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Evaluation Of the Expectations, And Acquisitions of Architectural Project Atelier Participants in Spring 2020 Semester Regarding Learning Styles of Individuals During a Disrupted Education Period

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Abstract

This Study emphasizes on the Atelier participant Students' ideas and opinions of their early Expectations and final Acquisitions from the Architectural Project and how the way of learning tyoes of each student is efected by their expectations and acquisitions (or vica versa) in a distrupded education period. By applying a questionnaire to a group of atelier participants that consist of varying age and experience levels that value their opinions on their personal gains on varying aspects of architectural design at two different stages of the semester. The first to be the face-to face start to the spring 2020 semester ant the second is the online conclusion of the project lessons in Summer 2020. It was possible to understand and evaluate the Atelier participant Students' ideas and opinions of their early expectations, and final acquisitions from the architectural project and how varying types of learning styles of each student is significantly reflected when their primary expectations and final acquisitions are comparatively evaluated in a disrupted education period.

1. INTRODUCTION

Architectural Project Lessons in Architectural education are considered as the main courses where the student learns the ways to design and improve the quality of their projects by one-to-one collaboration with the lecturer. The vertical atelier structure of the Gazi University Faculty of Architecture Department of Architecture (GUFADA) gives different level of student in varying semester of their education work together in the same atelier facing the same design problem. A group of 4th, 5th,6th,7th, and Final semester students attended the Atelier in Spring 2020. This structure allows students to learn from their higher semester friends as well as the lecturer. Also contributes to the improvement of presentation skills as early as the 4th semester. As the final submission for each student is expected to possess a certain level of quality in means of design completion, drawing quality, 3d representation and organization of the submission sheets.

At the start of the spring semester at the first week was the selection week that took place where students chose one of seven ateliers. The researcher's Atelier's design problem for the semester was a three-star city hotel on one of the main boulevards in the city of Ankara. After the introduction of the problem during face-to-face lectures, the students formed groups and started their site visits and prepared early evaluations about the subject and the physical environment of the selected project site at the second week. They prepared presentations of their early evaluations. At the third week they started to shape their response to the site as basic design elements placed on the model of the existing site. Both by making a mockup of the area and digital modelling of the site the students started to understand the limitations and regulations needed to comply for a three-star city hotel design.

The global pandemic situation caused by the widescale spread of Covid-19 Virus forced closures of the Universities on 16th March 2020 shortly after the start of the Spring semester which started at the 10th of February in Gazi University in Turkey. This Period spent at the school gave opportunity to the Design Ateliers of the GUFADA to state the design problem for the semester to the students while the education

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was face to face for 5 weeks into the Spring semester. The EXPECTATIONS SURVEY of this research was applied to the students shortly after the introduction of the design problem and answers were completed before the closure of the Universities on the 16th of March 2020.

After the closure, each atelier in GUFADA took the opportunity to take the lecturing process for the Architectural Project Lessons to the online platform. using various free to use software and personally prepared websites by the Atelier, the disruption of the Spring semester was interrupted, and the lecturing went on via internet.

Also, the Global situation about the Covid-19 and the closure of the universities were considered as a main contributor to the students' answers to the questions asked about their gains at the end of the semester via THE ACQUISITIONS SURVEY completed at the elongated education semester that ended at the end of July 2020. The studies that took place during the pandemic period was also evaluated to reflect the academic worlds' reaction to the situation.

Evaluating the Expectations, and Acquisitions of the students via surveys at the beginning and at the end of the semester proved to be helpful and productive for the Atelier organizers to understand and reevaluate the practice. The first implementation of this type of research was conducted at the Architectural Project Atelier at the (GUFADA) in 2019 Fall Semester. The results were published by the researcher in 2020. In that study, the students' expectations were observed to be high at the beginning of the semester. During the semester, another survey was applied to reflect the effects of their ongoing assignments and their feedback from the midterm Jury. The second survey at the middle of the semester results showed that the students 'belief in their project preparation for the critical day decreased in time and resulted in lower valued answers to the Assignments survey. The Acquisitions survey at the end of the semester showed that the students were mostly satisfied by their final projects.[1]

The main motivation of this research was the effects of the disrupted education Period's on Students' satisfaction from the learning environment. A research conducted by R & Wright, A (2020) was The University of Bath's a survey of the impact of COVID-19 on studio teaching in architectural education. Students and teaching staff at 25 schools of architecture responded to the questionnaire. The satisfaction among students had decreased following the move to remote teaching. There was a 58% fall in student satisfaction after the move to online learning and only 7% of students preferred online delivery over its face-to-face equivalent. As for the teaching staff 58% of tutors were satisfied with their online teaching experience, this fell from 94% satisfaction of in person delivery. Only 4% of tutors preferred online delivery to its face-to face equivalent. [2]

Another scope of this research is to determine if the learning styles of each atelier participant effect the satisfaction of the students from the learning environment. A study by Kolb, D., (1984) [3],[10] emphasizes on individuals' ways of learning can be determined by applying a series of questions and can be classified in subcategories. [3],[10] This Questionnaire was applied to the atelier participants to determine their learning styles.

Mumford A. and Honeyş P. (1992)'s study also emphasizes on such questionnaires and present their views and differences on the subject. [4],[11].

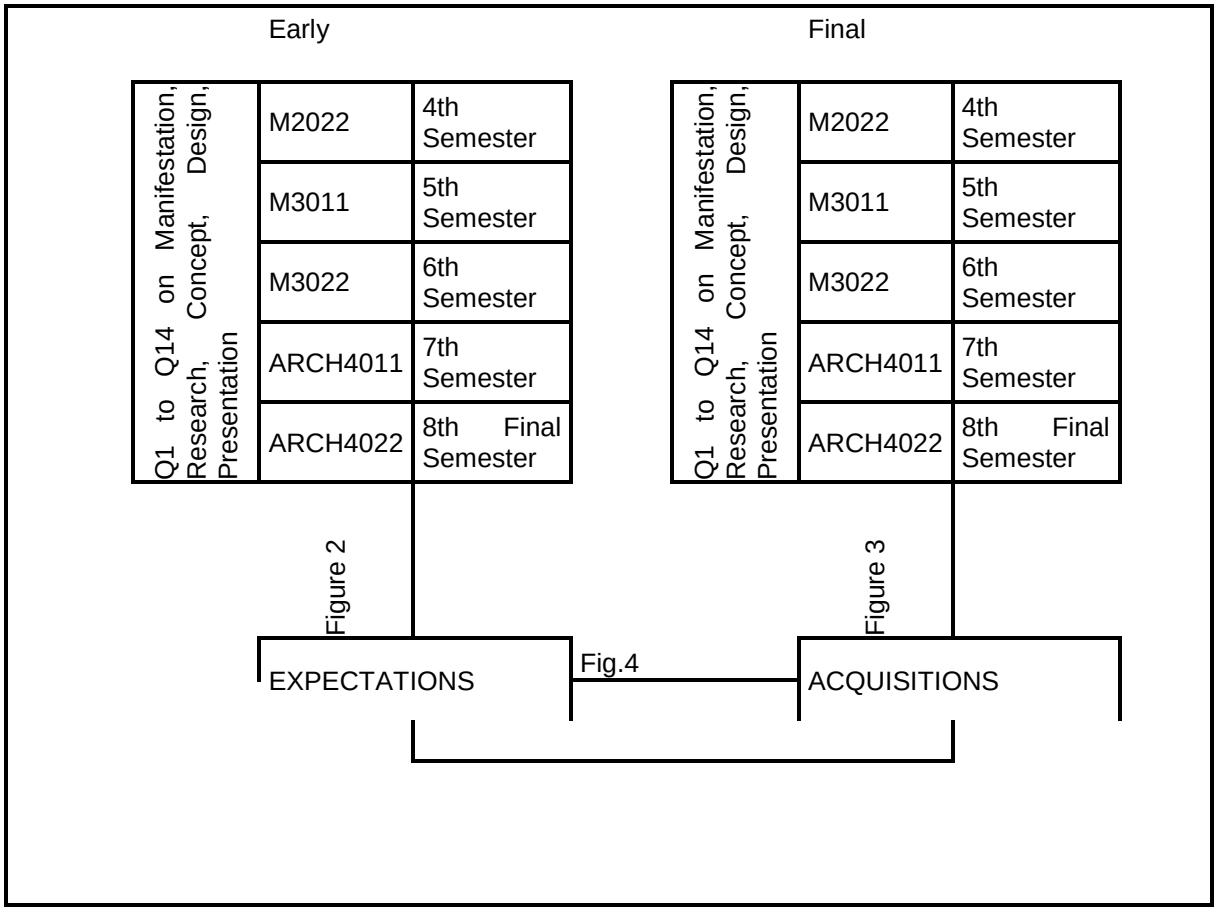
There are other studies by Smith, M. K. (2001, 2010). [5] and by Wayne Attoe & Robert Mugerauer (1991) [6] on the subject.

2. METHOD

The main purpose of this Study is to understand the Atelier participant Students' ideas and opinions of their early Expectations and final Acquisitions from the Architectural Project as an important shareholder of the Architectural education. Also, this study emphesises on how each type of learner responded to the surveys applied at the beginning and the end of the semester and how the way of learning tyoes of each student is efected by their expectations and acquisitions (or vica versa) in a distrupded education period.

The hypothesis of this study is; This insight (as mentioned at the purpose) can be achieved by applying a group of atelier participants that consist of varying age and experience levels (4^{th}-5^{th}-6^{th}-7^{th} and Final semester students) a questionnaire that value their opinions on their personal gains on varying aspects of Architectural Design (Atelier Manifestation, Research on subject, Concept development, Design Making, Presentation Preparation), at two different stages of the semester (early & final).

Table 1. *Structure of the Study: Applying a group of atelier participants that consist of varying age and experience levels (4th-5th-6th-7th and Final semester students) a questionnaire that value their gains on varying aspects of Architectural Design (Manifestation, Research, Concept development, Design Making, Presentation), at two different stages of the semester (early & final).*



This study emphasizes determining and evaluation the varying expectations, and final acquisitions of architectural project studio participants throughout the 2020 Spring semester at Gazi University Faculty of Architecture Department of Architecture (GUFADA). The method has been determined by the researcher as to provide each student with 2 survey forms that consist of 14 questions each: one at the beginning, and one at the end after the final submission. These survey forms were prepared with 14 questions which are related to each other to follow the variations on the same aspects a project such as understanding architectural manifestations of the atelier (MANI), research methods on the site and its history (RESE), concept development (CONC), design thinking and making (DESI) and drafting and presentation (PRES). The structure of the questions was altered with the time of the survey and were designed to gather valuable data on the.

Survey 1: Primary EXPECTATIONS of the student on the subject and the atelier prior to selection. (Figure 2)

Survey 2: The level of students' ACQUISITIONS they believed they gained after the final submission. (Figure 3)

The achievement level of that aspect from a scale to 1 to 5 (1 Lowest-5 Highest)

At the end of the study the following evaluations were made:

1. The evaluation of Students Primary Expectations versus Students Acquisitions They Believe They Derived During the Semester (Figure 4)

The Researcher collected the percentages (%) of answers of all participating students for each question and then compared them with all the cross related answers of each student at the first and second The Percentile differences between answers to cross related questions were presented by figures at the RESULTS AND DISCUSSIONS sections of this study. These figures represent the changes in students' evaluation of their own selves and their beliefs in their gains and improvements throughout the semester as a main shareholder in the Architectural Education.

2. Another evaluation of this study was the comparative evaluation of the answers of each student individually regarding the learning styles of each student according to KOLB learning styles.(3,10) (Figure 5,6,7,8,9)

The Researcher collected the answers of the students to the LEARNING TYPES SURVEY [3],[10] applied at the beginning of the semester and classified their answers to reflect which types of learners each of them were. Then their primary EXPECTATIONS and final ACQUISITIONS answers were matched with their learner types and a comparative evaluation were made regarding their answers to all surveys in the RESULTS AND DISCUSSIONS sections of this article.

Survey 1 The "EXPECTATIONS SURVEY" applied on the beginning of the semester, consists of 14 questions focused on five main aspects of the design process which the students believe they will achieve by working in this atelier. The questions were in future tense and revealed intensions/expectations of the students' achievement level and rated it from 1 to 5 (1: Lowest, 2 Low, 3: Average, 4 High, 5 Highest). The questions were:

Q1: Atelier Manifesto: I learned and understood the workshop program and its layout and the project subject
Q2: Atelier Manifesto: I have studied and assimilated the workshop principles and manifesto
Q3: Research: I will learn the connections and development from the historical process related to the project location
Q4: Research: I will explore the past and present use of the place and its possibilities in the future
Q5: Research: I will learn the requirements for a project that can be implemented today in accordance with this location
Q6: Concept: I will be able to develop my inspirations with other science / art / culture branches
Q7: Concept: I will develop an original and tailored program in the context of the project
Q8: Concept: I will analyze the strengths and weaknesses of the program I have developed and the opportunities and problems
Q9: Design: I will go through a creative process by working with different materials and tools in the approach to design
Q10: Design: I will be able to reflect my design decisions in my work by reflecting my ideas on my project
Q11: Design: I will be able to propose multiple solutions for multiple time spatial sections of the project
Q12: Presentation: I will make my drawings that will best describe my project in the layout
Q13:Presentation: I will learn how to make presentations and visuals using programs
Q14: Presentation: I will be able to prepare my presentation sheets and make a regular presentation
Q15: Other: Blank line on which written expectations that could be mentioned by the student.

Survey 2 The "ACQUISITIONS SURVEY" applied on the end of the semester, consists of 14 questions focused on five main aspects of the design process which the students believe they achieved by working in this atelier. The questions were in past tense and revealed beliefs of the students' achievement level and rated it from 1 to 5 (1: Lowest, 2 Low, 3: Average, 4 High, 5 Highest) . The questions were:

Q1: Atelier Manifesto: I have gained efficiency by contributing with research on what I understand about the project subject
Q2: Atelier Manifesto: I was able to work in accordance with the workshop layout and became productive
Q3: Research: I used the information I gained about the location of the project to develop my project and I was productive
Q4: Research: I have identified the past and present use of the place and its future possibilities
Q5: Research: I have learned and solved the requirements for a project suitable for this place
Q6: Concept: I developed my sources of inspiration with other science / art / culture branches and reflected them to my project
Q7: Concept: I developed an original and site-compatible program that will be the subject of the project
Q8: Concept: I solved the strengths and weaknesses of the program that I developed,
Q9: Design: I worked with different materials and approached a creative design process and became productive
Q10: Design: I presented my design decisions in my works and received feedback and reflected them to my project
Q11: Design: I was able to propose multiple solutions in multiple time spatial sections of the project
Q12: Presentation: I made my drawings that would explain my project in the best way within the layout
Q13:Presentation: I learned how to make presentations and visuals using utilities
Q14: Presentation: I was able to prepare my presentation sheets and make a regular presentation
Q15: Other: Blank line on which written notes on acquisitions that could be mentioned by the student.

3. THE RESEARCH FINDINGS AND DISCUSSION

In the Spring Semester Atelier Think Imagine (ATI) proposed a subject on Planning a three-star city hotel on GMK Boulevard in the city of Ankara. In this semester 41 of 47 Students successfully completed the ATI of whom were varying form all project levels, 90% of the first-time attenders of their respective project (Figure 1)

The students firstly read the atelier manifesto and the project subject from the leaflets the ATI provided and discussed them at the first day of the semester. Then they answered the EXPECTATIONS SURVEY After the submittal of the project and before the declaration of the project grades to the students the students were asked to complete the ACQUISITONS SURVEY.

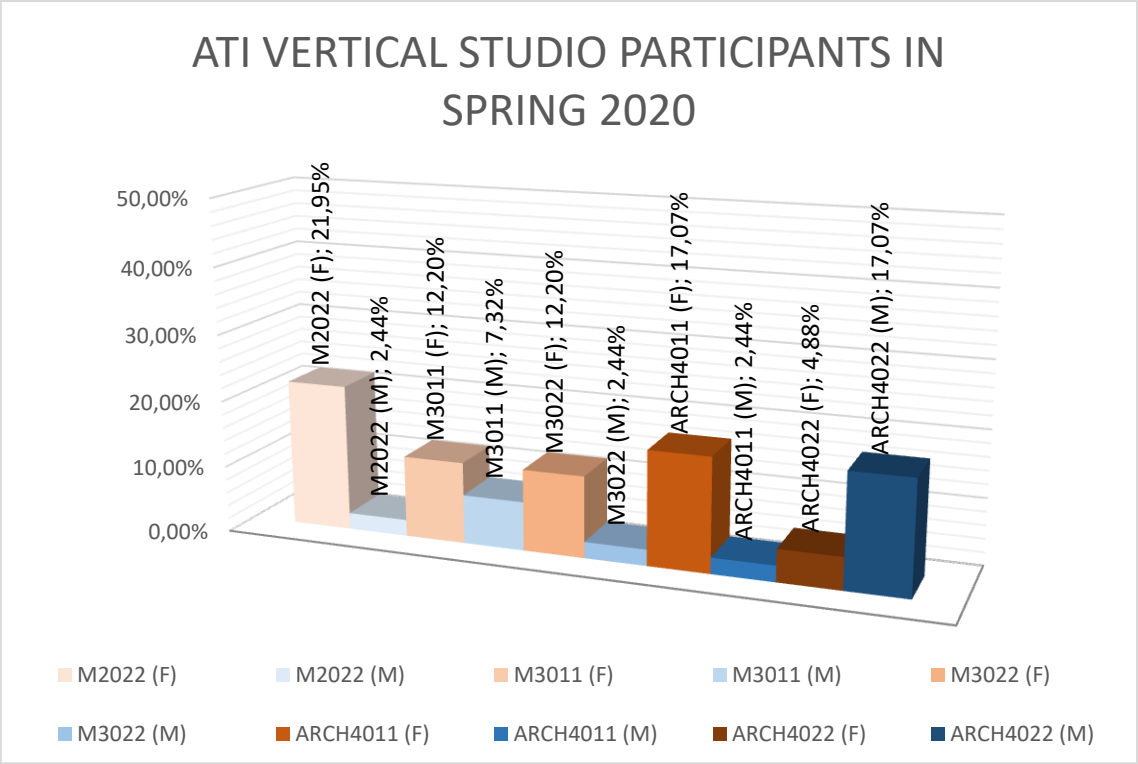


Figure 1. *Student percentiles and the projects they are attending and total percentage of repetitions of their project ((M):Male / (F):Female) (M2022: Architectural Project 4, M3011: Architectural Project 5, M3022: Architectural Project 6, ARCH4011: Architectural Project 7, ARCH4022: Final Project)*

A total of 47 Students attended the Atelier at the beginning of the Semester. 41 of them submitted a Project and answered all the surveys. There were 10 M2022 students (9F/1M), 8 M3011 students (5F/3M), 6 M3022 students (5F/1M), 8 ARCH4011 students (7F/1M) and 9 ARCH4022 students (2F/7M).

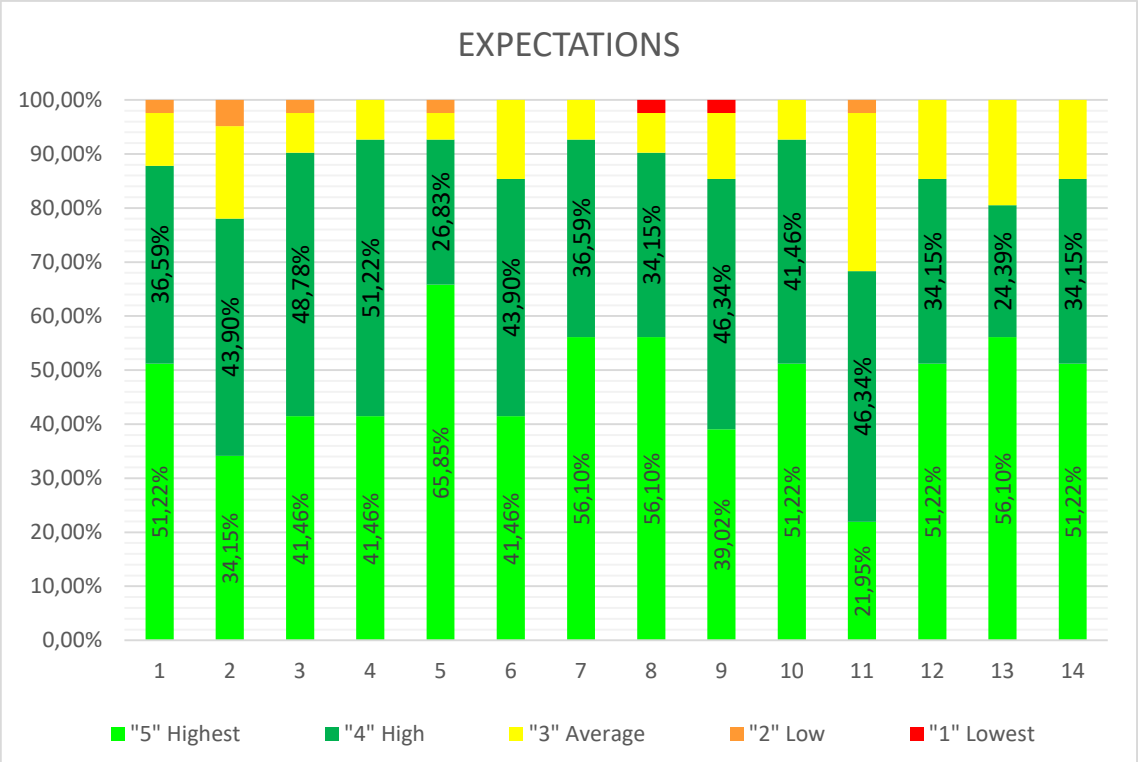


Figure 2. *Students' level of EXPECTATIONS about improving their skills questioned in Survey 1 Q1 to Q14*

An important part of the selection is the students' expectations from the atelier. The first survey on what they believe they will achieve working in this atelier was determined with 14 questions related with different aspects of architectural design.

Q1 and Q2 Manifesto: "5:highest" evaluation was 51,22% and 34,15% respectively. The other results were 36,59% and 43,90% "4:High". This shows that *the students' expectations on understanding of the manifesto* were significantly high.

Q3 to Q5 : Research: "5:highest" evaluation was 41,46%, 41,46% and 65,85% respectively. The "4 high" results were 48,78%, 51,22% and 226,83 respectively. This shows that the students' expectations on *their research and understanding the history of the site and the values that come with it* were significantly high.

Q6 to Q8: Concept: "5:highest" evaluation was 41,46%, 56,10% and 39,02% respectively. The "4 high" results were 43,90%, 36,59% and 34,15% respectively. This shows that the students' expectations on *achieving success on presenting their concepts* were significantly high.

Q9 to Q11 : Design: "5:highest" evaluation was 39,02%, 51,22% and 21,95% respectively. The "4 high" results were 46,34%, 41,46% and 46,34% respectively. This shows that the students' expectations on *achieving success on their designs* were moderately high.

Q12 to Q14: Presentation: "5:highest" evaluation was 51,24%, 56,10% and 51,22% respectively. The "4 high" results were 34,15%, 24,39% and 34,15% respectively. This shows that the students' expectations on *achieving success on their presentations* were significantly high.

It is possible to understand that the students were very expectant and optimistic of the atelier, however they were mostly dubious on their proposal of multiple solutions for multiple time spatial sections of the project.(Q11)

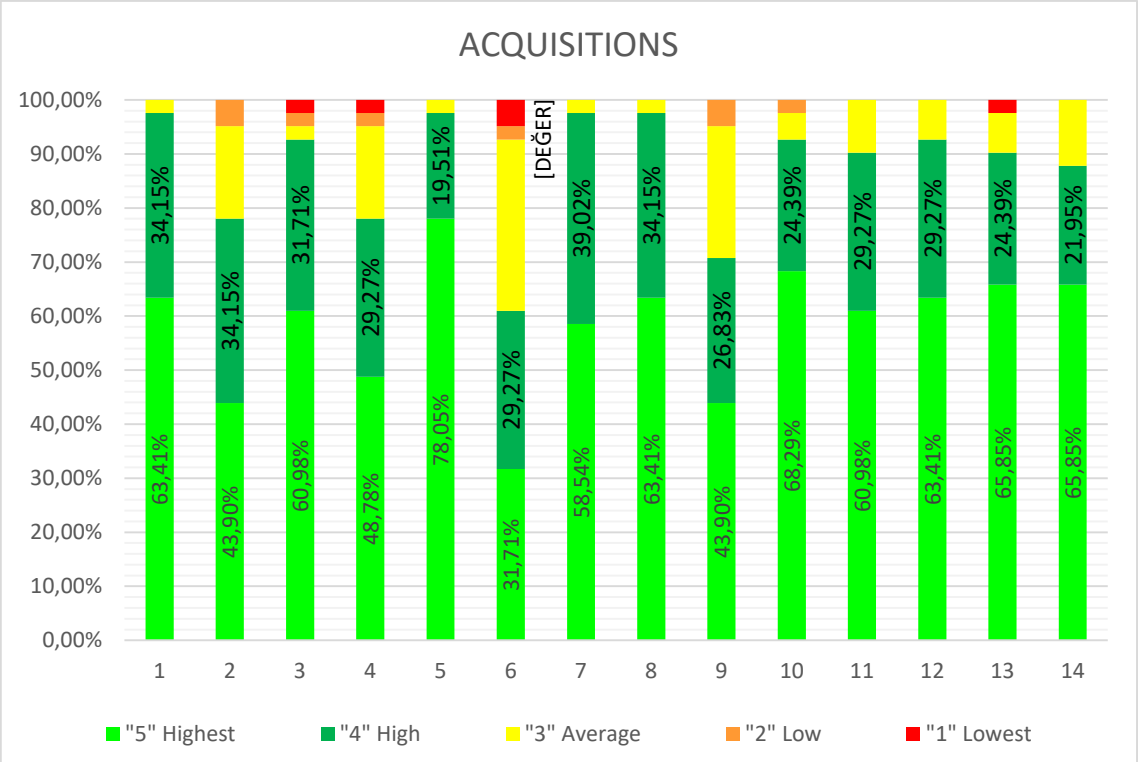


Figure 3. *Students' level of ACQUISITIONS from the project at the end of the semester questioned in Survey 2 Q1-Q14*

Q1 and Q2 Manifesto: "5:highest" evaluation was achieved in the *understanding of the manifesto* questions were 63,41% and 43,90% respectively. The other results were 34,15% and 34,15% "4:High".

Q3 to Q5 : Research: "5:highest" evaluation was 60,98%, 48,78% and 78,05% respectively. The "4 high" results were 31,71%, 29,27% and 19,51% respectively. This shows that the students' acquisitions on their *research and understanding the history of the site and the values that come with it* were significantly high.

Q6 to Q8: Concept: "5:highest" evaluation was 31,71%, 58,54% and 63,41% respectively. The "4 high" results were 29,27%, 39,02% and 34,15% respectively. This shows that the students' acquisitions on *achieving success on presenting their concepts* were moderately high but slightly low on getting inspiration from other fields.

Q9 to Q11 : Design: "5:highest" evaluation was 43,90%, 68,29% and 60,98% respectively. The "4 high" results were 26,83%, 24,39% and 29,27% respectively. This shows that the students' acquisitions *on achieving success on their designs* were moderately high but slightly low on using different materials for design.

Q12 to Q14: Presentation: "5:highest" evaluation was 63,41%, 65,85% and 65,85% respectively. The "4 high" results were 29,27%, 24,39% and 21,95% respectively. This shows that the students' acquisitions on *achieving success on their presentations* were significantly high.

It is possible to understand that the students were mostly satisfied by their final projects and were only disappointed by their *development of inspiration with other science / art / culture branches and reflected them to their projects* (Q6) and, they were disappointed by the lack of having a chance to *work with different materials* and approach a creative design process due to closure of schools and not being able to make any models and mock-ups. (Q9)

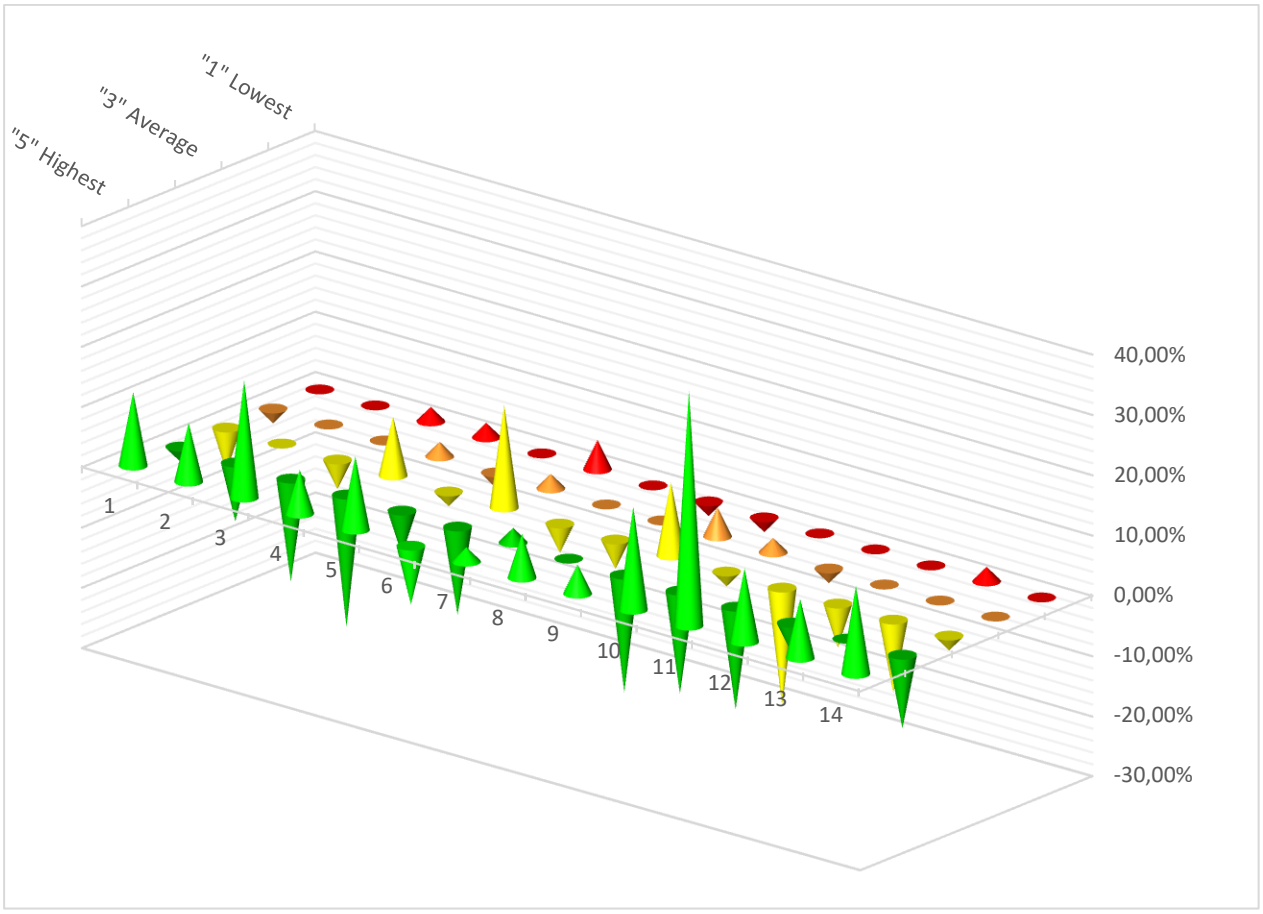
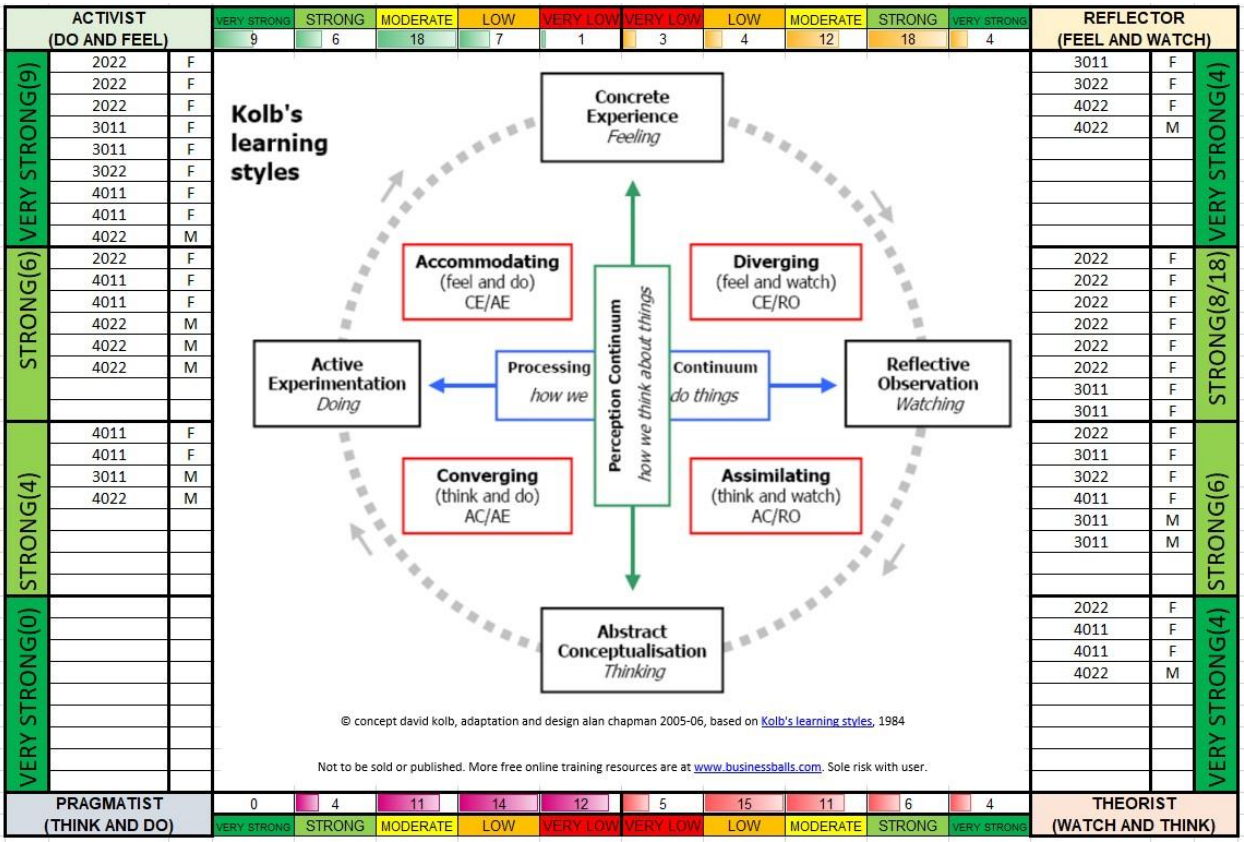


Figure 4. *Students' Primary Expectations versus Students' Acquisitions They Believe They Derived at the end of the semester (Percentile differences between answers to cross related questions Survey 1 Q1-Q14 and Survey 2 Q1 to Q14) (Direction of cones, represent INCREASING / DECREASİNG values in respective answers)*

The first evaluation of this study emphasizes on the differences between the acquisitions and expectations of atelier participant. After the final submission, the students' ACQUISITIONS survey shows their *understanding the subject and the workshop program*(Q1) and the question about *applying the manifesto to project(Q2)* has slightly increased since beginning of the semester. The "5:Highest" answers for all 3 questions (Q3-5) increased slightly about *learning from the history / understanding possibilities of the site / and deploying the requirements of the program to the project* when compared with their expectations. Remarkably the question related to *developing a program by learning from other sciences (Q6)* have decreased significantly in "5: Highest" answers and even "1:Lowest" answers were observed. Also, the questions (Q7-8) about *developing an original program for the subject / analyzing the strengths and weaknesses of the site use it in the project* seems to have increased slightly to "5:Highest" answers at the end of the semester. Another Interesting result was the decline of the "4:high" answers on question related with *working with different materials and tools (Q9)* to "3:Moderate" answers. This shows that the lack of model/mock-up making due to closure of schools were reflected in this decline. Other than that the "4:high" answers for questions (Q10 & 11) about *presenting their design decisions in their works and received feedback and reflected them to their project* and *propose multiple answers to two time/spatial sections of the project* increased slightly to "5:Highest" The "5:highest" answers for all 3 questions (Q12-14) increased slightly, about *making the necessary drawings / learning to use different presentation programs / preparing presentation sheets* at the final submission when compared to the expectations of the semester.

The second eveluation of this study emphasizes on how each type of learner responded to the surveys applied at the beginning and the end of the semester and how the way of learning of each type of learner is efected by their expectations and acquisitions (or vica versa)

Table 2. *The Number of Students of each Learning Type (Activists / Reflectors / Theorists / Pragmatists) in this study (5: Very Strong, 4: Strong, 3: Moderate, 2: Low, 1: Very Low) distributed around KOLB's Learning Styles [3],[10] by the author (2021)*



The table shows how many / how intense of each learning type are distributed among students in this study

There were 9 VERY STRONG ACTIVIST Learners and 6 STRONG ACTIVIST Learners

There were 4 VERY STRONG REFLECTOR Learners and 18 STRONG REFLECTOR Learners

There were 4 VERY STRONG THEORIST Learners and 6 STRONG THEORIST Learners

There were 0 VERY STRONG PRAGMATIST Learners and 4 STRONG PRAGMATIST Learners

The table shows that a very high number of very strong (4) and strong REFLECTOR Learners (18) that feel and watch for learning. Also, a high number of very strong ACTIVIST Learners (9) and very few very strong PRAGMATIST Learners (0) are among students. This is an indication that participating students tend to feel, watch, and do their designs rather than thinking about it. Similarly, there are a lot of students tend to watch and learn from the lecturer (or other students) while designing their projects rather than thinking about it. The use of feeling when designing is also a very important part of their design process rather than thinking about it. A comparative evaluation between the 4 Types of learning of students' Primary Expectations versus Final Acquisitions from the Atelier Study was made to clarify the hypothesis of this study.

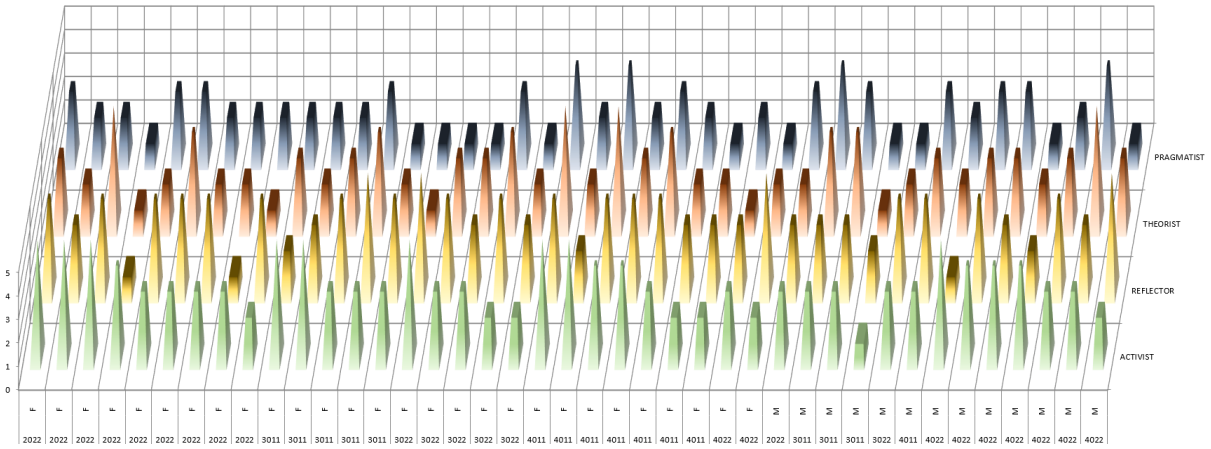


Figure 5. *The distribution of each Learning Type of all participanting student including the intensity of each type of learning (5: Very Strong, 4: Strong, 3: Moderate, 2: Low, 1: Very low) shown as pyramidal representation*

Figure 5 shows that each student can be more then one type of learner. (i.e. A very strong ACTIVIST student can also be a strong reflector. A very strong theorist can also show results for a strong pragmatist. i.e.)

This Group of Students that participated in this study were firstly REFLECTIVE Learners (22) (FEEL AND WATCH), secondly ACTIVIST Learners (15) (DO AND FEEL), thirdly THEORIST Learners (10) (WATCH AND THINK) and finally PRAGMATIST learners (4) (THINK AND DO).

Pure learners:

Among 15 ACTIVIST Learners 8 of them showed no strength in other learning types (%53,3)

Among 22 REFLECTIVE Learners 11 of them showed no strength in other learning types (%50,0)

Among 10 THEORIST Learners 1 of them showed no strength in other learning types (%10,0)

Among 15 PRAGMATIST Learners 0 of them showed no strength in other learning types (%0,0)

Collective Learners

Seven Students were (at least) strong ACTIVIST and strong REFLECTOR at the same time.

Three Students were (at least) strong ACTIVIST and strong THEORIST at the same time.

Two Students were (at least) strong ACTIVIST and strong PRAGMATISTat the same time.

Seven Students were (at least) strong REFLECTOR and strong THEORIST at the same time.

Two Students were (at least) strong REFLECTOR and strong PRAGMATIST at the same time.

Four Students were (at least) strong THEORIST and strong PRAGMATISTat the same time.

- 2 Students showed strength in all four Learning types
- 1 Student showed strenght in 3 Learning types (Exclusion: PRAGMATIST)
- All 4 PRAGMATIST Learner students were also strong THEORIST Leraners.(%100)

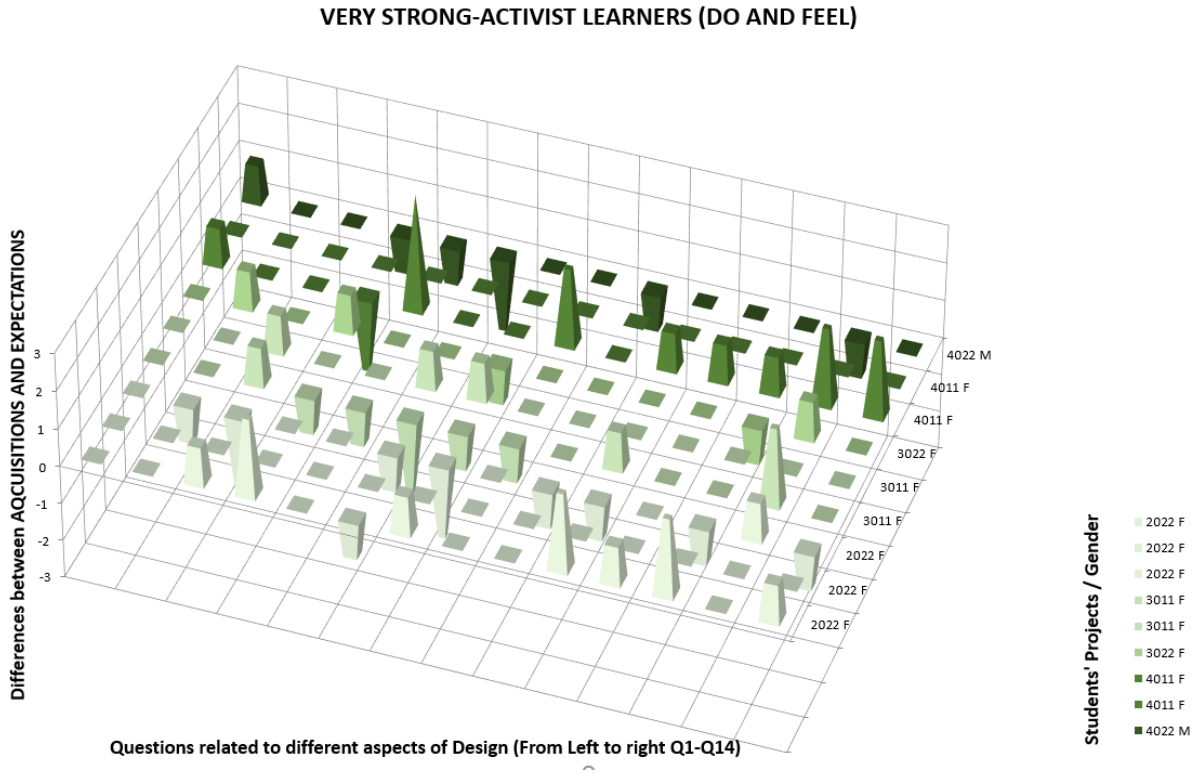


Figure 6*. Nine Very Strong ACTIVIST Learner (DO AND FEEL) versus The Difference between their Final ACQUISITIONS and Primary EXPECTATIONS (Positive values reflect the increase in satisfaction at the end of semester over different aspects of design questioned in the surveys)*

Q1 and Q2 Manifesto: Among 9 ACTIVIST Learner 3 Students Showed +1 increase in their satisfaction at the end of the semester about *understanding the subject and the workshop program*(Q1) and the question about *applying the manifesto to project (Q2)*. Only 1 Student showed -1 decrease.

Q3 to Q5 : Research: Among 9 ACTIVIST Learner Students, 1 showed +3, 1 showed +2 and 4 Students Showed +1 increase in their satisfaction, at the end of the semester about their *learning from the history (Q3) understanding possibilities of the site (Q4) and deploying the requirements of the program to the project(Q5)* when compared. Only 1 Student showed -2 and 4 students showed -1 decrease

Q6 to Q8: Concept: Among 9 ACTIVIST Learner Students, 1 showed +2, 3 showed +1 increase in their satisfaction at the end of the semester about *developing a program by learning from other sciences (Q6)* about *developing an original program for the subject (Q7) analyzing the strengths and weaknesses of the site use it in the project(Q8)* 3 Students showed -2 and 5 students showed -1 decrease.

Q9 to Q11 : Design: Among 9 ACTIVIST Learner Students, 1 Showed +2, 4 showed +1 increase in their satisfaction at the end of the semester about *working with different materials and tools* (Q9) *presenting their design decisions in their works and received feedback and reflected them to their project (Q10) propose multiple answers to two time/spatial sections of the project (Q11)* 3 showed -1 decrease.

Q12 to Q14: Presentation: Among 9 ACTIVIST Learner Students, 3 showed +2, 3 showed +1 increase in their satisfaction at the end of the semester about *making the necessary drawings (Q12) learning to use different presentation programs (Q13) preparing presentation sheets (Q13)* 2 showed -1 decrease.

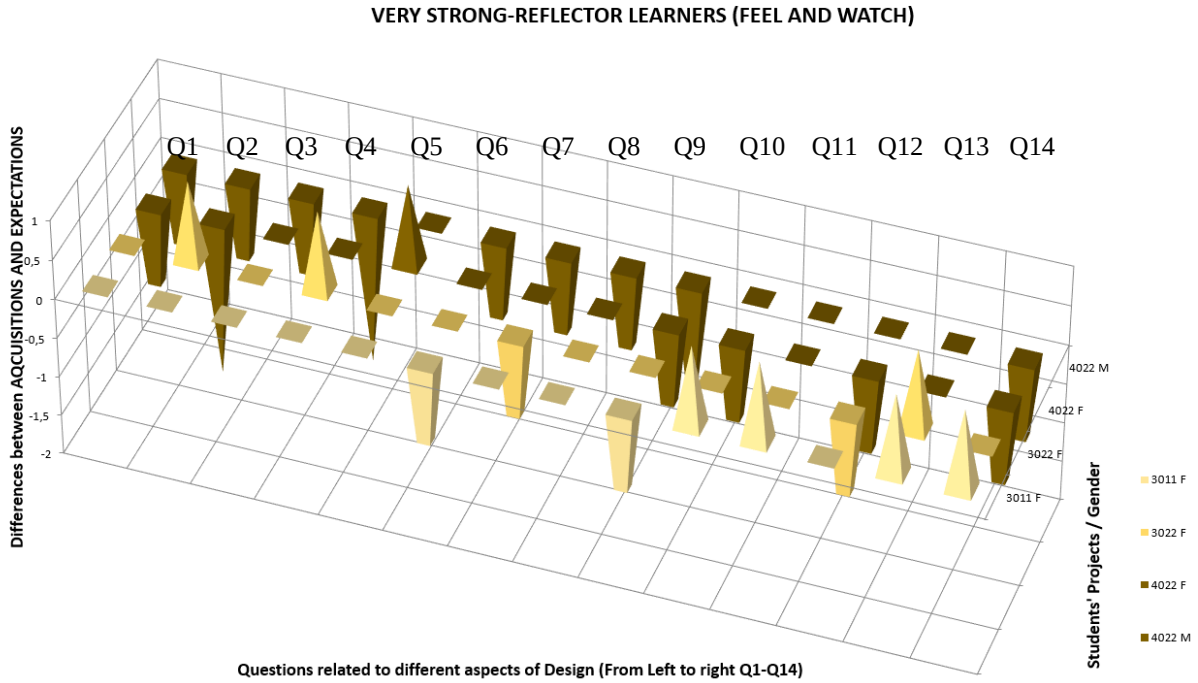


Figure 7. *Four Very Strong REFLECTOR Learner (FEEL AND WATCH) versus The Difference between their Final ACQUISITIONS and Primary EXPECTATIONS (Positive values reflect the increase in satisfaction at the end of semester over different aspects of design questioned in the surveys)*

Q1 and Q2 Manifesto: Among 4 REFLECTOR Learner Students, 3 Showed -1 decrease in their satisfaction at the end of the semester about *understanding the subject and the workshop program*(Q1) and the question about *applying the manifesto to project (Q2)*. Only 1 student showed -2 decrease.

Q3 to Q5 : Research: Among 4 REFLECTOR Learner Students, 2 Showed +1 increase in their satisfaction at the end of the semester about their *learning from the history / understanding possibilities of the site / and deploying the requirements of the program to the project* when compared. Only 1 student showed -2 decrease.

Q6 to Q8: Concept: Among 4 REFLECTOR Learner Students, 3 Showed -1 decrease in their satisfaction at the end of the semester about *developing a program by learning from other sciences (Q6)* about *developing an original program for the subject (Q7) analyzing the strengths and weaknesses of the site use it in the project(Q8)*

Q9 to Q11 : Design: Among 4 REFLECTOR Learner Students, 1 Showed +1 increase in their satisfaction at the end of the semester about *working with different materials and tools* (Q9) *presenting their design decisions in their works and received feedback and reflected them to their project (Q10) propose multiple answers to two time/spatial sections of the project (Q11)* 3 students showed -1 decrease.

Q12 to Q14: Presentation: Among 4 REFLECTOR Learner Students, 2 Showed +1 increase in their satisfaction at the end of the semester about *making the necessary drawings (Q12) learning to use different presentation programs (Q13) preparing presentation sheets (Q13)* 2 student showed -1 decrease.

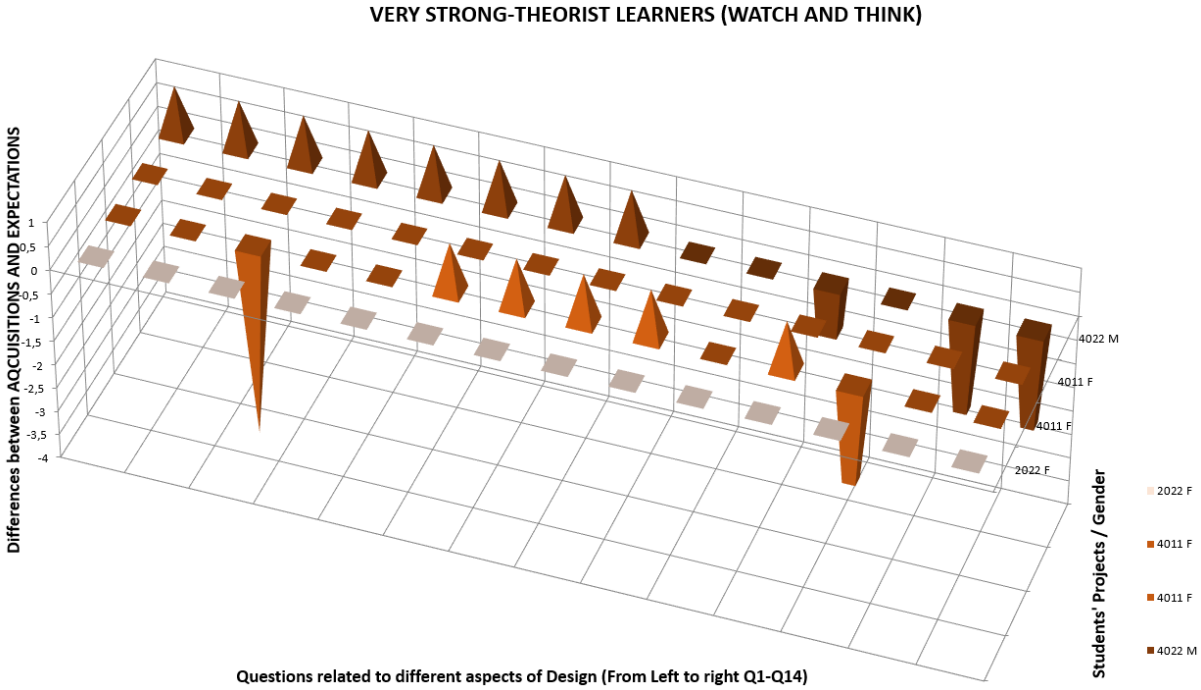


Figure 8. *Four Very Strong THEORIST Learner (WATCH AND THINK) versus The Difference between their Final ACQUISITIONS and Primary EXPECTATIONS (Positive values reflect the increase in satisfaction at the end of semester over different aspects of design questioned in the surveys)*

Q1 and Q2 Manifesto: Among 4 THEORIST Learner Students, 1 Showed +1 increase in their satisfaction at the end of the semester about *understanding the subject and the workshop program*(Q1) and the question about *applying the manifesto to project (Q2).*

Q3 to Q5 : Research: Among 4 THEORIST Learner Students, 1 Showed +1 increase in their satisfaction at the end of the semester about their *learning from the history / understanding possibilities of the site / and deploying the requirements of the program to the project* when compared. Only 1 student showed -4 decrease.

Q6 to Q8: Concept: Among 4 THEORIST Learner Students, 2 Showed +1 increase in their satisfaction at the end of the semester about *developing a program by learning from other sciences (Q6)* about *developing an original program for the subject (Q7) analyzing the strengths and weaknesses of the site use it in the project(Q8).*

Q9 to Q11 : Design: Among 4 THEORIST Learner Students, 1 Showed +1 increase in their satisfaction at the end of the semester about *working with different materials and tools* (Q9) *presenting their design decisions in their works and received feedback and reflected them to their project (Q10) propose multiple answers to two time/spatial sections of the project (Q11)* Only 1 student showed -1 decrease.

Q12 to Q14: Presentation: Among 4 THEORIST Learner Students, None Showed increase in their satisfaction at the end of the semester about *making the necessary drawings (Q12) learning to use different presentation programs (Q13) preparing presentation sheets (Q13)* 2 student showed -2 decrease.

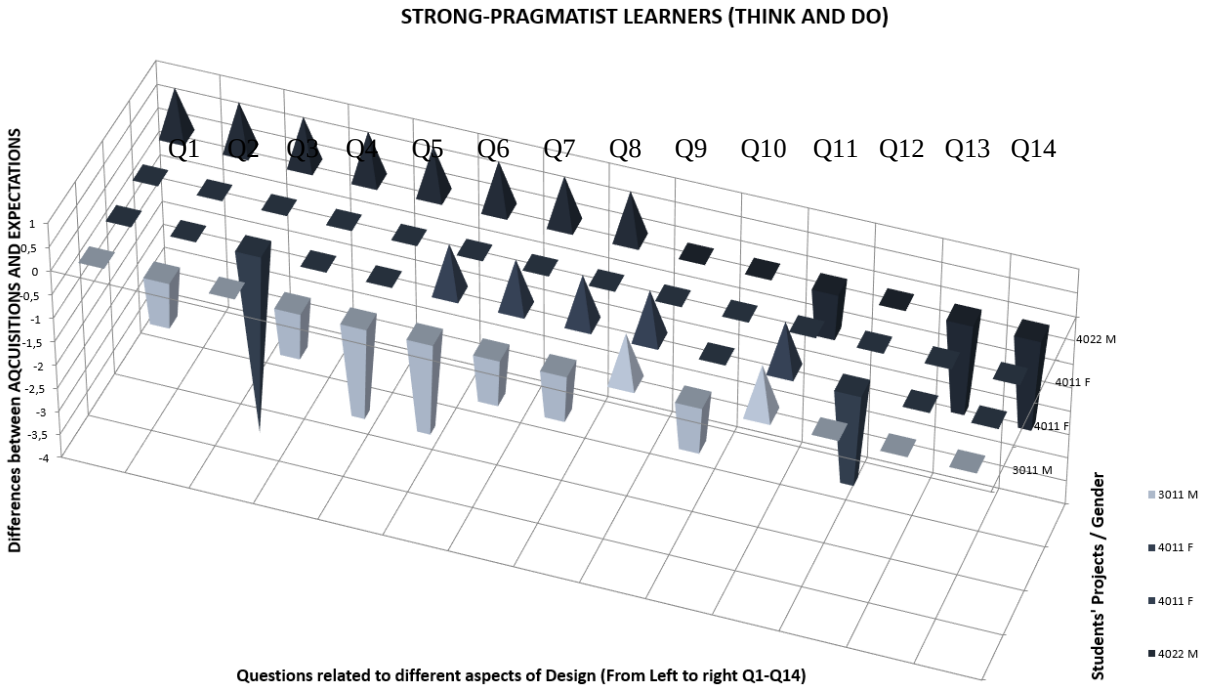


Figure 9. *Four Strong PRAGMATIST Learner (THINK AN DO) versus The Difference between their Final ACQUISITIONS and Primary EXPECTATIONS (Positive values reflect the increase in satisfaction at the end of semester over different aspects of design questioned in the surveys)*

Q1 and Q2 Manifesto: Among 4 PRAGMATIST Learner Students, 1 Showed +1 increase in their satisfaction at the end of the semester about *understanding the subject and the workshop program*(Q1) and the question about *applying the manifesto to project (Q2)*. Only 1 student showed -1 decrease.

Q3 to Q5 : Research: Among 4 PRAGMATIST Learner Students, 1 Showed +1 increase in their satisfaction at the end of the semester about their *learning from the history / understanding possibilities of the site / and deploying the requirements of the program to the project* when compared. 1 student showed -4 decrease. Another student showed -1 and -2 decrease.

Q6 to Q8: Concept: Among 4 PRAGMATIST Learner Students, 2 Showed +1 increase in their satisfaction at the end of the semester about *developing a program by learning from other sciences (Q6)* about *developing an original program for the subject (Q7) analyzing the strengths and weaknesses of the site use it in the project(Q8)* Only 1 student showed -1 and -2 decrease.

Q9 to Q11 : Design: Among 4 PRAGMATIST Learner Students, 2 Showed +1 increase in their satisfaction at the end of the semester about *working with different materials and tools* (Q9) *presenting their design decisions in their works and received feedback and reflected them to their project (Q10) propose multiple answers to two time/spatial sections of the project (Q11)* Only 1 student showed -1 decrease.

Q12 to Q14: Presentation: Among 4 PRAGMATIST Learner Students, None Showed increase in their satisfaction at the end of the semester about *making the necessary drawings (Q12) learning to use different presentation programs (Q13) preparing presentation sheets (Q13)* 2 student showed -2 decrease.

4. RESULTS

At the beginning of the semester all the students were highly expectant of the atelier, the subject, and the earnings they believed they would derive from the semesters' project study. There were a high number of "5:Highest" and "4:High" expectation answers and no "2:low of "1:lowest" answers. That might be predictable for any research that evaluates the primary expectations of a student while choosing an Atelier for a semesters' Architectural Project Lesson. (Figure 3)

The students have answered the ACQUISITIONS survey at the 15^{Th} week (Finals Submission Week) When we compare the students' EXPECTATIONS at the beginning of the semester and their ACQUISITIONS, they believe they derived after the final submission,

The final ACQUISITIONS of the students' that they believe they derived from the semester exceeded their primary EXPECTATIONS which were answered at the beginning of the semester in 13 of 14 questions. This show that either their expectations were mostly satisfied at the end of the semester, and they believe that they have shown enough improvement throughout the semester.

The only expectation was the Question 6: *Concept: I developed my sources of inspiration with other science / art / culture branches and reflected them to my project.* This answer showed decline in "5: Highest" and "4:"high" answers and an increase in "3: "Moderate" answers. This shows that the disruption of the education period due to the pandemic caused the students lose sight of gaining enough inspiration from other disciplines and sciences when forming their concepts and may have lost touch with the coordinators who might have guided them to investigate other fields for a more enhanced concept development period.

Another slight decline was observed on the "4:high" answers on question related with *working with different materials and tools* (Q9) to "3:Moderate" answers. This shows that the lack of model/mock-up making due to closure of schools were an important issue for students when bringing their concepts to their final designs. The online studies implemented caused students to make 3D models rather than mock-ups and this might have triggered the lack of feel of the materials.

As a Result, by applying a questionnaire to a group of atelier participants that consist of varying age and experience levels that value their opinions on their personal gains on varying aspects of architectural design at two different stages of the semester, it is possible to understand and evaluate the Atelier participant Students' ideas and opinions of their early Expectations, and final Acquisitions from the Architectural Project as an important shareholder of the Architectural education. This method is believed to be an effective method to understand and reshape the structure of the Atelier in a way that the student would benefit more from. Similar research can be conducted with larger groups of students in the following terms.

And it can be concluded that the varying types of learning of each student is clearly significantly reflected when their primary expectations and final acquisitions are comparatively evaluated. VERY STRONG ACTIVIST students' satisfaction was at balance. (Figure 6) Especially VERY STRONG REFLECTOR students that prefer to FEEL and WATCH suffered heavily from this lack of connection in this disrupted education period (Figure 7). VERY STRONG THEORIST AND STRONG PRAGMATIST students were mostly satisfied. (Figure 8 & 9)

CONFLICTS OF INTEREST

No conflict of interest was declared by the author.

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