

Behavioral and psychological diagnosis for universities students after the corona pandemic closures

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ABSTRACT

With the coronavirus's rapid spread, most countries have taken preventive measures to limit this spread. Therefore, this paper aims to explore university students' behavioral and psychological variables. To achieve this, the researchers used the descriptive survey approach to the 3,152 Jordanian university students (2,194 female and 1,058 male). We put the Generalized Anxiety Disorder screener GAD-7 and behavioral variables an electronic questionnaire using (Google Forms). To achieve the study's objectives, we used: means, standard deviations, frequencies, percentages, Pearson correlation coefficient, and Chi-square tests with a confidence level of 95% ($p < 0.05$). The study results revealed that (66.34%) don't do regular physical activity, and there were statistically significant differences between males and females in the practice of physical activities in favor of males. In addition, (64.47%) of the study sample spent (5-10) hours, and (26.6%) spent more than (10) hours on social networking sites. Also, (40.03%) of the study sample suffers from fat accumulation in the waist, pelvis, and thighs. There were also (60.32%) who suffered from sleep disorders. In addition, there are overlapping relationships between the study variables (anxiety level, sleep duration, time spent on social networks, physical activities, and body shape).

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1. INTRODUCTION

With the Coronavirus's rapid spread, most countries have taken preventive measures to limit this spread, such as closures and quarantines [1]. Despite the positive effect of these measures in determining the Coronavirus's rapid spread, they have negative consequences on mental health, such as high levels of anxiety, depression, and stress [2]. Therefore, social isolation, physical distancing, disruption of daily routine, and lack of sufficient information about treatment have contributed to raising the level of anxiety (15%) during the Corona pandemic [3], [4].

On the other hand, the home quarantine was accompanied by a change in the individual's habits, including university students, such as decreased sleep duration [5]. In addition, there are overlapping relationships between sleep quality and anxiety levels. Changes in quality sleep during the Coronavirus's rapid spread are caused by anxiety and feelings of uncertainty [6], [7]. Indicate that anxiety levels during that

stage increased with a decrease in sleep quality and higher anxiety levels in females compared to males, and the lower sleep quality contributed to higher anxiety levels [8].

The sleep quality depends on many factors, such as the delay in bedtime, the duration of sleep, and the effectiveness of sleep, as these factors are the adverse effects resulting from closures, such as social isolation and disturbances in the daily routine [7]. The main point is that sleep disturbances and anxiety levels are intertwined with other factors such as obesity, and there is a link between obesity and sleep disturbances, and sleep plays a significant role in obesity, obesity is also associated with many adverse physical and psychological effects, such as decreased health-related quality of life [9]. Body image is linked to body shape and body mass index; therefore, negative body image leads to low self-esteem and higher depression and anxiety levels [10], eating disorders [11]. In the same context, the body image is also linked to physical activity [12], [13].

With technological development, there is social interaction between different age groups on a large scale [13]. Where social media is seen as an interfering factor with the psychological aspects of individuals, there are many negative adverse resulting from the excessive use of social media, as we find that 37% of the study sample suffer from sleep deprivation and the excess social media use increases feelings of inadequacy, jealousy, anxiety, and depression [14]. Excessive social media use reduces sleep duration [7].

These adverse effects are more significant in females than males [15]. Excessive use of social media is also associated with body image concerns and eating disorders [16]. It reduces the individual's ability to engage in invisible activities such as physical activities and social interactions [17]. Indicate that much of the anxiety and depression comes from sleep deprivation and the adverse effects of excessive social media use [18].

COVID-19 also confirmed the symptoms of student mental disorders such as health problems, physiological, depression, symptoms of distress, anxiety, and poor sleep quality that impact academic performance [19]. Based on the household pulse survey, Kaiser Family Foundation found that during the pandemic, a larger number of young adults (ages 18-24) reported symptoms of anxiety and/or depressive disorder as compared to older adults [20]. Only 2% who were not facing any distress had behavioral problems. Moreover, 46% of the respondents were distressed and 18% were faced many problems affecting their day-to-day activity in more than two areas [19].

When reviewing the related previous studies conducted on Jordanian society, the researchers found in a study [21], that (21.5%) suffer from mild anxiety, (10.5%) suffer from moderate anxiety, and (6%) suffer from severe anxiety. Also, (4) out of (10) participants suffer from quarantine-related anxiety. In another study [22], it was found that (11.4%) suffer from severe psychological disorders, and (25.4%) suffer from moderate psychological disorders. A study [23], also showed that (28.8%) of the study sample suffer from severe anxiety symptoms, (13.2%) suffer from stress, (11.95%) suffer from depression symptoms, and (7.6%) suffer from anxiety symptoms. In addition, a study [24], indicated that (42.1%) of the study sample suffer from disorders, and (72.6%) suffer from symptoms of anxiety. A study [25], showed that (88.4%) of medical students suffer from mental disorders, and (47.4%) suffer from poor sleep quality.

Globally, a study conducted on university students in Romania showed increased symptoms of anxiety, change in behavior, the stress of restrictions, and physical distancing [26]. In the same field, a study [27], indicated that (35%) of the study sample suffered from psychological distress. As the study [28], it indicated that (37.7%) suffer from depression symptoms, (31.9%) suffer from anxiety symptoms, and (29.6%) suffer from stress symptoms.

Wang *et al.* [29], revealed that Chinese students are at higher risk than adults regarding anxiety, stress, and depression. On the other hand, Aylie *et al.* [30], attempted to detect the psychological effects of the Coronavirus on university students in southern Ethiopia, where the prevalence rate of depression, anxiety, and stress reached (21.2%, 27.7%, and 32.5%), respectively.

The researchers believe the study problem started from the scientific gap in this field. During and after the Corona pandemic, most of the scientific studies focused on trying to deal with the physical and economic effects of the closures resulting from the Coronavirus spread, with an apparent decrease in studies that were interested in trying to detect the psychological effects and the factors associated with them resulting. These closures, especially among university students, as they are more affected by these closures because of their unclear scientific future.

Based on the previous presentation, the researchers believe that addressing overlapping factors after the Coronavirus's rapid spread is an urgent necessity to explore the level of these factors and the relationships between them to work on developing appropriate measures and strategies that contribute to addressing weaknesses. Therefore, this study aimed to explore and diagnose the behavioral variables of university students (duration and quality of sleep, Time spent on social networking sites, and physical activity), body shape, and level of anxiety. In addition to the differences in those factors according to the (college, school stage, gender, and age) variables. As well as the correlations between these factors.

2. METHOD

The sample size was calculated based on a 25% response rate, a 95% CI, and a 5% margin of error with a total student population of 250,137 enrolled in Jordanian government universities. The required sample size was 1,183, and, in this study, the sample size used was 3,152 Jordanian university students (2,194 female and 1,058 male), which is 2.7-fold larger than that required. This cross-sectional study was conducted from September to October (Table 1).

Table 1. Distribution of the study sample (n=3152)

Variables	Categories	Frequency	Percent
Gender	Male	1,058	35.1
	Female	2,194	64.9
	Total	3,152	100
College	Scientific	1,825	57.2
	humanity	1,327	42.8
	Total	3,152	100
Age	18-less than 20 years	1,431	45.39
	20-less than 22 years	1,105	35.06
	22-less than 24 years	413	13.11
	More than 24 years	203	6.44
	Total	3,152	100

2.1. Study design

Participants completed the GAD-7 Anxiety questionnaire, which has seven items rated on a 4-point Likert scale from 0 (not at all) to 3 (nearly every day) [31]. Furthermore, Due to the curfew in the country and to reduce face-to-face interaction, The researchers put the GAD-7 Anxiety questionnaire and paragraphs related to the duration and sleep quality, Time the student spent on social networking sites, the duration of daily physical activities, body shape, college, age and gender in an electronic questionnaire using (the Google questionnaire) and sent the link of the study tool to the participants via the WhatsApp application after obtaining necessary approvals from universities. Noting that the language used in the study tool was Arabic after translating the paragraphs and presenting them to English language specialists. Where the link to the study tool was sent to the students' phone numbers and emails through the Deanship of Student Affairs in public universities. In addition, the study tool has been placed on the university's website.

2.2. Scientific coefficients of the study tool

To verify the validity of the study tool, the researchers presented it to a committee of (five) arbitrators with the competence and experience of the faculty members at the Universities of Jordan to find out the suitability of paragraphs of this questionnaire and its ability to achieve the goal of the study.

2.3. Participants consent

The participants' rights were protected by explaining the purpose and significance of the study. The clients were informed that their participation in the survey would remain anonymous and that their privacy was respected. They were provided with a comprehensive explanation that their involvement in the study was voluntary and that they could withdraw at any time. Approval was obtained from all study participants when filling out the study tool. Accordingly, there was no need for support from the Ethics Committee at the Ministry of Education.

2.4. Data analysis

For illustrative reasons, we used: means, standard deviations, frequencies, percentages as a descriptive statistic for the study variables. Also, the researchers utilized the Pearson correlation to show the correlation between behavioral and psychological variables (duration of sleep, Time spent on social networking sites, and physical activity), body shape, and anxiety level. In addition, we used Chi-square and ANOVA tests to detect the differences in those variables according to (college, gender, and age) by using SPSS version 24 with a confidence level of 95% ($p < 0.05$).

3. RESULTS AND DISCUSSION

This chapter presents the study's findings, which aim to identify the relationship between some behavioral and anthropometric variables to the level of anxiety among students in Jordanian universities during the Corona pandemic. Also, descriptive statistics for participants' answers to questionnaire items. The data collected from (3,152) Jordanian university students (2,194 female and 1,058 male) are contained in Table 2.

Table 2. Distribution of the sample according to the behavioral variables (sleep, social communication, exercise) (n=3,152)

Variables	Categories	Freq	%
Do you usually have daily at least 30 minutes of physical activity?	Yes	1,061	33.66
	No	2,091	66.34
Daily time spent on social networking sites/hour	Less than 5	2,81	8.91
	5-10	2,032	64.47
	More than 10	839	26.62
I can describe my sleep as:	Regular for 8 hours at night	1,251	39.68
	Turbulent less than 7 hours at different times	1,901	60.32

Table 3 shows the differences in the behavioral variables (sleep, social communication, exercise) according to the (gender) variable by using the (Ch^2) test. As well as there were statistically significant differences between males and females in the practice of physical activities in favor of males. Additionally, the (72.12) % of the females don't regularly practice physical activities, and (54.92%) for males.

Table 3. Chi-square test according to gender variable (n=3,152)

Gender	Categories	Male		Female		Ch^2	Sig.
		Freq	%	Freq	%		
Exercise	Yes	477	45.08	584	27.88	56.771	0.000*
	No	581	54.92	1510	72.12		
Daily time spent on social networking sites/ hour	Less than 5	112	10.58	169	8.08	14.078	0.000*
	5-10	661	62.48	1371	65.47		
	More than 10	285	26.94	554	26.45		
I can describe my sleep as:	Regular for 8 hours at night	381	36.01	870	41.54	0.486	0.486
	Turbulent less than 7 hours at different times	677	63.99	1224	48.46		

Table 4 shows the differences in the behavioral variables (sleep, social communication, exercise) according to the (college) variable by using the (Ch^2) test. In addition, there were statistically significant differences between students of scientific and human faculties in daily time spent on social networking sites and describe sleep variables. On the other hand, there were no statistically significant differences between the students of scientific and humanities colleges in the regularity practicing physical activities.

Table 4. Chi-square test according to colleges variable (n=3,152)

Variables	Categories	Scientific		Humanity		Ch^2	Sig.
		Freq	%	Freq	%		
Do you usually have daily at least 30 minutes of physical activity?	Yes	617	33.80	444	33.45	0.586	0.444
	No	1,208	66.20	883	66.55		
Daily time spent on social networking sites/ hour	Less than 5	141	7.73	140	10.55	8.257	0.016*
	5-10	1,217	66.68	815	61.42		
	More than 10	467	25.59	372	28.03		
I can describe my sleep as:	Regular for 8 hours at night	708	38.79	543	40.91	4.253	0.039*
	Turbulent less than 7 hours at different times	1,117	61.21	784	59.11		

Table 5 the differences in the behavioral variables (sleep, social communication, exercise) according to the (age) variable by using the (Ch^2) test. Accordingly, the age group suffering from sleep disturbance was (20-less than 22) years (63.26%). Also, there were statistically significant differences between age categories in daily time spent on social networking sites variables.

Table 6 shows body shape description for study sample. Where 13.83% of study sample describe their body as an apple shape. Similarly, 15.64% describe their body as a pear shape and 10.53% as a hourglass shape.

Table 7 shows the differences in the body shape according to the (gender) variable by using the (Ch^2) test. Also, there were statistically significant differences in body shape according to the (gender) variable. This is clearly shown by the percentages in this table.

Table 5. Chi-square test according to age variable (n=3,152)

Variables	Categories	18-less than 20 years		20-less than 22 years		22-less than 24 years		More than 24 years		Ch ²	Sig.
		Freq	%	Freq	%	Freq	%	Freq	%		
		Do you usually have daily at least 30 minutes of physical activity?	Yes	492	34.38	372	33.66	126	30.5		
	No	939	65.62	733	66.34	287	69.5	132	65.03		
Daily time spent on social networking sites/hour	Less than 5	108	7.54	98	8.86	45	10.9	30	14.78	21.6	0.001*
	5-10	946	66.12	691	62.55	266	64.4	129	63.54		
	More than 10	377	26.34	316	28.59	102	24.7	44	21.68		
I can describe my sleep as:	Regular for 8 hours at night	597	41.71	406	36.74	174	42.1	75	36.94	11.2	0.011*
	Turbulent less than 7 hours at different times	834	58.29	699	63.26	239	57.9	128	63.06		

Table 6. Distribution of the sample according to the body shape variable (n=3,152)

Variable	Categories	Freq	%
Body shape	Apple shape	436	13.83
	Pear shape	493	15.64
	Hourglass shape	333	10.56
	Other	1,890	59.97
	Total	3,152	100

(Apple shape: Overweight in the waist circumference; Pear shape: Overweight in the pelvic circumference; Hourglass shape: Means that when you are overweight)

Table 7. Chi-square test according to gender variable (n=3,152)

Variable	Categories	Male		Female		Ch ²	sig
		Freq	%	Freq	%		
Body shape	Apple shape	191	18.05	245	11.70	155.510	0.000*
	Pear shape	53	5.02	440	21.03		
	Hourglass shape	136	12.85	197	9.40		
	Other	678	64.08	1212	57.87		

(Apple shape: Overweight in the waist circumference; Pear shape: Overweight in the pelvic circumference; Hourglass shape: Means that when you are overweight)

Table 8 shows the differences in the body shape according to the (college) variable by using the (Ch²) test. Where the frequencies and percentages of science and humanities students' colleges were close in this variable. Therefore, there were no statistically significant differences between the students of scientific and humanities colleges in body shape variable.

Table 8. Chi-square test according to college variable (n=3,152)

Variable	Categories	Scientific		Humanity		Ch ²	sig
		Freq	%	Freq	%		
Body shape	Apple shape	256	14.02	180	13.56	5.760	0.124
	Pear shape	267	14.64	226	17.03		
	Hourglass shape	207	11.34	126	9.49		
	Other	1,095	60	795	59.92		

(Apple shape: overweight in the waist circumference; Pear shape: Overweight in the pelvic circumference; Hourglass shape: Means that when you are overweight)

Table 9 shows the differences in the body shape according to the (age) variable by using the (Ch²) test. Also, there were statistically significant differences in body shape according to the (age) variable. In addition, the highest percentage of fat accumulation in the waist circumference was for those (24) years and over (20.19%).

Table 9. Chi-square test according to age variable (n=3,152)

Variable	Categories	18-less than 20 years old		20-less than 22 years old		22-less than 24 years old		More than 24 years old		Ch ²	sig
		Freq	%	Freq	percent	%	%	Freq	%		
Body shape	Apple shape	181	12.64	155	14.02	59	14.28	41	20.19	10.05	0.00*
	Pear shape	206	14.39	210	19.01	57	13.81	20	9.85		
	Hourglass shape	146	10.22	110	9.96	43	10.41	34	16.74		
	Other	898	62.75	630	57.01	254	61.5	108	53.22		

(Apple shape: Overweight in the waist circumference; Pear shape: Overweight in the pelvic circumference; Hourglass shape: Means that when you are overweight)

Table 10 shows the data collected from (3,152) Jordanian university students (2,194 female and 1,058 male) for the anxiety level. Moreover, the anxiety level came to a moderate (13.63). Also, the anxiety level among females was higher than males (14.78, 12.48), respectively.

Table 10. Distribution of the sample according to the anxiety level variable (n=3,152)

No	Items	Mean	Standard. Deviation	Rank	Degree
1	Feeling nervous, anxious, or on edge	14.20	3.22	3	moderate
2	Not being able to stop or control worrying	12.55	3.67	6	moderate
3	Worrying too much about different things	15.31	4.41	1	severe
4	Trouble relaxing	13.24	2.39	4	moderate
5	Being so restless that it is hard to sit still	12.47	3.40	7	moderate
6	Becoming easily annoyed or irritable	14.83	3.52	2	moderate
7	Feeling afraid, as if something awful might happen	12.85	3.71	5	moderate
Total means		13.63	3.40	-	moderate

Table 11 shows the analysis of variance (ANOVA) to explore significant differences between variables and the total of items. Also, the anxiety level among the students from scientific colleges was also higher than that of humanities (15.58, 11.68), respectively. In addition, the anxiety level among the students from age group (18-less than 20) was the highest mean.

Table 12 shows the differences in the anxiety level according to the (gender, college, age) variables by using the (Ch²) test. Also, there were statistically significant differences in the anxiety level according to the gender variable. On the other hand, there were no statistically significant differences in the anxiety level according to the college and age variables.

Table 11. Means and standard deviation for the anxiety level according to (gender, college, age) variables

Variables	Categories	Means	St. Dev	level
Gender	Male	12.48	3.15	Moderate
	Female	14.78	3.51	Moderate
College	Scientific	15.58	3.41	Severe
	humanity	11.68	3.39	Moderate
Age/years	18-less than 20	14.8	3.30	Moderate
	20-less than 22	13.25	3.42	Moderate
	22-less than 24	13.82	3.61	Moderate
	More than 24	12.65	3.56	Moderate

Table 12. Results of variance (ANOVA) test

Variables	DF	SS	Mean square	F- value	p
Gender	331.037	1	331.037	28.920	.0000*
College	1.090	1	1.090	.0950	.7580
Age	84.870	3	28.290	2.471	.0600
Error	39662.061	3465	11.446		
Total	40125.728	3472			

Table 13 shows the matrix of correlation coefficients between the anxiety level and behavioral and anthropometric variables. There was also a statistically significant correlation between sleep and anxiety level (-0.071). Furthermore, there is a statistically significant correlation between age and regularity in the practice of physical activities (-0.06).

Table 13. The matrix of correlation between the anxiety level, behavioral and anthropometric variables

Variables		Age	Activity for (30)	Social networking sites	Sleep	Body shape	The anxiety level
Age	Pearson Correlation	1	-.06**	-.008	-.036*	.056**	.025
	Sig. (2-tailed)		.000	.636	.032	.001	.140
Physical activity for (30)	Pearson Correlation	-.06**	1	-.029	-.028	-.002	-.058**
	Sig. (2-tailed)	.000		.092	.103	.900	.001
Social networking sites	Pearson Correlation	-.008	-.029	1	-.041*	.073**	.062**
	Sig. (2-tailed)	.636	.092		.016	.000	.000
Sleep	Pearson Correlation	-	-.028	-.041*	1	.027	-.071**
	Sig. (2-tailed)	.036*	.103	.016		.110	.000
Body shape	Pearson Correlation	.056**	-.002	.073**	.027	1	.177**
	Sig. (2-tailed)	.001	.900	.000	.110		.000
The anxiety level	Pearson Correlation	.025	-.06**	.062**	-	.177**	1
	Sig. (2-tailed)	.140	.001	.000	.000	.000	

**Correlation is significant at the 0.01 level (2-tailed)

*Correlation is significant at the 0.05 level (2-tailed)

The study results revealed that (66.34%) don't regularly practice physical activities, as well as there were statistically significant differences between males and females in the practice of physical activities in favor of males, and (72.12%) of the females don't regularly practice physical activities, and (54.92%) for males. Additionally, the minor age group practicing physical activities was (the 22- less than 24) years category, with (30.5%). Furthermore, there is a statistically significant correlation between age and regularity in the practice of physical activities (-0.06), where students at that stage are interested in completing the requirements of university studies because most students are close to graduation. A statistically significant correlation exists between regular physical activity and anxiety level (-0.058). This is consistent with the results of studies that indicate that the exercise of physical activities contributes to a decrease in anxiety and stress levels [32].

As for the daily time spent on social networking sites, the researchers found that (64.47%) of the study sample spent (5-10) hours per day, and (26.6%) spent more than (10) hours. In the same field, there are statistically significant differences between males and females in the daily time spent on social networking sites and in favor of males (62.48%, 65.47%), respectively. While (26.94%) of males spend (5-10) hours, and (26.45%) of females more than (10) hours. The problem is that excessive use of social networks affects an individual's time on invisible activities such as social interactions and physical activities. A statistically significant correlation exists between the daily time spent on social networking sites and sleep duration, body image, and anxiety level (-0.041, 0.073, 0.062), respectively. The Internet is full of images that are uploaded. Therefore, the individual compares himself to those images, which raises feelings of inferiority and jealousy.

There were also statistically significant differences between the humanities and sciences colleges for daily time spent on social networking sites. Consequently, we find that (66.68%) of the scientific students spent (5-10) hours and (61.42%) of the humanities students. In the same field, we find that (25.59%) of students in scientific faculties spent more than (10) hours and (28.03%) of students in humanities colleges.

The study's results showed that (60.32%) of the study sample suffered from sleep disorders, with a preference for sleep quality in females compared to males. Sleep duration and quality are negatively affected by the daily time spent on social networking sites and the Internet contains negative social communication and identity fraud [14].

The age group suffering from sleep disturbance was (20-less than 22) years (63.26%). Social networks may contribute to sleep disturbances in several ways, including alerts that reach individuals at night and fear and anxiety about losing new content. Exposure to digital screens before bed interferes with melatonin production and affects the circadian rhythm. These light rays prevent the brain from carrying out natural processes that lead to sleepiness and reduce the release of the sleep hormone and melatonin. There was also a statistically significant correlation between sleep and anxiety level (-0.071). In the same field, sleep duration may cause a high anxiety level.

The study results also showed that (40.03%) suffer from fat accumulation in the waist and pelvis circumference. There were statistically significant differences between males and females in body shape, where (21.03%) of females suffers from fat accumulation in the pelvic circumference, and (18.05%) of males suffers from fat accumulation in the waist circumference. As for the body shape according to the age variable, there were statistically significant differences, the highest percentage of fat accumulation in the

waist circumference was for those (24) years and over (20.19%). The highest rate of fat accumulation in the pelvic area was for the (20-22 years), (19.01%). As for the fat collection in the waist and pelvis circumference together, it was for (24) years and over (16.74%).

Moreover, the anxiety level came to a moderate (13.63), and the anxiety level among females was higher than males (14.78, 12.48), respectively, due to the excessive sensitivity of females toward health and responsibilities and it is higher than the level achieved in a study [33]. Indicate that the adverse effects of social networks in females are more significant than in males, as excessive use of these networks is associated with body image concerns and eating disorders [16]. The anxiety level among the students from scientific colleges was also higher than that of humanities (15.58, 11.68), respectively. Indicate that anxiety levels increased due to the rapid spread of the Coronavirus as sleep quality decreased with an increase in anxiety level [8].

The researchers believe that the closures carried out by countries contributed to the high anxiety level. These closures were accompanied by many adverse effects such as social isolation, physical distancing, and the inability to engage in physical activities in public squares. There is no doubt that excessive use of social networking sites contributes to low self-esteem [14]. It also contributes to high feelings of inadequacy, jealousy, and anxiety through by constantly comparing oneself with others [23]. The researchers believe that the Internet is full of rumors, false news, and images, and thus individuals are preoccupied with body image, which may result in poor weight management.

Among the striking results is that the impact of the Corona pandemic on the psychological and behavioral aspects of students at university was significant, and this was represented by: an increase in the number of students at university who do not practice physical activities regularly, an increase in the time spent by students on social networking sites and among males by a more significant percentage, in addition to that the prevalence of negative food behaviors is significantly higher among female students. Therefore, these indicators are considered dangerous, and we need to take the necessary measures to help students overcome the adverse effects of the Corona pandemic.

4. CONCLUSION

The study results showed a decrease in the regularity of physical activities and an apparent increase in the daily time spent on social networking sites, negatively affecting sleep quality and anxiety. There is also an increase in the sleep disturbance level in the study sample. In addition, (40.03%) of the study sample suffers from fat accumulation in the waist, pelvis, and thighs. There was also an increase in anxiety levels. The study's results indicate overlapping relationships between the study variables (anxiety level, sleep duration, time spent on social networks, physical activities, and body shape). As these variables are affected by each other, the researchers recommend conducting new studies through which independent and dependent variables are revealed. Also, specialists provide scientific guidance and information on public health, urging students to regularly practice physical activities while ensuring that psychological and behavioral interventions are provided in parallel with all other interventions.





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