# **An Investigation of University Students' Quality of Life and Exercise Awareness**

#### **OPEN ACCESS**

Volume: 9

Special Issue: 2

Month: September

Year: 2021

E-ISSN: 2582-1334

Received: 12.07.2021

Accepted: 28.08.2021

Published: 15.09.2021

#### Citation:

Çakiroğlu, Temel. "An Investigation of University Students' Quality of Life and Exercise Awareness." *Shanlax International Journal of Education*, vol. 9, no. S2, 2021, pp. 59–67.

## DOI:

https://doi.org/10.34293/education.v9iS2-Sep.4371



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#### Abstract

The aim of this study is to examine university students' quality of life and perceptions of exercise benefits and barriers according to the variables of department, class, family income, mother's education and father's education status. The research was designed in relational screening model. In this context, a total of 162 female university students studying at Gazi University Faculty of Sports Sciences, Department of Coaching, Sports Management and Recreation voluntarily participated in the study. As data collection tools in the research; Personal Information Form, Exercise Benefit/ Barriers Scale and Quality of Life Scale prepared by the researchers were used. In the analysis of the data, descriptive statistics, independent sample t-test, One-Way ANOVA, Pearson Product-Moment Correlation test were used. When the findings obtained within the scope of the research were examined, it was determined that there was a significant difference between the participants' quality of life and exercise awareness levels was examined, it was determined that there was a positive and significant relationship between quality of life and exercise benefit.

Keywords: Quality of life, Exercise, Perception.

#### Introduction

Today, with the rapid increase in the rate of urbanization and industrialization in parallel with technological developments, extremely radical changes have occurred in the lifestyles of people and nations. People have become less active with each passing day, and their physical activities have gradually decreased, leaving their place to mental work (Zorba, 2001). In this context, doing sports emerges as a compulsory requirement to keep the organism fit and healthy. Eating, drinking, sleeping, etc. Like daily needs, sports are accepted as a need that is at least as important as these needs and affects health positively, ensures regular functioning of the digestive, circulatory and nervous system, and prolongs life (Erkan, 2000). Developed countries have carried out many studies on university students and with these studies, they aimed to raise young people who can carry their responsibilities, have a healthy body, as well as social and mental equipment such as knowledge and culture (Er, 2010).

In recent years, it has been seen that the quality of life is as important as the length of life. Health-related quality of life reflects the physical, psychological and emotional dimensions of health (Vergili, 2012). Quality is the feature that indicates how a person, object or experience is qualitatively, and that can measure and evaluate its distinctive superiority from other things. In other words, quality is a quality characteristic that determines a person's intellectual and moral nature (Zorba, 2009). Quality of life is the state of being satisfied and happy with the wishes of the person in the areas that she finds important in her life and what she has (Taṣpınar, 2013).

Quality of life is examined from two perspectives, objective and subjective, and subjective quality of life measures; families' satisfaction or dissatisfaction with life, and objective quality of life measures include income, housing, quality of the residential neighborhood, health, etc. reflects the living conditions (Aydiner, 2008).

In order for individuals to be healthy, to know themselves, to be aware of their abilities and competencies, and to realize their full potential, they need to consciously use their spare time. Participating in sports activities is essential for the physical and mental development and socialization of children and young people, and for adults and the elderly to live healthy, since the human organism's organism remains healthy and depends on its dynamism and mobility (Taşpınar, 2013). According to researchers on quality of life, quality of life indicators vary depending on the individual and his/her environment, and are generally grouped into four groups as indicators determining physical, socio-economic, psychological and family status and are examined with different sub-questions. In order to be able to talk about quality of life, sufficient expressions of satisfaction are required in all of these parameters. A person's quality of life, in other words, is satisfaction with life. In general, a person who has a good quality of life, is satisfied with his life and is satisfied with his job, is happy with his job, on the other hand, this situation increases the job performance of the person and the job is much more successful (Gönülateş, 2016).

Perception of benefit; It contributes to learning the effects of behaviors that will improve or protect the health of the individual on the quality of life and healthy life span (Batlas et al, 2008). The perception of disability depends on internal and external factors that negatively affect the realization of health-promoting behaviors. Blocking factors; physical and environmental characteristics, health status of the individual and personal reasons. The main reason that reduces the possibility of activating and maintaining positive health behavior is the difference between the perception of disability and the perception of benefit. As the perception of benefit is higher than the perception of obstacle, the probability of performing positive behaviors increases (Maurer & Smith,

2000). The quality of life, which is one of the most basic universal goals that societies strive to achieve today, is affected by all areas of life, so individuals' gender, age, marital status, characteristics of the residence, health conditions, social support status, education levels, income status, business life and satisfaction are affected by all areas that affect life, such as activities they do in their spare time (Aydiner & Paçacioğlu, 2016). Although it is known that it has many benefits, it has been reported that the level of physical activity decreases gradually, especially in university students, which reflects the majority of the young adult population, with the advancement of technology in recent years, and as a result, disorders in the physical, psychological and social health of individuals occur (Allison, Adlaf, Dwyer, Lysy & Irving, 2007).

Quality of life, which is one of the most important universal goals that societies aim to achieve today, covers all areas of life and is thus affected by all areas of life. It is important for university students to form health awareness and to know their perceptions, beliefs and behaviors about exercise in terms of quality of life. Therefore, in the light of this information, the aim of the research is; The aim of this study is to examine university students' quality of life and perceptions of exercise benefits and obstacles according to the variables of department, class, family income, mother's education and father's education status.

## Method

## Research Model

This research was designed in relational screening model. Relational studies aim to determine the relationships between two or more variables and the existence or degree of change between these variables (Creswell & Creswell, 2017).

## **Research Group**

A total of 162 female university students studying at Gazi University, Faculty of Sports Sciences, Department of Coaching, Sports Management and Recreation voluntarily participated in the research. Descriptive statistics for the research group are presented in Table 1.

Table 1: Demographic Information of Female Individuals Participating in the Research

Variable	Variable					
Section	Sports Science Faculty	88	54.3			
	Sports Science Faculty Other  1 2 3 4 Very Bad Bad Middle Good Very Good Very Good Primary Education Status  Mother Education Status Education	74	45.7			
	1	47	29.0			
Class	2	58	35.8			
Class	3	35	21.6			
	4	22	13.6			
	Very Bad	17	10.5			
	Bad	20	12.3			
-	Middle	62	38.3			
Status	Good	43	26.5			
	Very Good	20	12.3			
	1 *	19	11.7			
Education	1 *	46	28.4			
Status	Licence	68	42.0			
	Graduate	29	17.9			
		24	14.8			
Father Education	Secondary Education	35	21.6			
Status	Licence	68	42.0			
	Graduate	35	21.6			

## Data Collection Tools Personal Information Form

The form created by the researchers consists of questions containing demographic information about department, class, family income status, mother and father education level.

## **Quality of Life Scale**

The Quality of Life Scale "World Health Organization Quality of Life (WHOQOL-BREF)" consisting of 23 items and 5 sub-dimensions developed by WHO (1998) was used to evaluate the quality of life of the research group. Sub-dimensions of the scale; Physical Quality (3 items), Psychological Quality (5 items), Social Quality (3 items), Environmental Quality (6 items), Independence Quality (6 items). In each of the scales used in the research, a 5-point Likert Scale, which is

accepted as an intermittent measurement level, was used. The Turkish validity and reliability study of the scale was conducted by Sevil (2015). Unlike the Quality of Life Scale developed by WHO, a fourfactor structure consisting of 15 items with high factor load values and common variance values was obtained in the Turkish version of the scale. The quality of life scale supported the 14-item, 3-factor structure for this study and its reliability coefficients were 0.779 in the "physical and environmental quality" sub-dimension; 0.815 in the "social quality" sub-dimension; It is seen that it is 0.802 in the "psychological quality" sub-dimension. Principal Components According to the patterns after the varimax transformation of the 3 factors that emerged in the factor analysis, the items explain 59.731% of the scale.

## **Exercise Benefits/Barriers Scale**

The exercise benefit and barriers scale was used to look at awareness. The Exercise Benefit/ Barriers scale consisting of 43 items, which was developed by Sechrist, Walker and Pender in 1987 to determine the perceptions of exercise benefits and barriers for individuals who will participate in exercise, and which was translated into Turkish by Ortabağ (2010), will be used.

Scoring of the scale: "The scale can be used as a whole and scored, or it can be used as two separate scales. The scale has 4 answers from 4 (strongly agree) to 1 (strongly disagree) in conditioned-choice Likert scale format. Barriers scale items 4, 6, 9, 12, 14, 16, 19, 21, 24, 28, 33, 37, 40 and 42, utility scale items 1, 2, 3, 5, 7, 8, 10, 11, 13, 15, 17, 18, 20, 22, 23, 25, 26, 27, 29,30, 31, 32, 34, 35, 36, 38, 39, 41 and 43 items. By collecting these items, barriers and benefit points are obtained. The minimum score that can be obtained from the scale is 43, and the highest score is 172. The higher the score, the more the individual believes in the benefits of exercise. When the utility scale is used alone, the score range is from 29 to 116. When the barriers scale is used alone, the score range is from 14 to 56. Hence, the higher the score, the greater the perception of obstacles to exercise.

## **Analysis and Interpretation of Data**

Normality assumptions were first examined in the evaluation of the data. Accordingly, it was determined that the skewness and kurtosis coefficients for the variables were in the range of -1

and +1, and it was seen that the data were normally distributed (Tabachnick & Fidell, 2013). In this context, descriptive statistics, independent sample t-test, One-Way ANOVA, Pearson Product-Moment Correlation test were used in the analysis of the data.

## **Findings**

Table 2: T-Test Results of Participants' Quality of Life and Exercise Awareness Levels by Division

Sub Dimensions	Section	N	$\overline{X}$	Sd	t	р
Life	SSF	88	3.37	.33	1 560	.12
Quality	Other	74	3.27	.41	1.560	.12
Exercise	SBF	88	2.37	.21	015	.98
Barriers	Other	74	2.36	.28	.015	.98
Exercise	SBF	88	2.32	.14	4.220	.00*
Benefits	Other	74	2.24	.11	4.220	.00*

p<.05\*

When Table 2 is examined, participants' quality of life and exercise awareness levels differed significantly in the "exercise benefit" sub-dimension, while no significant difference was found in the other

sub-dimensions. A difference was found in favor of the Faculty of Sport Sciences in the exercise benefit (t=4.220; p<.05) sub-dimension.

Table 3: One-Way ANOVA Results of Participants' Quality of Life and Exercise
Awareness Levels by Class

	Class	N	$\overline{X}$	Sd	df	F	P	Tukey
	1	47	3.49	.27	3		.00*	1>2-3-4
Life Quality	2	58	3.31	.34	158	6.031		
	3	35	3.17	.45	161			
	4	22	3.24	.37				
	1	47	2.32	.33	3			
Exercise Barriers	2	58	2.44	.18	158	1 4 926   90*	2 1 2	
	3	35	2.26	.15	161	4.820	4.826   .00*	2>1-3
	4	22	2.41	.25				

p<.05\*

When Table 3 is examined, participants' quality of life and exercise awareness levels are in the sub-dimensions of "quality of life" [F(3,158)=6.031, p<.05] and "exercise disability" [F(3,158)=4.826, p<.05]. a significant difference was found. No significant difference was found in the other sub-dimension according to the class (p>.05).

According to the multiple comparison test (post-

hoc) results, in the quality of life sub-dimension, 1st class (X=3.49), 2nd class (X=3.31), 3rd class (X=3.17) and 4th class (X=3.17) X=3.24), a significant difference was found in favor of the 1st class. In the exercise barrier sub-dimension, a significant difference was found between the 2nd grade (X=2.44), the 1st grade (X=2.32) and the 3rd grade (X=2.26) in favor of the 2nd grade.

Table 4: One-Way ANOVA Results of Participants' Quality of Life and Exercise
Awareness Levels by Family Income

Variables	Family Income	N	$\overline{X}$	Sd	df	F	P	Tukey
	1. Very Bad	17	3.33	.24				
	2. Bad	20	3.47	.18	4			
Life Quality	3. Medium	62	3.42	.32	157	12.512	.00*	5<1-2-3-4
	4. Good	43	3.33	.29	161			
	5. Very Good	20	2.85	.53				
	1. Very Bad	17	2.26	.10				
	2. Bad	20	2.25	.18	4			
Exercise	3. Medium	62	2.34	.11	157	5.116	.00*	3>4
Benefits	4. Good	43	2.23	.13	161			
	5. Very Good	20	2.29	.10				

When Table 4 is examined, the participants' quality of life and exercise awareness levels are subdimensions of "quality of life" [F(4,157) = 12.512, p<.05] and "exercise benefit" [F(4,157) = 5.116, p<.05] according to family income. A significant difference in size was found. No significant difference was found in the other sub-dimension according to family income (p>.05). According to the multiple comparison test (posthoc) results, in the quality of life sub-dimension, very good (X=2.85), very bad (X=3.33), bad (X=3.47), moderate (X=3.42) and good (X=3.33) there was a significant difference in favor of bad. In the exercise benefit sub-dimension, a significant difference was found between moderate (X=2.34) and good ( $\overline{\mathbf{X}}$ =2.24) in favor of moderate.

Table 5: One-Way ANOVA Results of Participants' Quality of Life and Exercise Awareness Levels by Mother's Educational Status

Variables	Mother Education	N	X	Sd	df	F	P	Tukey
	1.Elementary Education	19	3.43	.24	3		.03*	
Life Quality	2. Secondary Education	46	3.40	.30	158	2.845		4< 2
	3. License	68	3.31	.39	161	2.043		4 2
	4. Graduate	29	3.17	.45				
	1.Elementary Education	19	2.34	.11	3			
Exercise Benefits	2. Secondary Education	46	2.31	.12	158	3.596	.01*	4< 1
	3. License	68	2.27	.14	161	3.390		4 1
	4. Graduate	29	2.23	.12				

When Table 5 is examined, participants' quality of life and exercise awareness levels according to maternal education status are "quality of life" [F(3,158)=2.845, p<.05] and "exercise benefit" [F(3,158)=3,596, p<.05]. A significant difference was found in the sub-dimensions. In the other sub-dimension, no significant difference was found according to the educational status of the mother (p>.05).

According to the multiple comparison test (post-hoc) results, a significant difference in favor of secondary education was found between Postgraduate (X=3.17) and Secondary Education (X=3.40) in the quality of life sub-dimension. In the exercise benefit sub-dimension, a significant difference was found between Postgraduate (X=2.44) and Primary Education (X=2.32) in favor of primary education.

Table 6: One-Way ANOVA Results of Participants' Quality of Life and Exercise Awareness Levels by Father's Educational Status

Variables	Father Education	N	$\overline{X}$	Ss	df	F	P	Tukey
	1.Elementary Education	24	3.50	.19	3			1> 2
Life Ouality	2. Secondary Education	35	3.15	.40	158	4.585	.00*	
Life Quanty	3. License	68	3.34	.36	161			
	4. Graduate	35	3.15	.41				
	1.Elementary Education	24	2.60	.16	3			
Exercise Benefits	2. Secondary Education	35	2.37	.20	158	13.284	.00*	1>2 1>3 1>4
Exercise Belletits	3. License	68	2.26	.26	161	13.264	.284 .00*	1-2 1-3 1-4
	4. Graduate	35	2.39	.19				

p<.05\*

When Table 6 is examined, participants' quality of life and exercise awareness levels according to their father's education status are "quality of life" [F(3,158)=4.585, p<.05] and "exercise disability" [F(3,158)=13.284, p<.05]. A significant difference was found in the sub-dimensions. In the other sub-dimension, no significant difference was found according to the educational status of the mother (p>.05).

According to the multiple comparison test

(post-hoc) results, a significant difference in favor of primary education was found between primary education (X=3.50) and secondary education (X=3.15) in the quality of life sub-dimension. In the exercise obstacle sub-dimension, a significant difference was found between Primary Education (X=2.60) and Secondary Education (X=2.37), Undergraduate (X=2.26) and Graduate (X=2.39) in favor of Primary Education.

Table 7: The Relationship Between Participants' Quality of Life and Exercise Awareness Levels

	Life Quality	<b>Exercise Barriers</b>	<b>Exercise Benefits</b>
Life Quality	1		
Exercise Barriers	141	1	
Exercise Benefit	.124*	048	1

\*p<.05

Considering the relationship between the participants' quality of life and exercise awareness levels according to Table 7, it was determined that there was a positive and significant relationship between quality of life and exercise benefit (r= .124, p<.01).

#### **Discussion And Conclusion**

According to the results of the analysis, the quality of life and exercise awareness levels of the participants showed a significant difference in the "exercise benefit" sub-dimension, while no significant difference was found in the other sub-dimensions a difference was found in favor of the Faculty of Sport Sciences in the exercise benefit sub-dimension. The reason for this difference may be that

the exercise utility score averages of the university students attending the faculty of sports sciences are higher than the exercise benefit averages of the university students studying in other departments. Accordingly, the results of the research reveal that university students attending the Faculty of Sport Sciences have more perceptions, beliefs and behaviors related to exercise than university students studying in other departments.

A significant difference was found in the "quality of life" and "exercise barriers" sub-dimensions of the participants' quality of life and exercise awareness levels according to the class. Considering the quality of life scores, a significant difference was found between 1st grade and 2nd grade, 3rd grade and 4th grade in favor of 1st grade. In the exercise

obstacle sub-dimension, a significant difference was found between the 2nd grade, the 1st grade and the 3rd grade in favor of the 2nd grade.

A significant difference was found in the subdimensions of "quality of life" and "exercise benefit" according to family income of the participants' quality of life and exercise awareness levels. In the sub-dimension of quality of life, a significant difference was found between very good and very bad, bad, moderate and good in favor of bad. In the exercise benefit sub-dimension, a significant difference was found between moderate and good in favor of moderate.

When the literature is examined, different results have emerged from the studies on quality of life. Accordingly, challenging living conditions may adversely affect the quality of life of individuals. Because quality, in general, can be defined as the level of meeting the expectations of individuals. The difference between life expectancies and experiences forms the basis of quality perception. It can be thought that the quality of life of individuals who cannot keep up with intense, stressful and challenging living conditions will be low. It can also be stated that individuals who keep up with these conditions will be happier and have a positive perception (Taşpınar, 2013). In our rapidly developing world, while traffic, confusion and air pollution increase in constantly growing cities, the decrease in parks and sports fields may make it difficult to carry out sports activities (Tumer, 2007). In Gyurcsik's (2006) study, the barriers to physical activity in university students were examined and it was determined that these barriers were social activities (52%), workload (74%), lack of money (3%), transportation (62%) (Kocacan, 2017).

A significant difference was found in the "quality of life" and "exercise benefit" sub-dimensions of the participants' quality of life and exercise awareness levels according to the mother's educational status. In the sub-dimension of quality of life, a significant difference was found between Postgraduate and Secondary Education in favor of Secondary Education. In the exercise benefit sub-dimension, a significant difference was found between the graduate and primary education in favor of primary education. A significant difference was found in

the "quality of life" and "exercise barriers" subdimensions of the participants' quality of life and exercise awareness levels according to the father's educational status. In the sub-dimension of quality of life, a significant difference was found between primary and secondary education in favor of primary education. In the exercise obstacle sub-dimension, a significant difference was found between Primary and Secondary Education, Undergraduate and Postgraduate Education in favor of Primary Education.

In some studies on the subject, it is seen that as the education level increases, the exercise score increases (Berçin, 2010; Bilgili et al., 2009; Robbins et al., 2009), there are also studies showing that the exercise behavior of individuals with high education level is low. In a study conducted by Karakullukçu (2009), she examined the leisure habits of the ministry of justice employees according to their education levels. According to the results of the research, it has been understood that individuals do not have enough free time, but they evaluate the leisure time they have, albeit a little, in a more effective and planned way as their educational status increases.

When the relationship between the participants' quality of life and exercise awareness levels was examined, it was determined that there was a positive and significant relationship between quality of life and exercise benefit.

In a study on exercise benefit/obstacle perception, it was determined that students who exercise had a higher perception of exercise benefit and a lower perception of exercise barriers than students who did not exercise (Ortabağ, 2009).

## **Suggestions**

Explaining the importance of regular exercise by giving necessary training to university students throughout their education period and ensuring that they make exercise a behavior and lifestyle will play an important role in making students feel good and increasing their quality of life.

It is recommended to raise awareness of sports workers about exercise and healthy lifestyle behaviors through in-service training, to encourage them about exercise, and to provide exercise benefit/obstacle perception training.

It is thought that the level of public awareness about concepts such as exercise and physical activity can be increased. In addition, it may be recommended to conduct studies with different occupational groups on the perception of exercise benefit/obstacle in future studies.

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