) Natural Landscape Values

- Climate (precipitation, temperature, humidity, wind, light)
- Physiographic features (slope, aspect, elevation, geomorphology)
- Soil characteristics (soil type, depth, ph, nutrient, fertility)
- Vegetation
- Side panels

2) Cultural Landscape Values

- Circulation (road parking lot, bridge, square, entrance)
- Existing buildings (housing, mosque, hospital, public institutions, school)
- Other structures (children's playgrounds, sports field, recreation area)
- Accessories (Camellia, sitting element, garbage lighting)
- Underground elements (sewage, water, electricity, natural gas, telephone)

3) Perceptual Landscape Values

- Visual (dominant view, vantage point, focal point, undesirable view)
- Auditory (noise)
- Scent

The next step is space analysis. Key strategies and clues have been identified on how the design solution can be tailored to the specific conditions of the project area. Analysis in landscape design depends on a thorough and thorough examination of the circulation, landscape, characteristics, problems and potentials of the project area. The expressions in the field analysis are aimed to emphasize decision and action. In this context, the study was carried out step by step in the light of the following criteria;

1. Problem analysis (transport and circulation, field plastic, reinforcement problems, spatial problems)
2. Design potentials of existing spaces and elements:
 - At the spatial level: competence, functionality, diversity, aesthetics
 - At reinforcement level: available, replaceable, removable
 - At the plant level: Absolute will be preserved, relocated, maintained, ignored
3. User profile
4. Silhouette analysis

The next stage is Activity Analysis. Activity lists determined in accordance with the user-need-activity relationship necessary for the creation of the design solution were prepared and supported with visuals.

Identified activities; The scenario was developed by constructing the diagrams created in accordance with the functions and relations, then the conceptual plan related to



the field analysis. In parallel with this developed scenario, design options were produced, one of them was selected and the selected design product was detailed. The final design plan is the last of all these design stages. It is largely completed. This plan includes spaces designed for events, contours, elevation inscriptions, place names, stairs, ramps and fittings, circulation elements. This stage also includes the planting process. The planting project consists of cross-section, three-dimensional and perspective drawings as well as the plan drawing. And the process is complete.

4. EXAMINATION OF THE PROJECT PROCESS

In this section, all stages of a student project developed within the scope of the course were examined. The conceptual approach has been chosen as "stamina", which means endurance, life force. Increasing the resilience of people by making use of nature and supporting energy sustainability have been the target of the project. It is aimed to increase the activity areas by revitalizing the existing area with green texture. Related concepts were determined and concept visualization was presented (Figure 3).



Figure 3: Conceptual approach

Then, the vision study on the field mat was discussed (Figure 4). The place, the formation of the space, the spatial organization, the green hard ground balance are presented in terms of form. Radial movements were preferred in the area, and the relationship between the building and the green roof was highlighted.

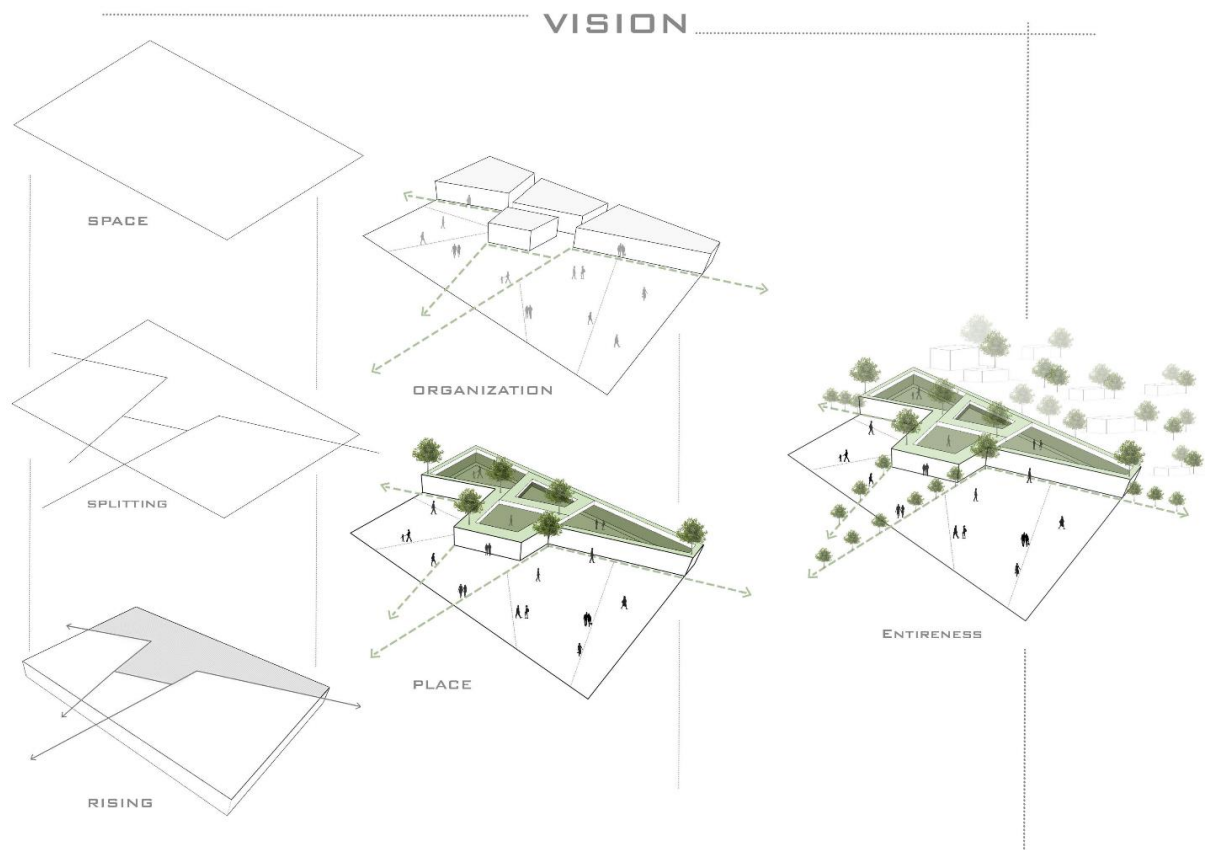


Figure 4: Examination of the vision

Later, while designing the study area, an space analysis was made in accordance with the formal approach by examining which points of the city to be associated with (Figure 5). Relationship points to be established with trade, recreation, tourism and social life have been determined.

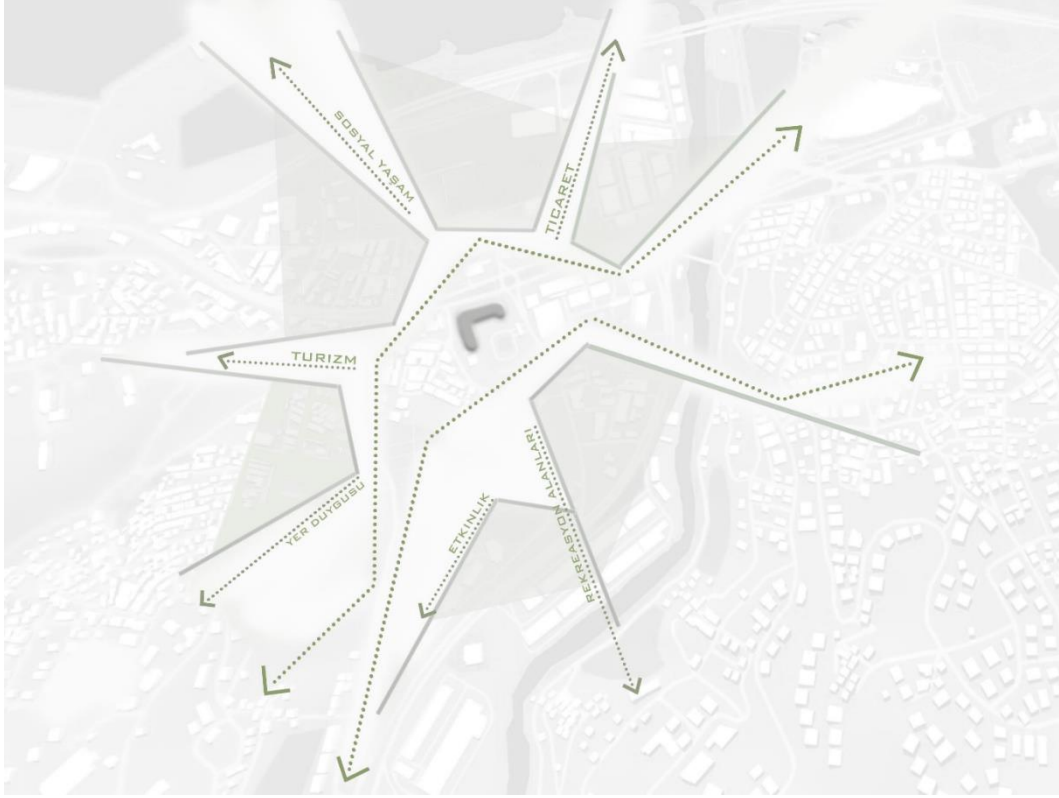


Figure 5: Space analysis

The next stage was the use of space (Figure 6). First, the circulation was determined, then the main decisions were made for the hard ground and soft ground. Green texture and water element use decisions are also part of this process.

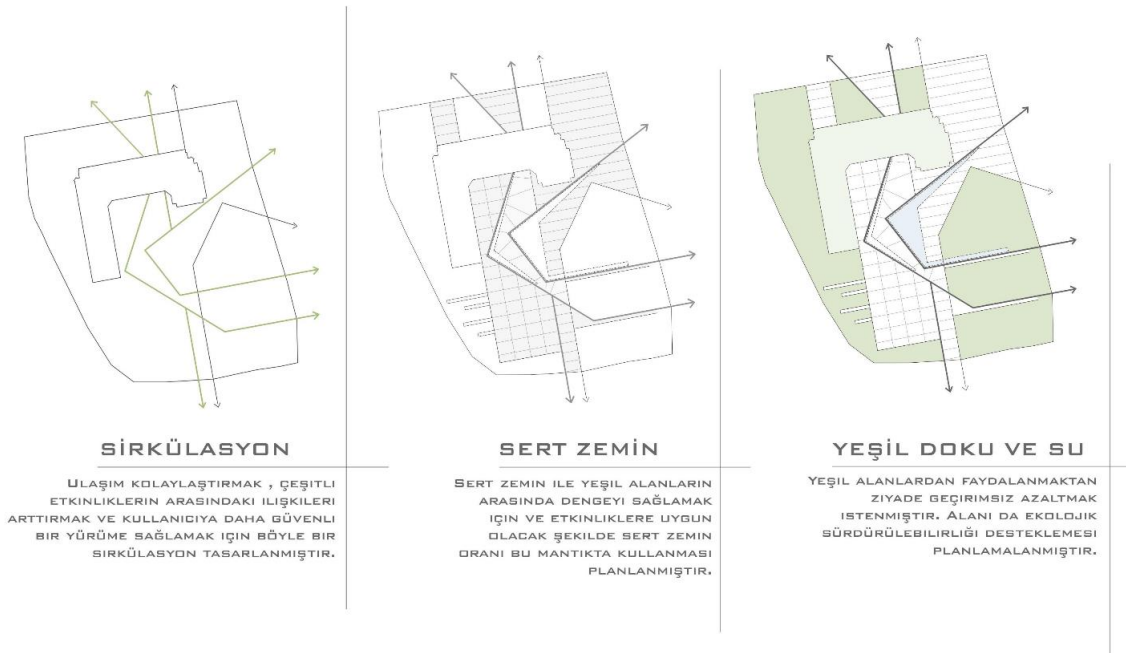


Figure 6: Land use process



The next step was synthesis. (Fig. 7). Now the outline of the design and the differences in hard flooring have been determined. The locations of the activity areas were determined and indicated in the plan.

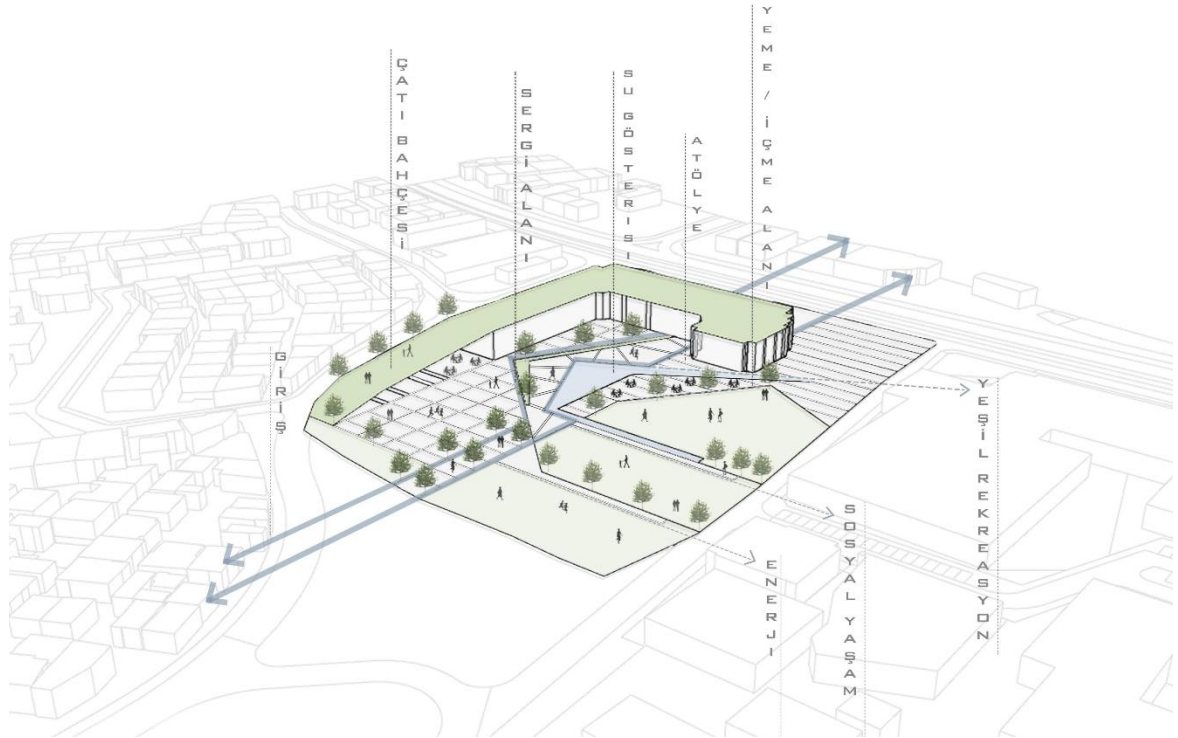


Figure 7: Synthesis step

Scenarios were created for the activities determined in the next step (Figure 8). And these are marked on the plan.

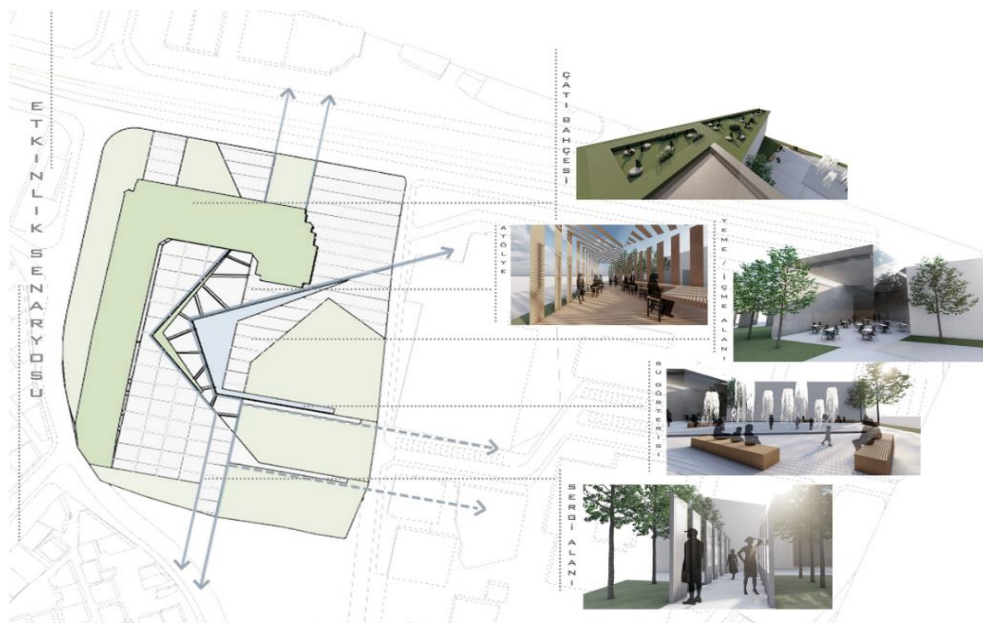


Figure 8: Activity scenarios



In the next stage, the technical plan (Figure 9) was completed with reinforcement, flooring and planting.



YAPRAKLI BİTKİLER					İÇNE YAPRAKLI					AĞAÇÇIKLAR VE ÇALILAR					YER ÖRTÜCÜLER				
NO	İSİMİ	TEKNOLOJİ	YERİ	ADETİ	NO	İSİMİ	TEKNOLOJİ	YERİ	ADETİ	NO	İSİMİ	TEKNOLOJİ	YERİ	ADETİ	NO	İSİMİ	TEKNOLOJİ	YERİ	ADETİ
1	1	...	...	...	...	1	...	...	...	...	1	...	...	...	...
2	2	...	...	...	...	2	...	...	...	...	2	...	...	...	...
3	3	...	...	...	...	3	...	...	...	...	3	...	...	...	...
4	4	...	...	...	...	4	...	...	...	...	4	...	...	...	...
5	5	...	...	...	...	5	...	...	...	...	5	...	...	...	...
6	6	...	...	...	...	6	...	...	...	...	6	...	...	...	...
7	7	...	...	...	...	7	...	...	...	...	7	...	...	...	...
8	8	...	...	...	...	8	...	...	...	...	8	...	...	...	...
9	9	...	...	...	...	9	...	...	...	...	9	...	...	...	...
10	10	...	...	...	...	10	...	...	...	...	10	...	...	...	...

Figure 9: Technical planting plan

In the next stage, the details of a part were taken and examined (Figure 10).



D1
0:1/50

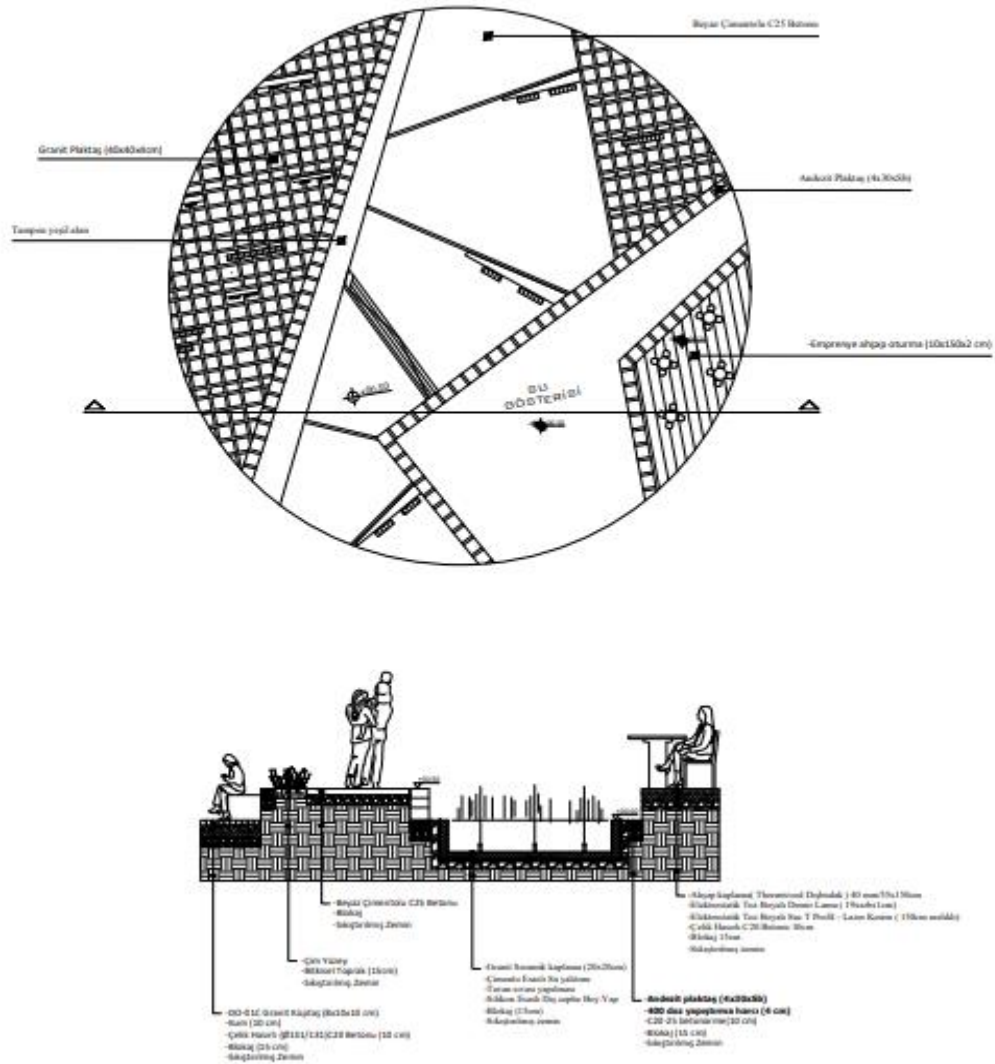


Figure 10: Regional detail

In the last stage, sections were taken from two different points of the area (Figure 11).

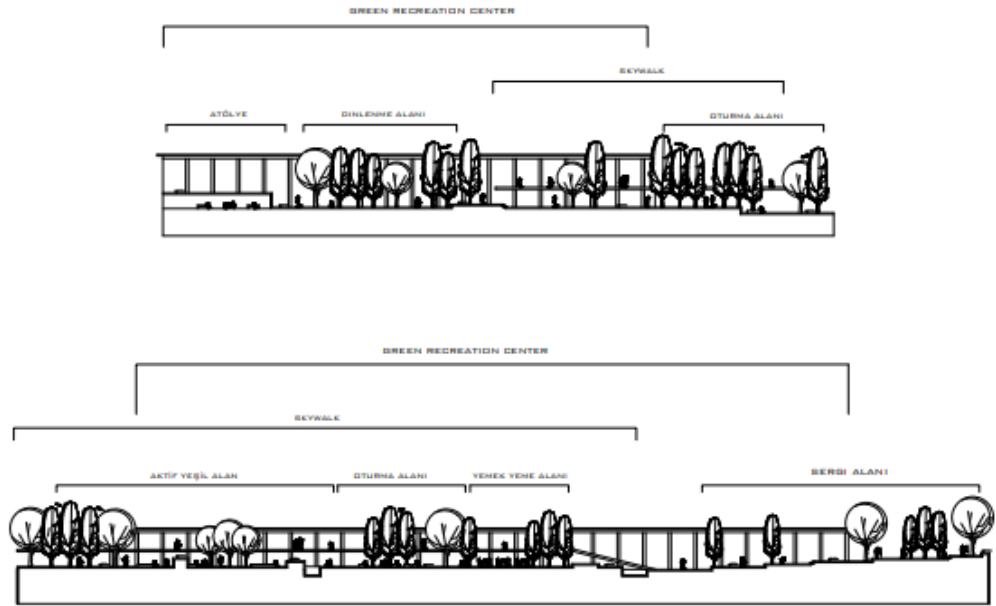
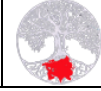


Figure 11: Sections from the area

After all these stages, the process was completed by taking realistic renders of the area (Figure 12).



Figure 12: Area Render Examples



5. CONCLUSION AND RECOMMENDATIONS

Trabzon old bus station area, which is an urban area that has lost its function or intensity of use in the past and has collapsed economically, physically and socially due to various reasons, is discussed. The aim of the project is to solve the physical/environmental problems, to create quality living conditions in sustainable environments and to meet the new social needs that arise with socio-economic/technological developments, and how the process of the urban transformation project, in which different dimensions and targets stand out, is carried out. In the study, the environmental design project process is discussed in detail. The analysis of the area, planning and design processes were discussed and the process was examined in detail and it was aimed to shed light on the designs to be made.

REFERENCES

- Arsal, G. (2004). Büyük kentlerde otogar planlaması, İstanbul Örneği (Doctoral dissertation, Fen Bilimleri Enstitüsü).
- Bayramoğlu E., Seyhan S. (2021). Peyzaj Mimarlığı Eğitiminde Çevre Tasarım Projelerinin Senaryo-Etkinlik Çeşitliliği Bakımından Değerlendirilmesi. *Journal of Academic Social Resources*,6:751-755.
- Çetiner, A., Güçmen, Ö., Yayla, N. (1994). İdari Mahkemeye Sunulan Rapor.
- Çubuk, M., (1993). İstanbul Şehirlerarası Metropoliten Otobüs Terminali- Bir Kentsel Proje Meditasyonu, IV. Kentsel Tasarım ve Uygulamalar Sempozyumu, MSÜ İstanbul.
- Düzenli T., Yılmaz S., Alpak E. M. (2018). Peyzaj Mimarlığı Eğitiminde Proje Süreci: Trabzon Trt Binası Çevre Düzenlemesi. Atlas I. Uluslararası Sosyal Bilimler Kongresi, Nevşehir, Türkiye, 19 - 21 Ekim 2018
- Kurdoğlu B. Ç., Seyhan S., Bayramoğlu E. (2022). The evaluation of the national garden concept in environmental design projects with scenarios. *Artvin Çoruh Üniversitesi Orman Fakültesi Dergisi*,17(1): 13-24.
- Yılmaz S. (2015). Bir Kampüs Açık Mekânının Peyzaj Tasarımı: Süleyman Demirel Üniversitesi Orman Fakültesi Binası. *Kastamonu Üniversitesi Orman Fakültesi Dergisi*, 15 (2):297-307.
- URL1.<https://www.takagazete.com.tr/trabzon-terminalinin-oykusu#:~:text=1972%20y%C4%B1l%C4%B1na%20gelindi%C4%9Finde%20Belediye%20Ba%C5%9Fkan%C4%B1,ve%201974%20y%C4%B1l%C4%B1nda%20in%C5%9Faat%20tamamlan%C4%B1%C5%9Ftu%C4%B1r.>