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#### Research Article

# Investigating Quality of Life in Mental Health Professionals and the Role of Social Support and Spiritual Needs: A Cross-Sectional Study in Greece

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The purpose of this research is to investigate the effect of social support and spiritual needs on the Quality of Life of mental health professionals in Greece. A quantitative cross-sectional survey was conducted on a sample of 97 mental health professionals of various specialties. The QoL10 questionnaire was used to assess the Quality of Life, the MSPSS for social support, and the SpNQ for spiritual needs. The results of the survey showed that the Quality of Life of the participants was generally good, with an average value of 3.72 on a scale of 1-5. Social support appeared to be significantly and positively correlated with Quality of Life (r=0.565, p<0.001), while spiritual needs showed no significant correlation. Linear regression analysis revealed social support as the only significant predictor of QoL. Sociodemographic characteristics were not found to be significantly related to Quality of Life, although there were indications of a possible association with gender as well as marital status that need further investigation. In conclusion, social support appears to be an important protective factor for mental health professionals' Quality of Life. Future perspectives include continuing the research with a larger and more representative sample, as well as investigating additional factors that may influence the Quality of Life of this occupational group.

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#### Introduction

Studies show that paramedical and nursing staff are among the most burdened professional specialties in the health sector, and this happens because of the special characteristics of their profession. Working long hours, standing for long periods of time, and working hours strain the body and lead to fatigue and burnout. The work that must be performed by nurses and health personnel as a whole has been shown to be associated

with a variety of problems that affect the physical and mental health of the individual due to organic disturbances caused by the night shift and reduced or non-existent body rest [1]. Work factors that create stress in healthcare personnel include high work demands, lack of control, heavy workload and exhausting hours, reduced staff, time pressure, unpleasant work environment, conflicts colleagues, insufficient communication, the absence of support structures, anxiety about the health services they provide, the almost daily contact with pain and/or death, the non-recognition of their work, the rotation of departments, the unclear distribution of their roles and

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tasks, and finally, the relationships that develop with patients and their supportive environment [2]. All of the above is based on a wealth of published data linking work stress to negative effects on a person's balance of physical, mental, and social well-being. This condition leads to limited performance by health professionals and a reduced quality of life  $\frac{3}{2}$ . In particular, the stress experienced by health professionals results in the presence of physical symptoms such as allergies, arterial hypertension, cardiovascular, musculoskeletal problems. In addition, stress leads to the presence of mental disorders, which show increased intensity in the face of feelings of apathy, fear, anxiety, indifference, and reduced self-esteem. Furthermore, stress is associated with the appearance of behavioral changes in health professionals, which affect both their well-being and their performance. Irritability, reduced performance, absenteeism, and dependence on substances (anxiety pills) are some of the main behavioral symptoms that anxiety creates [4].

It is estimated that approximately 1/3 of mental health professionals dealing with alcohol use disorders will experience some type of psychopathology at some point in their lives [5]. They are more likely to exhibit harmful alcohol consumption and assertive behavior towards patients and their colleagues. In addition, they may show reduced interest in their work and a tendency to plan for early retirement. It seems that men and middle-aged professionals are at higher risk [5]. In a study by Sarris and colleagues [6], physicians' physical functioning status and physical pain received high scores, while vitality and mental health scored lower. Among nursing staff, physical functioning was rated the highest, followed by general health, physical role, and physical pain. On the psychosocial health scales, nurses rated the emotional role with the highest value and vitality with the lowest value. Paramedical staff rated physical functioning and physical role with the highest values and vitality and mental health with the lowest values. Stress is relevant to all mental health professionals and is not the exclusive "prerogative" of the medical profession. There is a belief that specialist doctors are burdened more, as they spend several hours in nursing institutions due to being on call. However, curators also appear to be plagued by excessive stress, more so than expected  $\frac{7}{2}$ . Research by Yiannoukou et al. [8] showed that the quality of life of workers in Psychosocial Rehabilitation Units is negatively affected by their workload, as it creates feelings of intense stress. In addition, the simultaneous existence of personal/family issues has a negative impact on their work efficiency, while many times they present negative emotions, such as sadness and melancholy, which also negatively affect their quality of life. As far as social support is concerned, it seems to positively affect the health and overall well-being of health professionals at every level, with the result that it has a positive effect on their quality of life. According to Tabah et al. [9], social support prevents and reduces burnout rates. It is good for professionals working in the health sector to seek social support, as their work environment is a vulnerable place, with concerns, intense stress, and close contact with human pain. Social support is helpful and important for health personnel, as it can act as self-healing [9]. The support that health professionals receive from the social environment helps them to cope more effectively with stressful situations in their work environment [10]. reduces both work stress and the possibility of illness, or the inability to manage their health burden factors. Sanghera et al. [11] report that the social support received by the nursing staff from the friendly and family environment works therapeutically as well as protectively against occupational fatigue and burnout.

Finally, regarding spirituality, some studies have shown that it has a positive effect on the QOL of health personnel, while others have not observed any significant correlation. Research shows that nurses with high levels of spirituality cope more effectively with their work stress, reduce fatigue, and increase job satisfaction [12][13][14]. According to VanderWeele et al. [15], spirituality appears to help nursing staff take better care of patients, approach them with empathy, and adopt a more holistic nursing intervention. On the other hand, there are also studies according to which no significant correlation is found between spirituality and occupational burnout and fatigue [16][17].

The purpose of the study is to investigate the effect of social support and spiritual needs on the Quality of Life of mental health professionals, as well as to investigate other work elements affecting the Quality of Life of the said professional group. The main research questions, which will be investigated with the present study, are: 1) Whether social support and spiritual needs are related to the QOL of the respondents and in what way. 2) Whether social support and/or spiritual needs are good predictors of Quality of Life. 3) Whether Quality of Life is related to the demographic and social characteristics (gender, age, marital status, education level, job position, years of service, monthly income) of mental health professionals.

### Method

It is a quantitative cross-sectional study during which no intervention was carried out. In the study, Quality of Life was used as a dependent variable, while the rest (socio-demographic, social support score, and spiritual needs score) were the independent variables.

The research population includes 97 mental health professionals of various specialties and jobs working in Greece. The survey is aimed at people over 18 years of age who speak the Greek language and work as mental health professionals. People under the age of 18, who did not speak Greek, and who did not work as mental health professionals were excluded.

After contacting each interested party, the electronic link to the Google Form containing the questionnaires was sent as shown in the appendix of this paper. The respondents themselves were informed by the researcher about the purpose of the research and the possible benefits that might arise from the study for them and for the community. In addition, they were informed about the anonymity of the questionnaires and the confidentiality of their answers, as well as that the results will be used exclusively for educational and research purposes. The information was given verbally, but also in writing through the information-consent form. Participation was voluntary, and those who wished were asked to sign it as consent for their participation in this research. Throughout the completion of the questionnaires, the researcher was available to answer any questions and queries related to the completion of the questionnaires.

The demographic characteristics form is used to collect data such as gender, age, marital status, education level, job title, years of service, and monthly income of mental health professionals.

To assess the Quality of Life of the participants, the Quality of Life -10 questionnaire was used. This contains 10 Likert-type questions where each question can take integer values from 1 to 5. The sum of all ten questions is the final score of the Quality of Life, which for comparison purposes is normalized on the scale [1] [2][3][4][5]. The QOL10 provides brief and useful measures of social QOL through two subscales. The social sub-category is extremely important since social PZ is most often not evaluated. The specific tool shows good validity and reliability [18].

To assess social support, the MSPSS (Multidimensional Scale of Perceived Social Support) questionnaire was used, which contained 12 Likert-type questions, each with 7 levels. The final score was obtained from the

average of all individual questions. It is an instrument that provides the assessment of three sources of social support (subscales): 1) family, 2) friends, and 3) "significant others". Higher scores indicate greater social support [19][20]. The advantages of this assessment instrument include its brevity in completion, its simplicity and understandability, and its assessment of social support from three sources. More specifically, the "significant others" subscale is rather unique among domain measures [19][20]. The MSPSS has been found to have good validity and reliability [21].

To assess the respondents' spiritual needs, the SpNQ questionnaire was chosen, which consists of 27 questions classified into four main categories of needs (active contribution needs, religious needs, inner peace needs, and existential needs). Each question was preceded by the question of whether they agree with this need, where disagreement is scored as 0, while if they agree, they choose from the three-level Likert scale the answer from 1 to 3, so finally the scale is formed from 0 to 3. The final spiritual needs score is obtained by averaging the individual scores and results in the same scale from 0 to 3. It is a valid and reliable assessment tool for assessing a wide range of spiritual needs in many population categories [22].

The SPSS program (IBM Corp. Released 2021, IBM SPSS Statistics for Windows, v.28.0, Armonk, NY: IBM Corp.) was used to analyze the data of the work. First, demographic data are summarized in a table using relative frequencies and percentage frequencies. For the continuous variables resulting from the final scores of the Quality of Life (QoL10), social support (MSPSS), and spiritual need (SpNQ) questionnaires, the descriptive measures used are the mean, standard deviation, median, minimum and maximum values, kurtosis, and skewness. The study of the normality of the continuous variables numerically was done with the Kolmogorov-Smirnov test, while visually, the Q-Q plots were used to confirm the results, where the variables did not follow a normal distribution. Cronbach's "α" coefficient was used to assess the internal consistency of both the "Quality of Life – QoL10" questionnaire and the rest of the questionnaires. The non-parametric Mann-Whitney test was used to study the correlation between Quality of Life and demographic characteristics due to the non-existence of normality. In cases where a demographic variable had more than two groups, a non-parametric Kruskal-Wallis one-way ANOVA test was used for the correlation study. The correlation between the scores of the three questionnaires was studied through the Spearman correlation coefficient, as well as for some demographic variables that had a

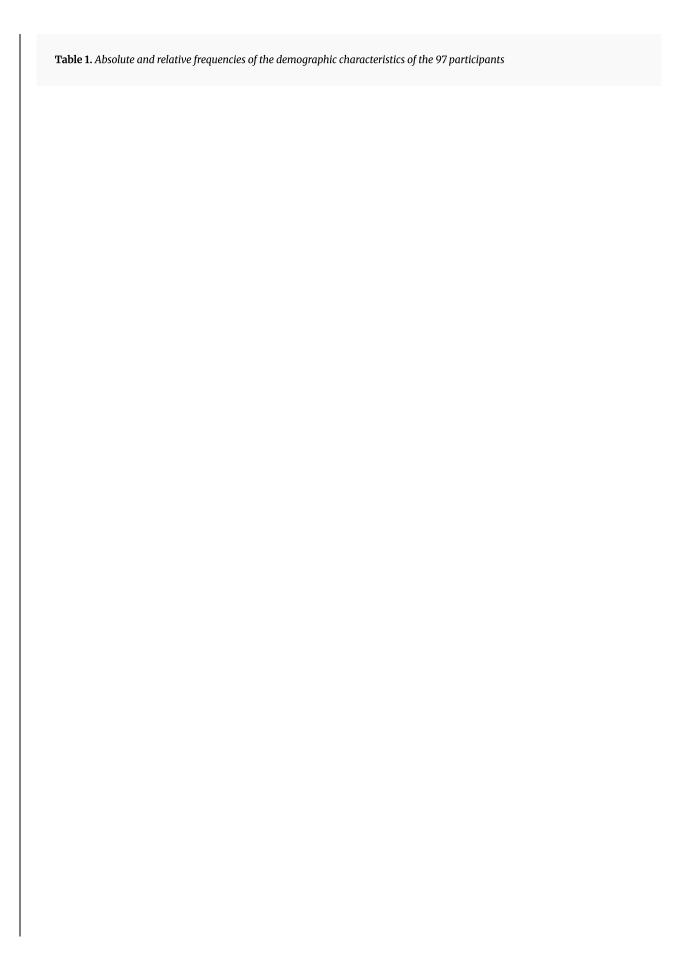
ranked order. The study of the significance of the linear regression factors of the scores was done with the t-test and F-test. For the correct representation of the above, various types of diagrams were needed: bar charts, scatter plots, histograms, and Q-Q plots. For each of the tests, a significance level of 0.05 was set as an acceptable level, and estimates were made at a 95% confidence interval.

#### Results

Out of a total of 97 mental health professionals who responded through the questionnaires, 80 were women, making up 82.5% of the sample. The age distribution of the sample seems to follow a normal distribution, with a large percentage of respondents (88.66%) in the age range of 26-55, while few were in the young [18][19][20][21][22][23][24][25] and old ages (56 and above). The majority, 62 (63.9%), were married, with the second largest category being unmarried, 24 (24.7%), while the remaining 11.4% were divorced and widowed. The level

of education was composed of 49 people (50.5%) who had finished higher education, of which almost half (20 people) had continued with a master's or doctorate, 40 (41.2%) who had finished secondary education, and only 8 (8.2%) who had completed the mandatory level. The jobs were varied, with 9 different categories present in the sample, the majority of which consisted of 41 (42.3%) general workers, 25 (25.8%) nurses, 14 (14.4%) social workers, 11 (11.3%) psychologists, and the remaining 6.2% from the remaining categories of the small sample presented in Table 1. Regarding the years of service, there was no specific trend in the sample, which means that the years of service were evenly distributed between the range of 0 to over 20 years, which helped the survey to be more unbiased. Finally, the monthly income of the research participants showed a large concentration of 92.8% in middle incomes (€500-€2000), with individual percentages of 59.8% (€500-€1000) and 33.0% (€1000-€2000), one almost twice as much as the other, while there were very few who had an income below €500 (4.1%) and above €2000 (3.1%).

		N	%
Condon	Male	17	17.5%
Gender	Female	80	82.5%
	18-25	3	3.1%
	26-35	26	26.8%
A	36-45	31	32.0%
Age	46-55	29	29.9%
	56-65	7	7.2%
	66 and over	1	1.0%
	Single	24	24.7%
Manital status	Divorced	9	9.3%
Marital status	Married	62	63.9%
	Widower	2	2.1%
	Compulsory education	8	8.2%
Level of Studies	Secondary education	40	41.2%
Level of Studies	Technological/University education	29	29.9%
	Master's/PhD	20	20.6%
	General Duties	41	42.3%
	Curator	1	1.0%
	Occupational therapist	1	1.0%
	Social worker	14	14.4%
Job Position	Sociologist	1	1.0%
	Nurse	25	25.8%
	Physiotherapist	1	1.0%
	Psychiatrist	2	2.1%
	Psychologist	11	11.3%
	Up to 5	24	24.7%
	6-10	23	23.7%
Years of Experience	11-15	10	10.3%
	16-20	22	22.7%
	Over 20	18	18.6%
	<b>Up to 500€</b>	4	4.1%
Monthly Issues	501€-1000€	58	59.8%
Monthly Income	1001€-2000€	32	33.0%
	2001€ and above	3	3.1%



Scores		Mean	Std deviation	Median	Min.	Max.	Skewness
Quality of Life (QoL10) (highest score "highest quality of life")		3,72±0,07	0,67	3,89	2,00	5,00	-0,50
Social Support (MSPSS) (highest score " best perceived social support)	Dimension of Friends	5,50±0.11	1,12	5,50	1,25	7,00	-0,88
	Family Dimension	5,76±0.13	1,24	6,00	1,00	7,00	-1,46
	Dimension of significant other	5,89±0.10	1,02	6,00	2,00	7,00	-1,01
	Overall Social Support Score	5,72±0,10	0,99	5,75	1,67	7,0	-0,95
Spiritual Needs (SpNQ) (highest score " more spiritual needs")		1,43±0,07	0,67	1,52	0,17	2,82	-0,11

**Table 2**. Descriptive statistics of final scores of the "Quality of Life (QoL10), Social Support (MSPSS) and Intellectual Needs (SpNQ") questionnaires from the 97 study participants.

Descriptive statistics of scores from the three different questionnaires (SpQN, QoL10, and MSPSS) are shown in Table 2. It was observed that the average value of the sample is around 3.72; the small standard deviation of 0.67 provides the information that most of the respondents answered that they have a moderate to good Quality of Life. Also, it was noteworthy that no value lower than 2 was observed, so there was no one with a very poor Quality of Life. On the contrary, the maximum value was 5, which means that there were people with a very good Quality of Life. Regarding the scale of the score of the questionnaire in terms of perceived Social Support (MSPSS), this is defined from 1 to 7, where grade 1 means non-existent social support, which scales up to grade 7, which means complete social support. In the sample, an average social support value of 5.72 was observed, which means that there is good social support. The sub-dimensions of social support also moved in the same direction, where social support from friends was found to be the smallest of the three. The scale of Spiritual Need is formed from 0 to 3. It was observed from the mean value and also from the standard deviation of the sample that the spiritual need showed a large variation in the sample, with the respondents having spiritual needs from 0.17 up to 2.82, i.e., the entire range of possible SpNQ score values.

For the Quality-of-Life questionnaire (QoL10), the internal consistency of the questions was checked using Cronbach's coefficient " $\alpha$ ," and it was found that the internal consistency of the questionnaire with 10 questions was quite good at 0.842. After an analysis made for each question separately, it was examined whether the deletion of any question would contribute to the increase of the " $\alpha$ " coefficient, where the result of the study, as shown in Table 3, was that all questions have a good correlation and would not improve the internal consistency of the questionnaire with the deletion of any question from them. The same analysis was carried out on the rest of the questionnaires, where the conclusions were identical, and the internal consistency coefficients, as shown in Table 4, show excellent consistency ( $\alpha$ >0.9).

	Cronbach's Alpha if the question is deleted
1) How would you characterize your physical health right now?	0.843
2) How would you characterize your mental health right now?	0.813
3) How do you feel about yourself right now?	0.813
4) How are your relationships with your friends right now?	0.818
5) How is your relationship with your partner right now?	0.848
6) How would you characterize your ability to fall in love right now?	0.840
7) How would you characterize your sexual functioning right now?	0.831
8) How would you characterize your social activity right now?	0.819
9) How is your ability to work right now?	0.831
10) How would you assess your quality of life now?	0.812

 Table 3. Internal relevance coefficient (Cronbach's a) after deletion of a similar question.

Questionnaire	Cronbach's Alpha	N of Items
Quality of Life (QoL10)	0.842	10
Social Support (MSPSS)	0.941	12
Dimension of Friends	0.927	4
Family Dimension	0.933	4
Dimension of significant other	0.889	4
Spiritual Need (SpNQ)	0.941	27

**Table 4.** Internal relevance factors of questionnaires (Cronbach's alpha)

Then, a normality study of the scores of the three questionnaires was done using the Kolmogorov-Smirnov test (Table 5), where it was found that all the

scores do not follow a normal distribution (p-value <0.05) and therefore the use of non-parametric hypothesis testing methods (Mann-Whitney, Kruskal-Wallis), as well as Spearman's correlation test.

		Kolmogorov-Smirnov			
Scores		Statistical value	Degree of freedom	p-value	
Quality	y of Life (QoL10)	0.115 97 0.00			
	Dimension of Friends	0.112	97	0.004	
Social Support (MSPSS)	Family Dimension	0.161	97	<0.001	
Social Support (MSFSS)	Dimension of significant other	0.140	97	<0.001	
	Overall Social Support Score	0.097	97	0.025	
Spiritual Needs (SpNQ)		0.118	97	0.002	

Table 5. Checking the regularity of questionnaire scores with the Kolmogorov-Smirnov test.

From Table 6 and the univariate correlations of the Quality-of-Life score with the social support and spiritual need scores, a significant (p<<0.05) positive linear correlation emerged only with the social support score (MSPSS) with a correlation coefficient of r=0.565. This can be interpreted as how better social support contributes to a better Quality of Life. Also, for the

dimensions of social support, it was found that the strongest correlation with quality of life is in the dimension of "significant other" and "family," while the dimension of friend shows a smaller correlation with quality of life. Regarding the spiritual need score, it was not found to be correlated with the Quality of Life since the correlation coefficient was very small (r=-0.135) with a p-value quite large p = 0.188 (p>>0.05).

		Quality of Life (QoL10) (highest score ∀ best quality of life")		
		r-Spearman	p-value	
	Dimension of Friends	0,444	<0,001	
Social Support (MSPSS) (highest score " best perceived social support)	Family Dimension	0.511	<0,001	
	Dimension of significant other	0.523	<0,001	
	Overall Social Support Score	0,565	<0,001	
Spiritual Need (SpNQ) (highest rated " more spiritual needs)		-0,135	0.188	

Table 6. Correlation of Quality of Life (QoL10) scores with Social Support (MSPSS) and Spiritual Need (SpNQ) scores.

In order to study the existence of an important predictive factor for the assessment of Quality of Life, the variables of social support with its dimensions and spiritual need were studied using multiple linear regression. As shown in Table 7, a method of inserting and removing variables is needed until those that are significant and maximize the adjusted R2 and the AIC or BIC criteria are found. Therefore, a second regression analysis was performed with a combination method of

best AIC, where it was concluded that only the factor "Social Support" is a significant and capable predictor for the estimation of quality of life (Table 8). More in detail, the adjusted R2 was 0.297 (Table 9), moderate to good, the rest (residuals) followed a normal distribution, and from the ANOVA test, the F-score was high, 40.153, and significant (p<0.001), which together suggest that the Social Support (MSPSS) factor is important.

	Uncanonized constants					
	Beta Std. Error Sig					
(intercept)	1.420	0.392	<.001			
Social Support Score	0.794	0.059	0.294			
Dimension of Friends	-0.211 0.264 0.4		0.428			
Family Dimension	-0.075	0.287	0.952			
Dimension of significant other	-0.111	0.255	0.663			
Spiritual Needs Score	-0.113	0.086	0.211			

 Table 7. Multiple linear regression of quality-of-life score versus social support and spiritual need scores.

	Uncanonized constants					
	Beta Std. Error Sig.					
(intercept)	1.590	.341	<.001			
Social Support Score	.372 .059 <.001					

 Table 8. Linear regression of quality-of-life score versus social support score.

	R	R <sup>2</sup>	Adjusted R <sup>2</sup>	Std. Error of the Estimate
Explained Variance	.545	.297	.290	.56687
	F	Sig.		
Model Significance (ANOVA)	40.153	<0.001		

Table 9. Summary of statistical measures of the final linear regression model.

Finally, a statistical significance check was made of the respondents' Quality of Life score in relation to the socio-demographic control groups as well as manual levels of Quality of Life grouped into broad scores (1-2, 2-3, 3-4, and 4-5) with the same socio-demographic categories (Table 10). Mann-Whitney and Kruskal-Wallis tests were performed to test the score, while X2 tests were performed to test the correlation of the Quality-of-Life levels. No test yielded statistically significant results, as all p-values were greater than 0.05. In some factors, there seemed to be a small

marginal correlation that did not prove statistically significant but is worth mentioning as a direction for further investigation. Thus, regarding gender, women appeared to present a different Quality of Life (p-value=0.069), while for one-sided control to present a statistically significantly better Quality of Life (p-value = 0.034), and the monthly income with a linear correlation constant r=0.153, the largest quantitative correlation of all the variables, showing a positive linear correlation with higher income showing better Quality of Life.

		Mean ± Std D.	95.0%	p-value	
Gender	Male	3.45 ± 0.17	[3.08, 3.82]	0.112	
Gender	Female	3.78 ± 0.07	[3.63, 3.92]	0.113	
	18-25	3.61 ± 0.57	[1.15, 6.07]		
	26-35	3.86 ± 0.14	[3.57, 4.16]		
Age	36-45	3.67 ± 0.10	[3.46, 3.87]	0.486	
	46-55	3.65 ± 0.12	[3.39, 3.90]		
	56-65	3.76 ± 0.32	[3.00, 4.52]		
	Single	3.72 ± 0.12	[3.47, 3.98]		
75 to 1	Divorced	3.37 ± 0.27	[2.75, 3.99]		
Marital status	Married	3.78 ± 0.09	[3.61, 3.95]	0.241	
	Widower	3.28 ± 0.56	[-3.78, 10.34]		
	Compulsory education	3.62 ± 0.27	[2.99, 4.26]		
r 1 (a) 1	Secondary education	3.66 ± 0.11	[3.44, 3.88]	0.642	
Level of Studies	Technological/University education	3.81 ± 0.13	[3.54, 4.09]		
	Master's/PhD	3.73 ± 0.13	[3.46, 4.00]		
	General Duties	3.59 ± 0.10	[3.39, 3.80]		
	Social worker	3.77 ± 0.19	[3.36, 4.18]		
Job Position	Nurse	3.86 ± 0.14	[3.57, 4.15]	0.401	
	Psychiatrist	3.92 ± 0.17	[1.80, 6.03]		
	Psychologist	3.65 ± 0.20	[3.21, 4.10]		
	Up to 5	3.66 ± 0.14	[3.37, 3.95]		
	6-10	3.89 ± 0.13	[3.62, 4.15]		
Years of Experience	11-15	3.83 ± 0.20	[3.38, 4.27]	0.541	
	16-20	3.62 ± 0.15	[3.31, 3.93]		
	Over 20	3.64 ± 0.18	[3.27, 4.02]		
	<b>Up to 500€</b>	3.35 ± 0.44	[1.95, 4.75]		
ng and by y	501€-1000€	3.68 ± 0.09	[3.50, 3.86]	3.86]	
Monthly Income	1001€-2000€	3.80 ± 0.11	[3.57, 4.03]	3] 0.134	
	2001€ and above	4.06 ± 0.23	[3.08, 5.03]	1	

Table 10. Correlation of scores with socio-demographic characteristics with Mann-Whitney, Kruskal-Wallis, and X2

# Discussion

During the present research, it was observed that the

Quality of Life of mental health professionals fluctuates around "good quality" with an average value of 3.7 on a scale of 1-5 without large fluctuations. Quality of Life was not found to be completely symmetrical but

slightly skewed towards good quality, which shows that there are no individuals with low Quality of Life. After all, the minimum quality value was found to be 2.0. The above is in agreement with the findings of Nguyen et al. [23], who studied healthcare workers in Vietnam during the COVID-19 pandemic. They found that the overall mean health-related quality of life score was 73.4 out of 100, or 3.675 out of 5, indicating a moderate level of quality of life on average. However, Nguyen et al. [23] also found some differences in specific domains of quality of life. For example, they found that suspected COVID-19 symptoms and smoking status were risk factors for lower quality of life, while physical activity and the ability to pay for medications were protective factors. Another point of comparison is the distribution of quality-of-life scores. A slight positive bias was observed in the study, with no subjects reporting very low quality of life and a minimum score of 2.0 out of 5. Similarly, Nguyen et al. [23] reported that only small percentages of healthcare workers in Vietnam met the criteria for depression (4.5%) or anxiety (3.1%), suggesting that very low quality of life was uncommon. In summary, the overall level of quality of life of mental health professionals in the Greek sample was broadly comparable to that found by Nguyen et al. [23] in Vietnam.

The correlation test (correlation) between Quality of Life and social support was found to be significant, with a Spearman coefficient r = 0.565, which expresses that the best social support is correlated with the best Quality of Life with a moderate to strong correlation. In a study by Hefner & Eisenberg [24] on nursing students, it appeared that students with low social support were more likely to develop mental health problems and were at greater risk of developing depression. Yildirim et al. [25] in their research report that social support had a positive effect on the psychology of respondents. Similar research by Yoshizawa et al. [26] also demonstrated that social support reduces the impact of stress on depression in mental health nurses. Nguyen et al. [23] conducted a study on Chinese nurses and found that compassion satisfaction, a component of occupational PJ, was positively correlated with social support (r=0.35). The study by Shojaei al. [27] confirms that increasing social support improves the general dimension of Quality of Life. In the present research, the correlation between Quality of Life and spiritual needs was not found to be significant. There are few studies that specifically analyze the association between quality of life and spiritual needs or well-being among mental health professionals. Scerri et al. [28] in

their study did not directly measure spiritual needs but tested an intervention that included mindfulness and expressive arts sessions, which could be considered to be related to spiritual well-being. It was found that the intervention significantly reduced mental health nurses' burnout, anxiety, and stress, which are important components of professional quality of life.

The multiple linear regression analysis resulted in the emergence of only one significant predictive factor, namely the Social Support factor, which, according to the metrics and the calculated criteria, proved to be a capable and significant predictor of Quality of Life. Wechsler & Zordan Rani-Yonamine [29] in their study on the mental health and Quality of Life of Brazilian healthcare professionals during the COVID-19 pandemic identified social support as one of the lifestyle factors associated with the results of Quality of Life. This suggests that social support may be a protective factor for healthcare workers' well-being during stressful periods.

The tests carried out to find if there is any correlation between the social and demographic characteristics of the population and the Quality of Life proved that there is no significant correlation. Subject to the need for further investigation with a larger sample size, we could refer to the potential correlation of gender with Quality of Life, specifically the better Quality of Life presented by women compared to men. Also, a low p-value of 0.09 was presented by the divorced compared to the married, where it would be interesting to investigate further in a larger sample if it is true that the divorced have a lower Quality of Life compared to the married. In a similar study by Yadollahpour et al. [30] data showed that sociodemographic characteristics did not predict nurses' Quality of Life. The study by Theofilou et al. [31] aimed to investigate the Quality of Life of mental health professionals in Greece. They found that gender and marital status did not significantly affect workers' QoL. This is somewhat contrary to the tentative finding of better QoL in women compared to men and potentially lower QoL in divorced compared to married individuals. However, the authors noted the need for further research with a larger sample size to confirm these potential associations. Another study by Nguyen et al. [23] assessed the mental health and QoL of Brazilian healthcare professionals during the COVID-19 pandemic. They found that certain demographic factors, such as gender, age, educational level, and marital status, were risk factors for mental disorders and lower QOL. Specifically, women were at higher risk compared to men. This is in line with the observation of a possible gender difference in quality of life, albeit in

the opposite direction. The study by Mirghafourvand et al. [32] on adolescents with chronic diseases in Iran found that parental marital status was one of the predictors of adolescent QOL. This suggests that family structure and marital status may indirectly influence QOL, although the study population was different from mental health professionals. In summary, the limited evidence available on the relationship between sociodemographic factors and quality of life among mental health professionals is somewhat mixed. Our findings of possible associations with gender and marital status, although provisional, are unprecedented. As noted above, further research with a larger sample size is needed to clarify these relationships in this particular population. Comparing outcomes across cultural contexts and healthcare systems can also provide valuable insights.

One of the main limitations of the present study was the relatively small sample size (97 people); in some studied categories, there were only 2-3 observations, resulting in a large variance error and the difficulty of showing statistically significant correlations.

Future perspectives arising from this study include continued research with a larger and more representative sample of mental health professionals. This will allow us to reach more generalizable conclusions and highlight any demographic and socioeconomic differences in Quality of Life. From the above research results, there were correlations that were very close to being significant and thus could become the next goals of continuing the study and redetermining their significance when the sample is increased. In summary, the characteristics that need further investigation are gender and monthly income, which had a marginal p-value, and there are several indications that they can be shown to be significant with an increase in the sample and its diversity. Finally, it would be interesting to examine more and different categories of variables with the possibility that some are significantly related to mental health professionals' QoL. For example, lifestyle factors, such as physical activity, diet, and sleep quality, could be associated with the QoL of health professionals. Also, work-related factors such as job satisfaction, job compatibility (alignment between job expectations and reality), and exposure to patient deaths have been linked to health care workers' QoL and would be interesting to examine [33].

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#### **Declarations**

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