

LGBT+ Individuals' Sexual and Mental Health: A Comparison with Heterosexual Group

Nur Elçin Boyacıoğlu¹ , Hüsnüye Dinç¹ , Neslihan Keser Özcan¹ , Ardıl Bayram Şahin² 

¹Istanbul University - Cerrahpasa, Health Science Faculty, Istanbul, Turkey

²Istanbul University School of Medicine, Istanbul, Turkey

ORCID IDs of the authors: N.E.B. 0000-0001-8138-7347, H.D. 0000-0002-8461-643X, N.K.Ö. 0000-0003-1311-6646, A.B.Ş. 0000-0003-4515-7530.

Cite this article as: Boyacıoğlu NE, Dinç H, Özcan NK, Şahin AB. LGBT+ Individuals' Sexual and Mental Health: A Comparison with Heterosexual Group. *Cyprus J Med Sci* 2020; 5(3): 189-95.

BACKGROUND/AIMS

Although lesbian, gay, bisexual, and transgender (LGBT+) individuals experience many sexual and mental health problems, these problems are neglected by health professionals. We designed this study to determine the sexual and mental health problems of LGBT+ individuals by conducting a comparison with heterosexual individuals.

MATERIAL and METHODS

This cross-sectional, descriptive, and comparative study design was conducted between August 2015 and October 2015; it involved 210 LGBT+ subjects and 226 heterosexual subjects. Data were collected using online surveys, including an information form (35 questions) and the Turkish adaptation of a standard General Health Questionnaire (GHQ-12 questions). The GSQ-12 is a screening device for identifying minor psychiatric disorders in the general population. Descriptive statistics, independent sample t-test, and Spearman and Pearson's correlation test were used for data analyses.

RESULTS

Compared to the control group subjects, more LGBT+ subjects indulged in sexual activities for money and/or drugs; in addition, the prevalence of sexually transmitted diseases (STDs), experiences of abuse, and sexual problems was higher in LGBT+ subjects. There was no difference between the groups in terms of mental health status.

CONCLUSION

While there was a difference in the sexual health parameters between the groups, there was no difference in their mental health status.

Keywords: LGBT, mental health, sexual health

INTRODUCTION

Lesbian, gay, bisexual, transgender, transsexual, queer, questioning, intersex, inter-gender, asexual, ally and beyond (LGBT+) is a term that encompasses all groups and identities defined as "sexual minorities" (1). For the most part of history, even in the definitions given by the scientific community, homosexuality was defined using negative terms, such as sexual identity disorder, illness, and perversion. The removal of homosexuality from the classification as a disease was performed in steps. In 1952, the Diagnostic and Statistical Manual of Mental Disorders (DSM) of the American Psychiatric Association described homosexuality as a sociopathic personality disorder, while in the DSM-II (1968), it was classified as a sexual deviation. With the effect of dissenting views rising in the 1970s, the homosexuality category left its place to the sexual orientation disorder in 1973 in the DSM-II and this category, in turn, left its place to the category of ego dystonic homosexuality category in 1980 in the DSM-III. Finally, in the DSM-III-R (1987), homosexuality was no longer defined as a mental disorder. However, there are still traces of such negative references in clinical practice (2, 3).

The historical process in the definition of transsexuality is similar to that of homosexuality. Initially, the definition of transsexuality was included in the DSM-III and evaluated in the DSM-IV in the category of sexual identity disorders. Finally,

Presented in: I. LGBTİ Ruh Sağlığı Sempozyumu, Bilgi Üniversitesi, Santral İstanbul.

Corresponding Author: Hüsnüye Dinç
E-mail: husnyedinc@hotmail.com

Received: 18.02.2019
Accepted: 23.06.2019
Available Online Date: 07.04.2020



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the word "disorder" was removed and redefined as "gender dysphoria" and separated from the paraphilias and sexual dysfunctions category. In time, psychiatry continues to make changes related to the definition of "sexual orientation" and "gender identity", still causing the individual to be stigmatized. In Turkey, in the diagnosis and identification of diseases, mental health specialists consider the DSM criteria (2, 3).

In the literature, the term LGBT is used instead of the term homosexuality. The reason for this is that the term homosexuality only brings sexuality to mind and disease diagnosis is perceived as categorization. Moreover, the term homosexuality was abandoned because it only included gay and lesbian individuals. Thus, the term "LGBT" was then used in Western societies (1).

Although not classified as having a disorder, LGBT+ individuals in Turkey are the target of prejudice and discrimination in many societies; they are ostracized and stigmatized by these societies. This situation causes sexual and psychological health problems in the LGBT+ individuals (4-6).

In our country, LGBT+ individuals had experiences similar to those worldwide. LGBT+ individuals started to form small groups outside the public dominion to come together with individuals going through the same experiences so that they could share problems and seek solutions. However, the process of organizing (or creating) a society in Turkey started only 120 years previously for LGBT+ individuals. They took the first step by becoming visible through the establishment of two associations in the metropolises of Turkey, Istanbul, and Ankara. Thereafter, LGBT+ associations were established in many other cities. Today, there are nine non-governmental organizations in Turkey established by LGBT+ individuals (6).

In most studies performed on LGBT+ individuals, the basis of the problems was stated to be discrimination, lack of social support, health inequalities, and minority stress arising from the fact that this group is neglected by health professionals (7-11).

The results of studies examining the sexual and mental health of LGBT+ individuals are varied. Some studies state that having a different sexual identity affects an individual's sexual and mental life negatively; while some state that the sexual and mental health of the group is no different from those of their heterosexual counterparts (9).

Few studies have assessed the needs and priorities of LGBT+ individuals, especially those regarding the provision of their health-related service needs. These research data are very important since they represent a study in Turkey that evaluated

both the sexual and mental health and provides the opportunity to compare these data to those of heterosexual individuals. We believe that our results can bridge the knowledge gap on the subject, present a clear picture of the existing situation, and help establish regulations on the issue.

This study aimed to determine the sexual and mental health problems of LGBT+ individuals by conducting a comparison with heterosexual individuals.

The following research questions were addressed by this study:

1. Is the adult LGBT+ population of Turkey more likely to experience sexual problems than the non-LGBT+ adult population?
2. Is the adult LGBT+ population of Turkey more likely to experience mental health problems than the non-LGBT+ adult population?

MATERIALS AND METHODS

Research Design

This cross-sectional, descriptive, and comparative study design was conducted from August 2015 to October 2015.

Participants

The sample included 210 LGBT+ and 226 heterosexual individuals. We did not use any sample calculation method to determine the sample because there are few associations operating in Turkey and only three of these associations share our work with its members. The average number of members of these associations is 600 (Istanbul LGBTI Solidarity Association: 50 members, Lambda Istanbul: 250 members and KaoS GL: 250 members).

As per the inclusion criteria, individuals aged >18 years who belonged to the LGBT+ community in Turkey, were able to understand questions about sexual and mental health, and could report her/his opinions were included. Those adults in personal and occupational mail groups in Turkey who did not identify themselves as LGBT+, were able to understand questions about sexual and mental health, and could report her/his opinions were included as controls.

Instruments

Data were collected using online self-reported questionnaires consisting of an information form (35 questions) and the Turkish version of the General Health Questionnaire-12 (GHQ-12) (12 questions). In the first part of the questionnaire, detailed information regarding the study aim and contact information of the researchers were provided.

Information Form

For both the LGBT+ and the control group, six questions regarding the socio-demographic information, three questions evaluating their habits (smoking, alcohol, substance), twenty questions regarding sexuality (sexual orientation, gender identity, masturbation, age of first sexual experience) and sexual health (sexually transmitted diseases [STD], condom use, sexual health problems, and help seeking behavior), and six questions regarding abuse (physical, emotional, economical, and sexual abuse, childhood physical and sexual abuse) were asked.

Main Points:

- These results give data on LGBT individuals' sexual health in Turkey.
- These results give data on LGBT individuals' mental health in Turkey.
- This data enables to compare sexual and mental health outcomes for LGBT individuals and heterosexual individuals.

The responses were to be given by choosing from multiple choices.

The General Health Questionnaire (GHQ-12)

GSA was used as a first-step screening test in social studies to determine the mental state of individuals without any psychiatric or physical problems. The scale was also preferred in this study because of its short and comprehensible use in social studies. The Turkish validity and reliability study of the GHQ-12 was performed in 1996 by Kilic (12). It contained 12 questions in four fields, including depression, anxiety, obsessively observed behavior, and hypochondriasis. Each GHQ-12 item was formulated as a statement about symptoms experienced during "the last weeks" (rather than "recently" as in the original questionnaire), with four response options, six of which were positively phrased and six of which were negatively phrased. Each item was answered by choosing from among 4 choices, ranging from "less than usual (0 point)", "no more than usual (0 point)", "rather more than usual (1 point)", and "much more than usual (1 point)". We mainly used a bimodal scoring method, whereby "less than usual" and "no more than usual" were both worth zero points and "rather more than usual" and "much more than usual" were worth one 1 point each. Accordingly, the lowest possible score was 0, while the highest possible score was 12.

Those who scored <2 points were classified as having negative psychological health status, those who scored 2–3 points were classified as having mid-level psychological health status, and those scored >4 points were classified as having a highly positive psychological health status. The Cronbach alpha coefficient of the scale in the current study was 0.75.

Procedure

The questionnaire was prepared for the study that was planned as an online survey, and the announcement was made on the Web pages of a few associations where LGBT+ individuals were members as well as via in mail groups belonging to LGBT+ groups. For heterosexual individuals, the aim of the study was explained and announcements were made in certain personal and occupational mail groups to achieve participation through the snowball method.

Statistical Analysis

Data were analyzed using the Statistical Package for the Social Sciences version 20.0 (SPSS Inc.; Chicago, IL, USA). In addition to descriptive statistics (mean, percentage, frequency), independent sample t-test and chi-square were used to compare the groups. Statistical significance was determined at $p \leq 0.05$.

Ethical Considerations

Ethical permission was obtained from the ethics board of the Medipol University before the study was initiated (Protocol Number: 10840098-604.01.01-E.1884). The study was carried out in accordance with the principles of the Helsinki Declaration, and approval was obtained at the beginning of the survey to enroll participants using the digital approach. Participants who were willing to participate in the study completed the questionnaires after providing consent.

RESULTS

Socio-Demographic and Other Characteristics

The average age of the LGBT+ individuals was 24.31 (SD=6.44), and the average age of the control group was 27.51 (SD=6.24). There was a significant difference in the age of the two groups ($t = 6.47, p < 0.001$).

Among the LGBT+ individuals, 38.1% (n=80) stated their sexual orientation as bisexual, 59% (n=124) as homosexual, and 2.9% (n=6) as heterosexual; all the controls reported being heterosexual.

Among the LGBT+ individuals, 41% (n=80) stated their gender identity as male, 35.2% (n=74) as female, 6.7% (n=14) as trans male, and 3.3% (n=7) as trans female. Total 5.7% (n=12) stated that they did not feel a part of any gender, and 8.1% (n=17) did not respond to this question.

LGBT+ individuals were found to marry less, receive less education, work with less regularity (more unemployment); they used more tobacco, alcohol, and illicit drugs than heterosexual subjects (Table I).

Characteristics Regarding Sexuality and Sexual Health

LGBT+ individuals were found to masturbate more, have more STDs, enter more sexual relations for money/drugs, and experience more sexual problems than the controls. In the matter of

TABLE I. Socio-demographic characteristics and habits of the subjects

	LGBT group (210) n (%)	Control group (226) n (%)	Chi-Square	P
Marital Status				
Married	13 (6.2)	69 (30.5)	46.70	0.001
Single	191 (91)	148 (65.5)		
Single (divorced, widowed)	6 (2.9)	7 (3.1)		
Education				
Primary	1 (0.5)	2 (0.9)	31.87	0.001
Secondary – high school	75 (35.8)	31 (13.7)		
University	134 (63.8)	193 (85.4)		
Status of employment				
Regular	75 (35.7)	137 (60.6)	27.29	0.001
Irregular	85 (40.5)	59 (26.1)		
Unemployed/student	50 (23.8)	30 (13.3)		
Smoking (during last month)				
Regular use	125 (59.5)	96 (42.5)	19.69	0.001
Sometimes	29 (13.8)	30 (13.3)		
Not use	56 (26.7)	100 (44.2)		
Drug use (during one year)				
Not use	149 (71)	197 (87.2)	17.57	0.001
Use	51 (29)	29 (22.8)		
Alcohol use				
Regular use	35 (16.7)	24 (10.6)	14.58	0.002
Sometimes	155 (73.8)	152 (67.3)		
Not use	20 (9.5)	50 (22.1)		

taking professional help for sexual problems, no statistical differences were found between the groups (Table 2).

Total 10.4% of the LGBT+ individuals (n=22) and 19% (n=45) of the control group never had sexual relations. Among the LGBT+

individuals who previously had sexual relationships, 9% (n=19) had experienced gonorrhoea, 8.1% (n=17) had genital warts, 1.4% (n=3) were HIV positive, and 1% (n=2) had hepatitis. Among heterosexual individuals, 4% (n=9) had genital warts, and 0.4% (n=1) experienced gonorrhoea. Some of those who experienced STDs but did not define the type stated that they did not want to name the disease or did not know the name of the disease. The sexual problems encountered are listed in (Table 3); the most widely experienced problem in both the groups was that of interest and desire. The average age at the time of first sexual experience in the LGBT+ individuals was 16.31 years (SD=3.50) and that in the controls was 19.63 (SD=3.76). LGBT+ individuals had their first sexual experience earlier (t=8.54, p<0.001).

TABLE 2. Sexuality and sexual health-related characteristics

	LGBT group (210) n (%)	Control group (226) n (%)	Chi-Square	P
Masturbation				
Yes	192 (91.4)	169 (74.8)	66.73	0.001
No	18 (8.6)	57 (25.2)		
Ideas on masturbation				
Positive	151 (71.9)	167 (73.9)	1.61	0.445
Negative	16 (7.6)	22 (9.7)		
Neutral	43 (20.5)	37 (16.4)		
Use of condom				
Yes	68 (37.5)	73 (40.8)	10.42	0.015
No	55 (29.3)	68 (37.5)		
Sometimes	61 (33.2)	40 (21.7)		
Sexually transmitted diseases				
Yes	45 (24.4)	16 (8.6)	33.12	0.001
No	143 (75.6)	165 (91.4)		
Sex for money or drug				
Yes	18 (8.6)	3 (1.3)	300.7	0.001
No	192 (91.4)	223 (98.7)		
Problem of sexual life				
Yes	95 (50.5)	53 (29.4)	25.09	0.001
No	93 (49.5)	127 (80.6)		
Professional support for sexual problems				
Yes	5 (26.6)	5 (27.7)	5.02	0.081
No	183 (73.4)	175 (72.3)		

TABLE 3. Sexual problems

	LGBT group (188) n (%)	Control group (181) n (%)
Had no sexual dysfunction	89 (47.3)	126 (69.5)
Loss of libido	32 (17)	22 (12.1)
Difficulty in arousal	10 (5.3)	1 (0.6)
Vaginismus	1 (0.59)	1 (0.6)
Pain during intercourse	2 (1.1)	3 (1.7)
Difficulty in orgasm	10 (5.3)	8 (4.4)
Difficulty keeping an erection	9 (4.8)	5 (2.8)
Premature/difficulty ejaculation	10 (5.3)	11 (6.1)
Avoiding due to the anal intercourse	11 (5.9)	0 (0)
Avoiding due to the STI	4 (2.2)	0 (0)
Other	10 (5.3)	4 (2.2)

STI: Sexually transmitted infections

Abuse Experience and General Health Status

The LGBT+ group was exposed to more physical and sexual abuse during childhood and to more physical and emotional

TABLE 4. Distribution of abuse and health aspects

	LGBT group (210) n (%)	Control group (226) n (%)	Chi-Square	p
Physical Violence				
Yes (partner)	31 (14.8)	20 (8.8)	19.37	0.001
Yes (except partner)	63 (30)	36 (15.9)		
No	116 (55.2)	170 (75.2)		
Psychological Violence				
Yes (partner)	41 (19.5)	34 (15)	57.06	0.001
Yes (except partner)	112 (53.3)	52 (23)		
No	57 (27.2)	140 (62)		
Economical Violence				
Yes (partner)	12 (5.7)	13 (5.8)	2.36	0.306
Yes (except partner)	37 (17.6)	28 (12.4)		
No	161 (76.7)	185 (81.8)		
Forced sex				
Yes (partner)	18 (8.5)	8 (3.5)	17.04	0.001
Yes (except partner)	22 (10.5)	6 (2.7)		
No	170 (81)	212 (93.8)		
Physical Abuse in childhood				
Yes (family)	40 (19)	22 (9.7)	16.72	0.001
Yes (except family)	40 (19)	24 (10.6)		
No	130 (62)	180 (79.7)		
Sexual Abuse in childhood				
Yes (family)	9 (4.3)	2 (0.9)	30.55	0.001
Yes (except family)	57 (27.1)	21 (9.3)		
No	144 (68.6)	203 (89.8)		
General Health Status				
Low	90 (42.9)	103 (45.6)	2.80	0.246
Mid	39 (18.6)	52 (23)		
High	81 (38.5)	71 (31.4)		

LGBT: lesbian, gay, bisexual, and transgender

abuse as adults; they were also forced more into sexual relationships than the controls. Although LGBT group had higher (negative psychological health) GSQ scores, there was no statistically significant difference between the groups (Table 4).

DISCUSSION

Discussion of the Socio-Demographic and Other Characteristics

Fewer LGBT+ individuals got married; they received less education, worked less regularly (more unemployment), and used more tobacco, alcohol, and illicit drugs than the controls. These differences in the demographic data were evaluated as results of the social problems experienced by LGBT+ individuals, such as stigmatization and discrimination.

In the present study, the use of tobacco and alcohol was more prevalent in LGBT individuals. The prevalence of smoking among LGBT+ individuals varies between 26.47% and 61% (13, 14), that of alcohol use varies between 65% and 84% (15, 16), and that of illicit drug use varies between 9.7% and 53.3% (17, 18). The reported rates vary in a very large range. The same wide perspective applies to the habits of heterosexual individuals. It is very difficult to make comparisons regarding the use of alcohol, tobacco, and drugs. Many factors, such as the age group, race, employment status, income level, and region of residence affect the alcohol, tobacco, and drug use; the multitude of influencing factors make the comparison challenging (13-15, 19, 20). However, the generally reported alcohol, tobacco, and drug use rates for LGBT+ individuals are higher than those for the population as a whole. This situation is believed to be a negative coping method used to deal with problems arising because of sexual orientation or gender identity differences.

Discussion of Characteristics Regarding Sexuality and Sexual Health

There is no direct relationship between STDs and sexual orientation-gender identity. Sexually transmitted infections may infect anyone, and the clinical symptoms do not vary as per the sexual orientation. Suggestions for avoiding STDs do not differ for LGBT+ individuals, and the determining factor in infection is the cause rather than the person. Risks are high for anyone who engages in unprotected sex (21). LGBT+ individuals experience more STDs, enter more sexual relations for money/drugs, and use condoms more frequently. These differences may be attributable to the inclusion of LGBT+ sex workers in our sample. These individuals are more aware about condom use after experiencing an STD. Studies show that the rate of HIV positivity is higher among LGBT+ individuals (18, 22-24). However, in these studies, risk factors, such as young age, homelessness, frequent changing of sexual partners, and predilection for risky behavior were more stressed than the factor of belonging to the LGBT+ community.

The prevalence of sexual dysfunction among LGBT+ groups was 42.5%–79% (7, 8, 25-27). When the high rates of childhood sexual abuse and STDs among LGBT+ individuals are considered, these rates are not surprising (8, 9). In a recent systematical review, studies examining sexual health problems in LGBT+ individuals were stated to be lacking and the existing studies are criticized for not including heterosexual control groups (9). Thus, the existing studies should be carefully interpreted.

Problems endemic to LGBT+ individuals who are exposed to discrimination in every field of life are unknown or are examined sufficiently by health care workers. Sexual problems are among the most important problems health issues that they experience. In the present study, the most widely experienced problem in both the groups was that of sexual interest and desire. This result is similar to that reported in the literature (8, 25-27).

Discussion of the Findings Regarding Abuse Experience and General Health Status

The finding that the LGBT+ group underwent more abuse of every kind in every phase of their lives (childhood, adulthood, marriage, work life, social life etc.) compared to the control group is consistent with several previous reports. For example, in a national study conducted by Andersen and Blosnich (28) in the USA, where the greatest numbers of studies on the subject have been conducted, LGBT+ individuals were found to be exposed to 60% more childhood abuse (physical, sexual, emotional) compared to heterosexual subjects. Similarly, in a study where the peer bullying experienced by heterosexual and LGBT+ individuals during childhood in Australia were compared, LGBT+ individuals were found to be exposed to more peer bullying (29).

A systematical review by Rothman et al. (30) in the USA that examined 75 studies found that lesbian and bisexual women were sexually attacked more often during adulthood and during their entire lifetime than heterosexual individuals (30). In another study on 1243 LGB individuals in the USA, sexual minorities were reportedly exposed to more abuse during both, childhood and adulthood (31). In addition, most studies that have investigated the abuse of LGBT individuals in the literature focus on spousal violence, with high reported abuse rates (32-35). In a study on LGBT+ individuals in Turkey, they were exposed to violence because of their sexual orientation; 23% were exposed to physical violence, 87% to social violence, and 50% to violence from people they did not know (36). According to another study conducted in Turkey, the rate of people exposed to familial violence because of their sexual orientation and/or gender identity was 6.6%, while the rate of those who received death threats from their families was 3.2% (4).

Both national and international data point to the seriousness of the issue. However, regardless of group, care should be given to comparing data on violence. Some studies focus on certain types of violence encountered by LGBT individuals (34, 35), while some only evaluate a certain group of LGBT+ individuals (such as only gay or lesbian people) (31-33). Some studies have focused on spouse violence, while others have evaluated social violence (29) or made evaluations pertaining to different time periods (lifelong, previous 5 years, and previous 1 year).

In this study, 45.6% LGBT individuals had poor general health status. However, no meaningful difference was found on comparison to the heterosexual group. In a study by Yalcinoglu and Onal (3) in Turkey on 210 homosexual/bisexual males, this rate was higher than that in our study (65.3%). Most studies on LGBT+ individuals have focused on the relationship between discrimination and negative health outcomes. Two different systematical reviews performed in this context have shown that discrimination is related to low mental health status (37, 38).

In many studies performed on LGBT+ individuals, the rates of many mental problems, such as depression and suicide (39-41); nicotine, alcohol, and substance use (40, 41); sexual activity under the influence of alcohol or substances (42); anxiety disorders (40); schizophrenia/psychotic disorders (40); eating disorders (43); and PTSD (44, 45) were higher than those in heterosexual individuals.

Although there is much evidence showing that LGBT+ individuals have worse health status than heterosexual individuals, the present results do not support this statement. Most of the people who participated in the study were related to LGBT+ associations and may have created a selection bias. LGBT+ individuals who faced negative attitudes from the society, such as discrimination and exclusion, have come together to raise their own awareness, become organized, and seek their rights. This may have led to better maintenance of their social and psychological health as compared to that of those who remained outside this process.

LGBT+ individuals who are at a distinct disadvantage compared to heterosexuals had lower marriage rates, received less education, worked less regularly (higher unemployment rate), and used more tobacco, alcohol, and illicit drugs than heterosexual individuals. With regard to sexual health, LGBT+ individuals experienced more STDs, entered more sexual relations for money/drugs, encountered more sexual problems, and had higher exposure to more abuse during childhood and adulthood; however, their health status was not inferior to that of heterosexual individuals despite the above-mentioned negative aspects. Many previous studies have reported poorer health status of LGBT individuals, and the contradictory results of our study are believed to be attributed to the fact that our sample comprised LGBT+ individuals who were receiving support from civil society organizations formed to defend their rights.

Clinical Implication

This study may raise awareness on the questioning of the widespread heterosexist approach that accepts heterosexuality as the only acceptable, healthy, and right sexual orientation, with LGBT+ groups being one of the disadvantaged groups with regard to health. It can also remove barriers to healthcare professionals in offering sexual and mental health care without prejudice and objective service to LGBT individuals.

Study Limitations

The current study presents some limitations; therefore, the results should be interpreted cautiously. A Web-based survey was used for sample selection; consequently, only volunteers with internet access were able to participate. Sexual orientation minority status was based on self-identified sexual orientation only.

The sexual function disorders of the participants were determined via self-reporting; this may have resulted in over-reporting. The mental health of the participants was determined through a valid and reliable scale; however, no evaluation was performed by a clinician.

In the study, the LGBT+ community individuals were evaluated as a group. Each letter in the abbreviation represents a different population; therefore, care should be taken while interpreting the study results. A significant difference between the groups in terms of age is another limitation of the study.

Ethics Committee Approval Ethical permission was obtained from Medipol University The Ethics Board before the study began (Protocol Number: 10840098-604.01.01-E.1884).

Informed Consent: Written informed consent was obtained from patients who participated in this study.

Peer-review: Externally peer-reviewed.

Author contributions: Concept – N.E.B., H.D., N.K.Ö., A.B.Ş.; Design – N.E.B., N.K.Ö., H.D., A.B.Ş.; Supervision – N.E.B., H.D., N.K.Ö., A.B.Ş.; Resource-None; Materials – None; Data Collection and/or Processing – A.B.Ş., N.E.B., H.D., N.K.Ö.; Analysis and/or Interpretation – N.K.Ö., N.E.B., H.D., A.B.Ş.; Literature Search – H.D., N.E.B., N.K.Ö., A.B.Ş.; Writing – N.E.B., HD, N.K.Ö., A.B.Ş.; Critical Reviews – N.E.B., HD, N.K.Ö., A.B.Ş.

Acknowledgements: We would like to thank all the participants for helping with recruitment for the study.

Conflict of Interest: The authors have no conflicts of interest to declare.

Financial Disclosure: The authors that this study has received no financial support.

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