Evaluation of an alternative approach to increase productivity in architecture project studios through student projects

Melih Kurnalı*

Ceyhun Şekerci**

D

Abstract

Studio courses in architectural education are undoubtedly among the most important courses that prepare students for professional design life. A given project should be guided with the support of the instructors and should include a simulation of the process in professional business life. Despite this, research shows that there is a disconnect between academia and the professional process. In addition to the fact that the educational process tries to add a different understanding to the student, professional life cannot find the middle point with academic education due to the constant changes in regulations due to rent and similar reasons. In such an environment, giving meaning to projects with an idealistic understanding, offering a thematic experience and producing holistic buildings with identity increases the importance of alternative approaches in project studios in educational processes. Although it is not possible to prevent the emergence of identity-less and rent-oriented products in the market only through architectural education, approaches that will increase productivity in this education will also increase students' expectations from the profession. The conceptual approach, which is one of these alternatives, can be defined as creating a network of relationships based on a basic idea. This network of relationships allows the concept to be transformed into a concrete structure by distributing it to all project processes without moving away from the context and with an inclusive approach. In this study, first of all, the conceptual approach in design education will be emphasized and general definitions will be made, and Studio-2, Studio-3, and Studio-4 courses in Konya Technical University Faculty of Architecture and Design, Department of Architecture in 2021-2022 will be evaluated with a conceptual approach. With this approach, it has been concluded that the student's design perception and thinking technique can be developed by creating concept-based, original, and holistic, and focusing on the missing aspects of professional life in project courses.

Keywords: architectural education, conceptual thinking, design education, architecture and design.

1. Introduction

It is accepted that the systematization of architectural education and the transformation of architecture into a discipline that serves many purposes began with the 17th century based Ecolé des Beaux-Arts (Sadri & Zeybekoğlu Sadri, 2013; Gül et al., 2013). With the spread of similar academies, architectural education has transformed from a method based on the master-apprentice relationship to a formal education with certain boundaries, which is the basis of known design education. In addition to the technical infrastructure offered by formal and systematic education, the beginning of research on the need for a philosophical infrastructure to create a design language dates to the years when the Bauhaus school emerged.



Architectural education is a synthesis of verbal and quantitative disciplines that support the cultural, artistic, and technical development of the student. In parallel with the technical infrastructure, education should also develop the student in terms of art and aesthetics. Design can only be successful with the correct establishment of these two infrastructures. Since the design process in architecture cannot proceed systematically, the existence of a single approach model cannot be mentioned. Since the Ecolé des Beaux-Arts and Bauhaus, the infrastructure of the current educational techniques in architectural education, there are educational models in which various methods such as 'problem-based learning', 'experiential learning', and 'constructivist learning' of design have been adapted (Gül et al., 2013). Alternative education models have emerged and are emerging under these methods. Since these models can be shaped according to the relevant project, technology, etc., it is not correct to argue that there is only one correct model. Continuously developing technology and construction methods should be included in architectural education so that students are better prepared when they graduate. The focus of the study at this point is to provide the update with alternative methods to increase the productivity of students.

Today, the transformation of architecture into a commodity that is constantly changing hands, bought and sold, rapidly produced, consumed, and monetized requires architects to offer more creative, innovative, and extraordinary designs. This means updating the education system and freeing the student from an understanding that does not go beyond the limits of regulations and rules that are constantly changed according to the conditions of the age, and that is forced to behave according to the rule book. Creative thinking and designing are seen as the leading concept in the renewal of architectural education (Asasoğlu, Gür, & Erol, 2010).

In the field of design from the past to the present; how design activities are carried out, what kind of data they are based on, that is, the phenomenon they contain in the background are concepts. In the most general form, the infinite data given by nature inspires people to design. These data are processed in the mind in various ways, thus informing the designer how and with what to design. In other words, each new formation produced is developed based on another formation in nature, hence a concept (Bilir, 2013). Conceptualization is an approach with a high potential for mental production and exercise. On the other hand, the approaches that directly proceed to building design and emphasize spatial analysis seem to be far from the problem and challenge in the creation of new forms and form-function integrity.

The concept, on the other hand, should be able to provide the student with the ability to be open to new experiences, and different perspectives, and to be open to innovation enough to establish connections and relationships between unrelated things. In addition, they will be able to generate new knowledge and produce original designs (Bekdaş & Yıldız, 2018). The dynamic structure of design requires continuous research, learning, and change, and this makes it necessary to produce different approaches. The conceptual approach method brings these requirements to the field of design. The primary aim of this study is to present the purpose of the approach and its contribution to the field of design and architectural education. Thus, it is aimed to emphasize once again the potential that can offer endless possibilities for the acquisition of creativity in architectural education.

2. Purpose and Methodology

The study aims to evaluate the contribution of the conceptual approach, one of the approach methods in architecture studios, to architectural education through student project outputs. In this context, the project studies carried out with the students at Konya Technical University, Faculty of Architecture and Design, Department of Architecture are included. In this context, the concept and concept choices of the student works were evaluated and the processes of reflection on the project and the project finals were evaluated. The limitation of the study is defined within the scope of Studio II and Architectural Concepts course, Studio III and Studio IV courses, which are studio courses of KTÜN Architecture Department. In Studio II and Architectural Concepts course, "Weekend Residence", in the Studio III course, "Closed Housing (Site, Collective Housing)" and in

the Studio IV course, the advanced transformation of the Konfaş building in the area between Konya Technical and Selçuk University were studied. All projects were produced with the same conceptual approach, considering the educational stages of the students. The conceptual approach refers to a process of design.

3. What is the Conceptual Approach?

Page | 99

It is not possible to talk about a gradual transition in the architectural design process. In the design process, there is constant back feeding. Since the project must be holistic in these flashbacks, step-by-step progress, in other words, a systematic design process is not possible. The existence of concepts in design is dependent on the application of rules derived from simple to complex relationships. Design must start with a right or wrong decision. Just as we do not distinguish an object as an object or a symbol, we cannot think of design as independent of concept. In the research phase, the visual thinker tries to picture the image in the mind with a concept. He develops the image that appears in a not-very-clear form and prepares its representation. What we are talking about here is the development and presentation of a concept that can be considered very raw or primitive in the development stage. The design begins with a good or bad concept. Just as it is wrong to separate the content of an object into objects and symbols, it is equally unhealthy to think of design as separate from the concept. Because the elements that are active in the establishment of the design and complement the design are reduced (Kömürcüoglu Turan & Altaş, 2003). The expression of the concept in design language is possible with words and images. Image is defined by Cevizci (2011) as a mental picture or image that represents external objects and has certain visual similarities with them. It is traditionally accepted that images have a close relationship with thinking, and it is said that comprehending the meaning of a word consists of bringing the appropriate image associated with the word to the mind. The formation of an image in the mind can be a result of perception, or it can be through thinking about perception, evoking it, and establishing something in the mind (Bilir, 2013). From this point of view, a concept can include an item associated with the mind, visual, and all kinds of similar manifestations. The concept associated with this manifestation finds itself as a word to express it verbally. With this verbal expression, the conceptual process does not end, but the most challenging part is overcome. Because the concept reached is an expression that directs the entire design process and contains the solutions to the problems to be encountered in design. In general terms, the concept exists both with its visible and formally expressed features and with its features that are expressed in one or many words and that create various meanings in the mind. However, if we need to consider the concept from a design perspective, we can also evaluate it from a functional perspective that can be expressed both verbally and formally. What is important in design, where learning and development take place through questioning concepts, is the necessity of applying a language that transforms the objectives in the form of abstract and conceptual definitions into design concepts. In this way, each designer reveals his/her concept and develops a unique method and strategy and completes the design process he/she has started in this way. The extent to which the main idea is reflected in the final product, the extent to which the concept is moved away from the concept with the problems in the process or the concept is developed, the extent to which the concept image is reflected in every part of the design from general to detail are the features that distinguish each designer from the other. The starting point of this concept can be said to be geography, climate, material, culture, economy, technology, and the spirit of the place, which are the basic factors of the act of architecture (Kuloğlu, 2014). The concept is a reduced ground for easy comprehensibility where all abstract and concrete parameters are presented on common ground. The reason for this is to make the design education process, which is quite different from the normal teaching style, understandable for the student. The concept is an important key for the student whose entire education life has progressed in a systematic infrastructure focused on the general rather than the individual. As a matter of fact, according to the study conducted by Kömürcüoğlu Turan and Altas, students who started the design process with concepts were able to develop the design more easily and were more successful than those who did not start the design process with concepts (Kömürcüoğlu, 2003).

3.1. Education Process, Concept Formation, Concept and Selection Process

In design education, individual development, the richness of designers' thoughts and emotions, the diversity of their tendencies and needs, the quality of the values they develop, their jokes, analogies, and metaphors, in short, the way they live affect the process of concept creation and development. It can be said that people's lives are limited by the concepts they develop (Ülgen, 2004). Accordingly, design studies and the project design process are the most critical areas of personal research and development. In this context, design education should not be seen as a problem-solving-oriented education. It is necessary for the student to determine the needs by considering all the parameters of the given project and to define a design problem from them, conduct regular and systematic research of related examples, and evaluate the solutions (Acar, Acar, & Ünver, 2021).

Page | 100

The place of the concept stage in the design process is at the very beginning. The concept is formed when the first steps in the design process become visible and explainable. However, if we should consider the act of concept development in the design process as a separate process; the concept is the end of the concept development process and the beginning of the design process, as it is at the point where this process, which is mostly in the mind, begins to externalize and concretize for the first time. For this reason, it is undoubtedly the most important part of the design as it is both a result and a beginning. For the designer, the concept will now be a point of departure to be referred to at every stage of the process, it will become equivalent to knowledge, a theory, a method to be applied at every new problem encountered and at every different stage. For the viewer, the design product will be handled and interpreted through its concept under all circumstances, and the concept will be the reason and essence that enables the design to be defined and comprehended.

Although the process up to the moment of concept creation in design is stage that can sometimes be solved in a very short time, it is perhaps the point in the process where the most importance should be given to examination and research. Because no matter how fast the designer goes through these processes or to what extent he transfers them from his mind to the external environment, the concept is the point that forms the essence of the design product.

The designer is obliged to meticulously find and reconcile the concept or concepts that have the same logic and content as the problem to be solved. The concept is the stage where the conceptual thinking stage in the individual's mind begins to gradually externalize and the first idea for the purpose can be easily conveyed to the individual or the audience. With this feature, concept development helps to ensure that ideas can be applied in different ways over and over again in all kinds of problems that will arise during the design process. Creating a basic concept that considers all the data will accelerate the design process and ensure that the data researched will not be forgotten in the future. The design proposals created with the determined concept present us with the area where design is used as a research method on its own. The designs and the concept are revised with continuous feedback in the studio environment. In this process, the student could continuously improve his/her work through criticism, discussion, and evaluation of his/her own and other works (Acar, Acar, & Ünver, 2021). It is imperative to consider design education separately from the traditional method based on repetition. The traditional method mentioned here refers to the method based on rote learning before higher education. With the Conceptual Approach, traditional and other methods applied in architectural project studios are not ignored. The conceptual method derives and develops from these approaches. While the instructor guides in design education, each individual is expected to create his/her own design solution and overcome the problems on his/her own. The biggest guide in this process is the concept.

3.2. Analogy in Conceptual Approach

In the conceptual approach method, which is the subject of the study, analogy is not included. The analogy is considered useful as a support in establishing a relationship with different elements. In analogies, the concept, event, principle, or phenomenon that is usually planned to be learned is

Page | 101

called 'target' and the concept, event, principle, or phenomenon that is known in this process is called 'source'. To expand the concept of analogy and at the same time overcome conceptual difficulties, it is necessary to use analogical thinking skills in the process of bridging the source and target (Clement, 1987). According to Kant, analogy, which establishes a similarity between two different phenomena, increases and produces knowledge (Koca & Uluengin, 2014). The student was left free in the concept selection and design process but was kept away from the analogical approach. Any analogy cannot find a place in this school as it may be a repetition of an existing design or harm the healthy and original progress of the design process.

3.3. Concept Formation in Project Studios and Project Design in Concept Based Design Method

The concept development process starts with the research of the study area. The effects of important parameters such as the province and district of the study area, the climatic characteristics of the region, topography, prevailing wind direction, the relationship with daylight according to the seasons, and the social, cultural, and economic characteristics of the region where the design project will be implemented, population structure, demographic characteristics of the population are analysed. A list of needs is created according to the needs program of the building to be built and according to the users in the scenario. Following the list of needs including the actions to be performed in the space, a concept is created within the framework of user-regionstructure headings. The concept should be inclusive of all these parameters. In such a way that the titles of the research conducted in the formation of the concept should guide and be derived as a result product of this approach. Another important factor in the concept process is that the concept should be chosen correctly and should be analysable both verbally and visually. Otherwise, a concept design that is detached from its context will not be sufficient to carry the project to the desired point. It is not correct to use parameters that are fundamental for space and structure in concept selection. For example, "sun" cannot be a concept. Because daylight is a necessity for all spaces except special-purpose spaces. The sun is a mandatory parameter that must be included in the design.

Determining the concept is the most valuable stage in the design process, as well as the most difficult and painful process for the designer. Each student individually determines a concept following their scenario and the design problem they have identified. Finding and developing the concept and the design to be made accordingly is entirely possible through personal effort, research, and design exercises. The validity of the concept must be tested by using it in design proposals and sketches. If the concept, which is tested with the criticisms given in the studio, discussions, and inferences from other studies, will respond to the function and function requirements of the design and direct the whole design, the concept is accepted, and the design projecting process of the design is started. Determining the concept is a stage that facilitates and originalism the project design process. The student shapes the whole project according to the concept. At this stage, the solution of all problems in the project process is solved with the inferences from the concept.

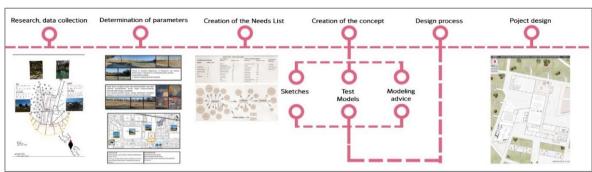


Figure 1 Design Concept Relationship in the Project Process.

The image above draws attention to the relationship between concept and design in the project process. While the concept is a design base put forward before the design process, it has all the

contents of the design process. The process of concept formation involves a continuous search like the design process. For this reason, it is in a cyclical relationship with the design process in constant feedback. To solve all kinds of problems and problems in the design, the return to concept and concept design is constantly connected. However, in this study, the process of determining the concept was investigated and student studies on the stages of sketching, test models (sketch models), and modelling proposals, which are equally and directly related to each other in this process, were presented. By presenting the concept proposals put forward in the student studies and the finalized projects, the contribution of the concept design process to the design and the project is revealed.

Page | 102

Enabling the aesthetic process in architectural education has been an active issue for many years. A student in the design process undergoes a similar production process as an artist and the nature of the problems he/she faces are architectural technical problems (Erzen, 1976). From this point of view, in activating the aesthetic process, the search for concepts is a guide for the student in the design process.

Studio-2, Studio-3, and Studio-4 courses in different semesters in 2021-2022 at Konya Technical University, Faculty of Architecture and Design, Department of Architecture were carried out with a process in which the conceptual approach was at the forefront compared to other studio courses. Students were not given any training on conceptual approaches in previous studios, and for the first time in these studios, students were expected to carry out the concept in an integrated manner with their projects from the first stage of design to the final stage. Due to the nature of architectural education and the differentiation of the functions and needs of each studio compared to the previous studio and the increase in expectations, the work given in the studios shaped the project design with the concepts determined by the students according to the parameters of the project subject. Before moving on to the prone topic, all students were asked to research the concept and concept of the words and were asked to make presentations with sheets related to their integration into the design process. During the study process, the conceptual design method described above was used and examples of projects developed in this context were presented. The limitations of the study are studio -2, studio 3, and studio 4 semesters. 4 studies from each semester were included in the evaluation (Table 1).

Architecture Department			
Project Courses	Studio- 2	Studio-3	Studio-4
Project Topic	Weekend Residence	Closed Housing (Public	Forward transformation of
		Housing)	the Konfaş structure and
			region
Concepts Reached in the	Combination Concept	Fracture Point Concept	Dynamism Concept
Project Process	Intersection Concept	Diversity Concept	Intersection Concept
	Integration Concept	Rupture Concept	Stacking Concept
	Individualization Concept	Demarcation Concept	Unity Concept

Table 1 Topics of studio courses and concepts used in studies.

3.3.1. Studio-2 Weekend Residence

In the project, which includes the design of a two-story residence on the sloping lands on the slope of Kuğulu Park overlooking the lake in Konya Seydişehir district, the user profile and user preferences were carried out through the scenarios created by the students. How many people will live in the building, what they will use it for, and the specialized spaces were created according to these scenarios. Guidance was given through jury-style critiques and discussions and students were encouraged to create creative scenarios. They were supported to create concepts about the regional characteristics, climate, the purpose of the building, and the whole scenario.

Particular attention was paid to the character of the region and the character of the users in the scenario. The concept was obtained by making the abstract approach as concrete as possible and affecting the whole study.

Page | 103

Student Work-1 The Concept of Combination

The scenario of the project is a weekend residence and a place that unites the family, and the traditional foundations of the surrounding buildings with wood and stone materials all of these are processed with the concept of combination chosen with the logic of the combination of modern and traditional. In the project work, unity is emphasized not only with the material but also in the coming together of the structure. The ratio of fullness and emptiness is placed in a complementary manner in accordance with the concept and the sun shading elements added to the building also supports the concept of unity by complementing each other with their opposite placements (Figure 2).



Figure 2 Interpretation of the concept of combination

Student Work-2 The Concept of Intersection

The concept was chosen because it is a common point where different purposes of use and families come together in the weekend residence has enabled the creation of a composition by bringing together intersecting parts in the process. While the intersecting parts come together, outdoor factors, such as the movement of the sun during the day, have created an opening in the building in this sense, enabling it to make the best use of the sun all day. The concept of intersection has influenced the whole space and at the same time, it has completely guided the design while emphasizing the concept with its direct effect on special-purpose areas (Figure 3).

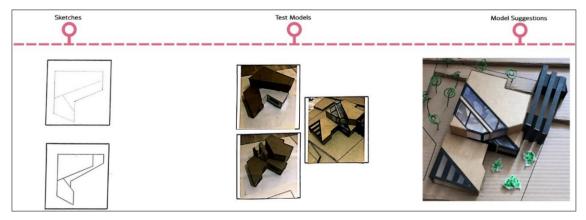


Figure 3 Intersection concept

Student Work-3 The Concept of Integration

In the building designed as a weekend residence, the designer evaluated the concept of integration as a concept for the study, based on the desire of the users to spend common time together depending on the scenario and the needs program, the integration of family members and the intertwining of the natural environment and the building, considering it as an inseparable whole. The designer has tried to integrate the concept of integration with the concern of creating common spaces by bringing together volumes with different functions and functions. The designer tried to reflect this concept in every stage of the building by integrating it with the concept of

adhering to the users' desire to live a life intertwined with the natural environment. Formally, he wanted to reinforce the concept of integrity by bringing different masses together. By continuing this approach in the whole design, he tried to reflect the conceptual process of the whole work to create common spaces (Figure 4).

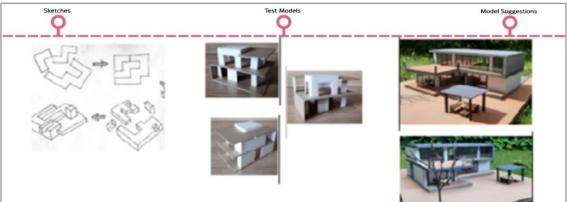


Figure 4 Integration concept.

Student Work-4 The Concept of Individualization

In the study, the designer has proceeded through the concept of individualization as a concept based on an approach where family members can face themselves, get away from the external environment, and isolate themselves. When we look at the whole work, we observe spaces where private volumes, hobby areas, and work areas come to the fore within the expectations of the users. To make each of the users feel special and to minimize the interaction with each other, a common space solution was not used. In the design of the building, the floors are solved for different users and each floor has a different story. To make this situation stronger, the mezzanine is positioned differently between the floors. The concept of individualization was tried to be used throughout the design (Figure 5).

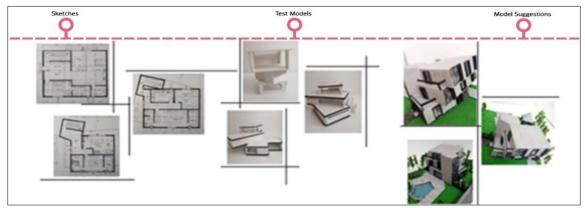


Figure 5 Individualization concept.

3.3.2. Studio-3 Closed Housing (Public Housing)

Within the 25.000 m² land area, the entrance, parking lot, common spaces, and landscaping of the site were also included in the project design in the closed housing project where the total construction area will be realized in a way to cover a minimum of 60 apartments (2+1, 3+1, 4+1). For this purpose, the flat land between Assoc. Dr. Halil Ürün Street and Türkerler Street next to Konya Ecdad Park were given to the students. The relationship of the area with the city was analysed and the buildings were asked to be placed by taking environmental factors into consideration. In addition, a corporate identity and logo study was requested for the building complex.

In the creation of the designs, the students were guided by continuous studio critiques, and the concept development and project development processes were continuously supported with

additional studies. In determining the concept, care was taken to ensure that the students consider environmental factors and do not break away from the urban context. However, the main goal was to understand the necessity of the concept in the creation of a design and project.

Student Work-4 The Concept of Fracture Point

The design, which started with a point and the lines that break that point, has also shaped this design. "In the design phase of the project, we first tried to find a solution to the problem of people getting bored with monotonous, flat structures and the routine lives shaped by those structures. We wanted to change people's lives, to create a breaking point in their lives. At this point, the breaking point became our main concept." As in the student's summary of the concept and the stages in the process of reaching the concept, the design is intended to get rid of the banality and monotony in the context. The planned aim is to offer users the opportunity to live in a space that liberates them from monotony and monotony when they enter the residential area. For this purpose, experiments were carried out with holistic geometric shapes formed by cutting and breaking many lines passing through a point, and finally, the intersection point of the blocks, which will also inspire the logo, was revealed (Figure 6).

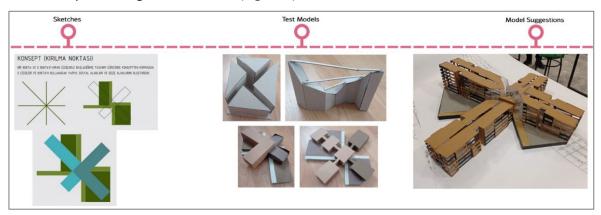


Figure 6 Evaluation of the concept of Fracture Point in an enclosed dwelling.

Student Work-2 The Concept of Diversity

The concept of diversity emerged from the diversity of the region and the users of the building, and geometric elements were used to reflect this in the building. "The concept of diversity has been addressed as the project seeks forms other than the similar building forms on the building island. Based on the concept of adding circular forms to quadrilateral forms of different sizes, both circular and quadrilateral forms were emphasized by utilizing the difference in tone, and diversity was provided within the integrity. In the project process, elongated quadrilateral forms were given volume by increasing their width, and an opening was left in the whole by following their axes." As stated by the student, the main problem of the work was to present diversity appropriately while ensuring integrity (Figure 7).

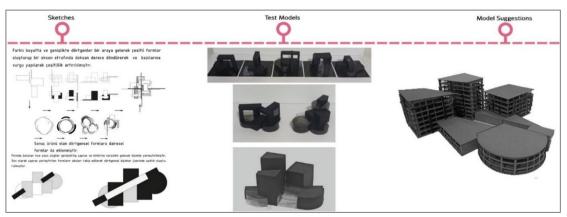


Figure 7 Diversity Concept

Student Work-3 The Concept of Rupture

In the design where the concept of rupture is used, the design has reached its final form by emphasizing the parts that are ripped from a whole and the repeated use of these parts. "The main concept of the design is rupture. For this reason, the L form was divided into three, and the break was emphasized with colour and floor difference. The building is broken vertically and again the break is emphasized in the facade design." As in the definition made by the student, the blocks are defined by being detached from the ground and each other. The concept of detachment similarly aims to offer individualized and private spaces within the site to break away from the heavy and tiring aspect of the city, which is sought in the residences of the age (Figure 8).

Page | 106



Figure 8 Rupture Concept

Student Work-4 The Concept of Demarcation

"At the beginning of the conceptual process of my project, I thought that "prejudices between people turn into borders" and decided that these borders should be eliminated. Thus, I chose my concept of "Unlimitedization"." The basis of the concept design was determined by the student in this way, and the idea that hard and sharp striped elements express boundaries and the idea of unboundarization was adopted with the idea that curvilinear forms exceed these boundaries. While black blocks express negative limitation, the curvilinear forms that cut them apart aim to reveal the richness of unlimitedization with their orange colours (Figure 9).

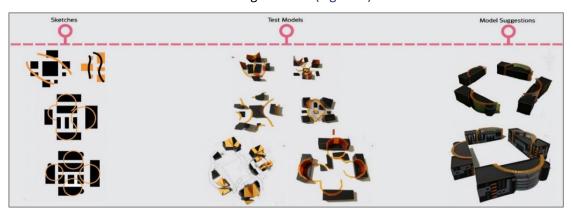


Figure 9 Demarcation Concept

4. Studio-4 Konfaş and Land

The project subject includes the design of a complex with a 1000 m² closed area, and a 10 thousand m² open area, including some or all the educational, social areas, library, laboratories, workshops, and management units. In this context, the design and production of the building complex of an organization working in parallel with public institutions to be called Konya Development Academy constitute the customized design problem area of the students. The Konya Development Academy is given the responsibility of public education, providing a source of new

Page | 107

knowledge and a working environment for students, Konya history research and promotion, design research, and all kinds of activities to be carried out in the name of becoming a sustainable city. In addition to these, students were asked to identify a field that their own development academy specializes in (e.g., ecological agriculture, etc.) and to design a design that includes spaces that focus on this field. Processing and designing the corporate identity and logo of the academy in this direction was also seen as one of the important outputs of the study. The site for the study was the Konfaş building and land between Konya Technical University and Selçuk University. One part of the building is used by Selçuk University and the other parts are idle. In this sense, students were given the freedom to partially use the building or completely reuse the land.

Student Work-1 The Concept of Dynamism

"Dynamism was chosen because youth and the young spirit are not static but always moving and the design area is located in an active area." The specialized theme of the academy is the active participation of disabled individuals, who are also included in the student population, in the society and the creation of an environment of cohesion are also seen as dynamic goals. During the research process with sketches for Dynamism, a two-dimensional drawing expressing a continuous and complex movement on a fixed line was accepted as the starting point and efforts were made to rationalize this form. The concept was used in all spaces from façade design to landscaping, showing the purpose and character of the space in all areas (Figure 10).

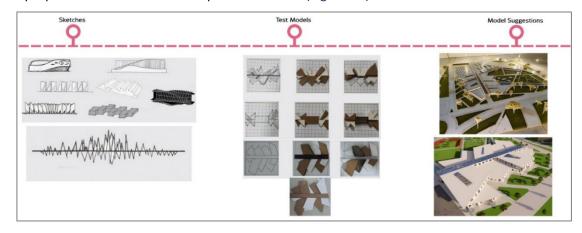


Figure 10 Dynamism Concept

Student Work-2 The Concept of Intersection

The reason for choosing the concept of intersection in this project is that the land between the two universities aims to provide a common working space for students studying in different disciplines. In the design, a center where common workshops and workspaces are offered to enable different fields to carry out multidisciplinary studies is designed. In the creation of the intersection, the axes leading to the location of the building were utilized, landscaping and access roads to the building were arranged in the areas where these axes intersect, and common special-purpose spaces were created in the areas where the design elements intersect with each other (Figure 11).

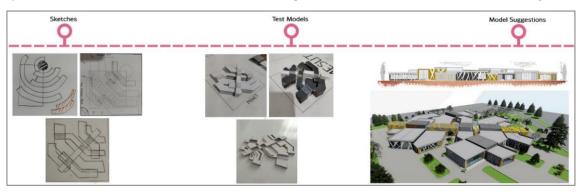


Figure 11 Intersection Concept

Student Work-3 The Concept of Stacking

The concept of stacking was chosen within the framework of emphasizing the continuous rise on a solid foundation by preserving the characteristics of the university region, which is constantly transforming and developing. The presentation of this aim, which is one of the goals of Konya Development Academy, was chosen with the concept of stacking, and the relationship between the concept-space-context character was established with the idea that the more orderly it rises from the foundation, the further it can go. The relationship between the parts of the space that complement each other but also present different characters can be seen in the final products (Figure 12).

Page | 108



Figure 12 Stacking Concept

Student Work-4 The Concept of Unity

With the idea that there is a disconnect between generations in the region and the city, the concept of togetherness was chosen with the idea of a center that brings all users together. Focusing on the idea of bringing three generations together, 3 separate blocks representing each generation were brought together according to the needs program and space arrangement. Sometimes the spaces were integrated with each other, and sometimes new spaces were created for transition. In this way, the expression of supporting the bridging of the gaps between generations with bridges is also provided with space. In addition to the inability to establish a relationship between different generations, the concept design, which starts with the basic idea that society is a whole, draws attention to the idea of society by starting with the fragmentation of a whole in the first stage (Figure 13).

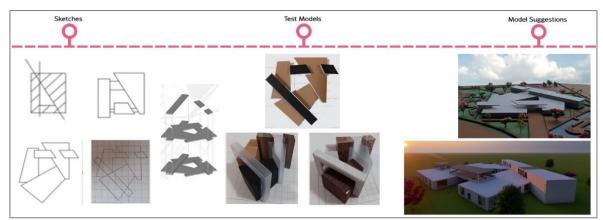


Figure 13 Unity Concept

All the student work on how and in what way the concept guides the work points to the fact that design is not simply about producing spaces that are closed on 4 sides. Design can be seen as

meaningful and successful when there is a strong idea behind it. In this sense, all student works focused on the aim of generating an idea.

5. Conclusion and Evaluation

In the current architecture and design environment, it is seen that the process of developing concepts and ideas in design is not given enough importance. It is a natural necessity to have an idea behind all the work done. An architecture that does not involve research and development and is disconnected from its context imposes products that can only provide basic requirements but no more than that. An architectural product that does not pay attention to the characteristics, traditions, culture, and needs of the city, but only fulfils its function, remains among other buildings, and becomes ordinary.

The discipline of architecture, which is at the common point of art and technique, is obliged to preserve this feature in the education process. The conceptual design offers an important method for maintaining this partnership. Design is a dynamic and cyclical process, constantly involving returns, revisions, and changes. Every good design should leave behind a broad artistic and technical background. This can only be achieved by belonging to the place where it is located and responding completely to the place and the need. It is the conceptual design method that makes this possible. Because the concept is only derived from the city, street, region, need, and environmental factors. The concept is everything that is necessary for that space. It is the imaginative reduction of the expression of necessities. It can be seen as a single word, but it is to reduce an intense meaning and expression to a keyword. The purpose of this reduction is to avoid confusion for the student and to facilitate the study and design process. The word, which is reduced to a single expression as a concept, must have a visual and semantic equivalent; it must have a two-dimensional and three-dimensional equivalent.

The conceptual design method supports creative thinking through continuous studio guidance and individual research content. Creative thinking and trial-and-error methods require constant mental exercises and design experimentation. Sketches, mass models, and the search for them support the formation of new ideas.

The conceptual design method, in which the process and the search in that process is an achievement for the student, offers new possibilities in the production of original ideas for design, as it requires intensive examination and research of other disciplines, the functions to be performed in the space, in other words, every fine detail. It has been proved by the student studies that a rich production environment that can work with different disciplines and incorporate concepts that are important and necessary for those disciplines, open to innovation, addable, improvable, dynamic but cyclically continuous feedback is realized with the conceptual design method.

In the studies, it was observed that aesthetic perception increased, and students adapted to the design by feeding aesthetic concerns in addition to function. In addition, the study evaluates the use of the conceptual approach in the design process of the projects carried out within the scope of Studio-2, Studio-3, and Studio-4 courses. The projects were tried to be read through the reflection of the selected concepts on the design process in two and three dimensions. In this context, it was observed that the effect of the conceptual approach was observed in the function, function, and form of the projects. In addition, it has been observed that students working in the studio - 4 studio courses give better results at the point of understanding and comprehension of the conceptual design approach.

References

- Acar, A., Acar, Ş. S., & Ünver, E. (2021, 16 2). Mimarlık Bölümü Birinci Sınıf Öğrencilerinin Kendi Problem Çözme Becerilerine Dair Algılarının Dikkat ve Görsel-Mekânsal Becerileriyle İlişkisi Üzerine Bir Araştırma. *Megaron*, s. 212-222.
- Asasoğlu, A., Gür, S. Ö., & Erol, S. Y. (2010, 18 11). Basic design dilemmas in architectural education. *Scientific Research and Essays*, s. 3538-3549.
- Bekdaş, H. D., & Yıldız, S. (2018, 13 (2)). Tasarım ve Sanat Arakesitinde Kavramsal Düşünme: Enformel Eğitim Çalışmaları (2009–2015). *Megaron,* s. 324-333.
- Bilir, S. (2013. *Mekan Tasarımında Kavram Geliştirme Sürecine Analitik Bir Yaklaşım*, Yüksek Lisans Tezi. Hacettepe Üniversitesi Güzel Sanatlar Enstitüsü.
- Cevizci, A. (2011). Felsefe Sözlüğü. İstanbul: Say Yayınları.
- Clement, J. (1987). "The Use of Analogies and Anchoring Intuitions to Remediate Misconceptions in Mechanics", (ERIC Document Reproduction Service No. ED 291 604).
- Erzen, J. N. (1976). Eğitimin Estetik Süreç Olarak Yorumu ve Mimarlık Eğitimi. *ODTÜ Mimarlık Fakültesi Dergisi,* 2(2), 175–185. http://jfa.arch.metu.edu.tr/archive/0258-5316/1976/cilt02/sayi 2/175-185.pdf
- Gül, L. F., Çağdaş, G., Çağlar, N., Gül, M., Sipahioğlu, I. R., Balaban, Ö. "Türkiye'de Mimarlık Eğitimi ve Bilişim Teknolojileri" Mimarlıkta Sayısal Tasarım Ulusal Sempozyumu, Sayısal Tasarım, Entropi, Yaratıcılık, ISBN:978---975---561---437---3. Haziran 2013, İTÜ.s:11---16.
- Koca, S. K., & Uluengin, Ö. (2014, 152). How does concept transform into product? An appraisal of analogybased design practices in architecture education. *Procedia - Social and Behavioral Sciences*, s. 25 30.
- Kömürcüoğlu Turan, N., Altaş, N. E. (2003). Tasarım sürecinde kavram. İTÜ Dergisi, Mimarlık, Planlama, Tasarım. s. 15-26.
- Kuloğlu, N. (2014). *Mevcut Çevrede Tasarım: Stüdyo Deneyimleri. D. Ş. Gür içinde,* Mimari Güncellemeler (s. 125-139). Ankara: Nobel Akademik Yayıncılık.
- Sadri, H. and Zeybekoğlu Sadri, S. (2013) "Özgürleştirici Mimarlık Eğitimi" (Turkish), Title in English: "Liberating Architectural Education", in the *Critical Pedagogy (Eleştirel Pedagoji) Journal, issue 28*, July 2013, PP: 60-66
- Ülgen, G. (2004). Kavram Geliştirme. Ankara: Nobel Yayın Dağıtım.

Resume

Melih Kurnali is Assistant Professor at Interior Architecture pr., Konya Technical University. He is an interior architect and received his Ph. D. degree from Hacettepe University, Department of Interior Architecture and Environmental Design. He has focused her research mostly on micro architecture, cabins, limited spaces, interior architecture education and spatial sense.

Ceyhun Şekerci is an Assistant Professor Doctor at Konya Technical University, Department of Interior Architecture. His research continues in the field of social and human sciences, interior architecture education, parametric design, technology, virtual reality and in the field of disability.