

# A correlational and cross-sectional study on the relationship between internalized stigma and religious coping in patients with schizophrenia

Ayşe Erdoğan Kaya, MD<sup>a,\*</sup>, Ünsal Aydinoğlu<sup>b</sup>

### Abstract

Self stigmatization, which occurs as a result of internalization of public stigma in severe mental illnesses, is a factor that impairs the mental well-being of individuals and their compliance with treatment. Data on exactly which factors are associated with internalized stigma are still insufficient. Our aim in this clinical study is to investigate the relationship between internalized stigma and religious coping in patients with schizophrenia. Sociodemographic Data Form, Religious Coping Scale, internalized stigma of mental illness (ISMI) Scale were applied to 147 schizophrenic patients who were followed up by the community mental health center and met the inclusion criteria. The results were analyzed with IBM SPSS 22 package program. Descriptive statistics, Mann-Whitney U test, Pearson Chi-Square, Fisher Exact test, Spearman correlation analysis and multiple linear regression analysis were applied. There was a negative correlation between positive and negative religious coping in patients with schizophrenia (r: -0.467, P < .001); a positive correlation between negative religious coping and social withdrawal (r: 0.711, P < .001) and perceived discrimination (r: 0.706, P < .001); negative correlation between positive religious coping and social withdrawal (r: -0.343, P < .001) .001) and perceived discrimination (r: -0.302, P < .001). There was no significant relationship between other subdimensions of ISMI and religious coping scale. There was a significant negative correlation between ISMI total score and positive religious coping (r: -0.256, P: .002), a significant positive correlation with negative religious coping (r: 0.683, P < .001). Multiple linear regression analysis was applied to reveal the explanatory effect of age, duration of illness and religious coping on internalized stigma, and according to the model obtained (R = 0.729,  $R^2 = 0.516$ , F = 32.071, P < .001), 51.6% of the change in the total score of the ISMI can be explained by this model. The significant relationship between positive and negative religious coping and internalized stigma in patients included in the study suggests that it may be beneficial to consider religious coping attitudes in addition to other interventions in the fight against stigma in severe mental illnesses such as schizophrenia.

Abbreviation: ISMI = internalized stigma of mental illness.

Keywords: internalized stigma, religious coping, schizophrenia, stigma

## 1. Introduction

Schizophrenia is a chronic severe mental illness characterized by acute psychotic exacerbations and negative symptoms with periods of recovery, which can lead to cognitive impairment in the long term.<sup>[1]</sup> Public stigma, which is common in severe mental illnesses, and its internalization results in self-stigmatization.<sup>[2]</sup> Stigmatization is a specific situation in which an individual is discredited, despised, separated from the majority.<sup>[3]</sup> Stigmatization and its negative consequences are experienced by many individuals diagnosed with both physical and mental illnesses. This situation both prevents help-seeking in mental illnesses and disrupts the course of treatment.<sup>[3]</sup> Internalized stigmatization is the acceptance of negative perspectives and judgments arising from the environment and can cause negative feelings such as worthlessness and shame in individuals.<sup>[2]</sup> Schizophrenia is one of the most stigmatized mental illnesses and internalized stigma in this patient group can harm patients by worsening the symptoms of the disease and impairing treatment compliance.<sup>[4]</sup> In previous studies, it has been found that high levels of internalized stigma in individuals with severe mental illnesses lead to many negative conditions such as low self-esteem, social isolation, increased severity of symptoms of diseases and impaired compliance with treatment, and in addition to all these, it is associated with depressive symptoms and hopelessness.<sup>[5–7]</sup> In this respect, addressing internalized stigma in the treatment course of schizophrenia is an issue that should be taken into consideration. Individuals with mental illnesses develop various coping strategies in order to both fight the illness and prevent rejection by the society. Coping involves

The authors have no funding and conflicts of interest to disclose.

The datasets generated during and/or analyzed during the current study are available from the corresponding author on reasonable request.

Copyright © 2023 the Author(s). Published by Wolters Kluwer Health, Inc. This is an open-access article distributed under the terms of the Creative Commons Attribution-Non Commercial License 4.0 (CCBY-NC), where it is permissible to download, share, remix, transform, and buildup the work provided it is properly cited. The work cannot be used commercially without permission from the journal.

How to cite this article: Erdoğan Kaya A, Aydinoğlu Ü. A correlational and crosssectional study on the relationship between internalized stigma and religious coping in patients with schizophrenia. Medicine 2023;102:32(e34558).

Received: 29 April 2023 / Received in final form: 19 June 2023 / Accepted: 12 July 2023 http://dx.doi.org/10.1097/MD.000000000034558

<sup>&</sup>lt;sup>a</sup> Hitit University, Çorum Erol Olçok Training and Research Hospital, Department of Psychiatry, Çorum, Türkiye, <sup>b</sup> Hitit University, Faculty of Medicine, Department of Psychiatry, Çorum, Türkiye.

<sup>\*</sup> Correspondence: Ayşe Erdoğan Kaya, Hitit University, Çorum Erol Olçok Training and Research Hospital, Department of Psychiatry, Çorum 19030, Türkiye (e-mail dr.ayserdogan@gmail.com).

attitudes towards eliminating or reducing the impact of threatening life events.<sup>[8]</sup> These attitudes are important for the continuation of the individual's functionality.<sup>[8,9]</sup> However, there is still insufficient evidence on exactly which factors are associated with coping attitudes in mental illnesses. Determining coping attitudes in individuals with mental illness can be useful in helping patients in combating problems, determining therapeutic goals and in the follow-up process.[10] Today, it is known that religious coping is one of the methods that individuals frequently use to cope with challenging situations. Individuals personality traits, religious education, and past life events are influential factors in the choice of religious coping attitudes. It is known that there are many studies that have identified the use of religious coping in relieving and reducing stress in mental illness.<sup>[11,12]</sup> Despite this, the number of studies investigating the relationship between these attitudes and internalized stigma is insufficient. The aim of our study was to evaluate the relationship between internalized stigma and religious coping in schizophrenia patients.

### 2. Materials and methods

### 2.1. Study design and population

Among 262 schizophrenic patients followed up in a community mental health center, 147 volunteers who met the inclusion criteria were included in the study. The criteria for inclusion in the study were; meeting the diagnostic criteria for schizophrenia according to the diagnostic and statistical manual of mental disorders 5 diagnostic criteria, being between 18 to 70 years old and literate, being in remission of the disease, willingness to participate in the research. Exclusion criteria were; presence of mental illness other than schizophrenia, being under 18 and over 70 years old, having psychotic exacerbation symptoms, being illiterate, not accepting to participate in the study. Sociodemographic and clinical characteristics of the participants included in the study were first recorded. Participants diagnoses were reassessed and confirmed by an experienced psychiatrist using the structured clinical interview for DSM-5 disorders. Self-report scales were administered at the end of the interview with the clinician, in an environment where patients could stay in the room alone. The patients included in the study were administered the internalized stigma of mental illness (ISMI) Scale and Religious Coping Scale. Approval for the study was obtained from Hitit University Ethics Committee with decision number 2023-46. This study was conducted in accordance with the Declaration of Helsinki and all participants signed a voluntary informed consent form.

### 2.2. Religious coping scale

It is a likert-type scale that shows the religious coping activities and frequencies that people use due to the challenging life events they face. The Turkish validity and reliability study of this scale developed by Abu-Raiya, Pargament, Mahoney, and Stein<sup>[13]</sup> in 2008, was conducted by Ekşi and Sayın in 2016.<sup>[14]</sup> There are a total of 10 items in the scale. Although positive and negative religious coping scores are calculated separately, the positive religious coping subscale is scored between 7 and 28 and the negative religious coping subscale is scored between 3 and 12. Low scores on the 4-point likert-type scale indicate that individuals have a low level of relevant religious coping style, while high scores indicate a high level of relevant coping style.<sup>[12]</sup>

### 2.3. ISMI scale

This scale, developed by Ritsher et al<sup>[10]</sup> in 2003, is a self-report scale includes 5 subdimensions and 29 items. The Turkish validity and reliability study of the scale was conducted by Ersoy and Varan in 2007.<sup>[15]</sup> This scale has 5 subdimensions: alienation, stereotype endorsement, perceived discrimination, social withdrawal and stigma resistance. This scale is a 4-point likert-type scale in which each item is scored between 1 to 4 and the total scale score is obtained by summing the scores obtained from the 5 subdimensions. A higher total scale score means that patients' internalized stigma is more severe.<sup>[12]</sup>

### 2.4. Statistical analysis

The results were analyzed with IBM SPSS 22.0 for Windows (IBM Corp., Armonk, NY) package program. Kolmogorov-Smirnov and Shapiro–Wilk normal distribution tests were used for descriptive statistics. Mann–Whitney U test was used to compare means, Pearson Chi-Square test and Fisher Exact test were used to evaluate categorical variables, and Spearman correlation analysis was used to evaluate correlations. In addition, multiple linear regression analysis was applied to reveal the explanatory effect of age, sex, duration of illness and religious coping on internalized stigma. P < .05 was accepted as significant.

### 3. Results

A total of 147 schizophrenia patients, 87 (59.2%) males and 60 (40.8%) females, who met the inclusion criteria, participated in our study. The age of the patients ranged between 22 to 70 years with a mean age of  $50.39 \pm 10.86$  years, and the duration of illness ranged between 1 to 36 years with a mean duration of disease of  $13.91 \pm 8.10$  years. Of the patients, 90 (61.2%) were single and 57 (38.8%) were married. Eighty-six patients (58.5%) were active smokers and 9 patients (9.1%) had a history of substance abuse. Sociodemographic data of the patients are given in Table 1.

Among the numerical variables, patients ages and total scores of the ISMI scale were normally distributed, whereas duration of illness, religious coping scale scores and subscale scores of the ISMI were not normally distributed. Gender, marital status, active smoking and substance use history, age, duration of illness and both scale scores were evaluated. As a result of the evaluation according to gender, there was a statistically significant difference between the mean ISMI scores of male patients  $(62.31 \pm 14.86)$  and the mean ISMI scores of female patients  $(56.90 \pm 14.49)$  (P = .029). But there was no statistically significant difference in terms of other parameters. In addition, with marital status, active smoking and history of substance use; no significant relationship was found between age, duration of illness and both scale scores. There was a negative moderate correlation between positive and negative religious coping in patients with schizophrenia (r: -0.467, P < .001).

While there was no significant correlation between the age of the patients and the scores of both scales, there was a significant negative correlation between the disease duration and the ISMI perceived discrimination subdimension score (r: -0.302,

# Table 1

Sociodemographic data of patients.

		n	%
Gender	Female	60	40, 8
	Male	87	59, 2
Marital status	Single	90	61, 2
	Married	57	38, 8
Smoking	Exist	86	58, 5
	None	61	41,5
Substance use history	Exist	9	6, 1
	None	138	93, 9

P < .001). Statistical data on the correlation between Religious Coping Scale and ISMI scores are given in Table 2.

Multiple linear regression analysis was applied to reveal the explanatory effect of age, sex, duration of illness and religious coping on internalized stigma, and according to the model obtained (R = 0.729,  $R^2 = 0.516$ , F = 32.071, P < .001), 51.6% of the change in the total score of the ISMI can be explained by this model. Detailed data on regression analysis are given in Table 3.

### 4. Discussion

In this study, the relationship between internalized stigma and religious coping in schizophrenia patients and some demographic characteristics of the patients were examined. The fact that the majority of the patients were male, single and smokers is a finding consistent with previous studies on schizophrenia patients.<sup>[16,17]</sup> In our study, a history of substance abuse in schizophrenia patients was found to be 6.1%. Although it is known that substance use disorder is frequently associated with mental illnesses, especially with Bipolar Disorder and Schizophrenia, different prevalence rates are mentioned.<sup>[18]</sup> In the Epidemiologic Field Study of the American National Institute of Mental Health, it was reported that the prevalence of substance use disorder in individuals with schizophrenia spectrum disorder was 4.6%.<sup>[19]</sup> In many other studies, rates between 10% to 70% are mentioned.<sup>[20,21]</sup>

In our study, there was a significant and negative correlation between the duration of illness and the perceived discrimination score. When the literature on this subject is reviewed, it is seen that the results of the studies examining the relationship between the duration of illness and stigmatization are contradictory, but in most of the studies, it has

### Table 2

The relationship between religious	s coping scale and ISMI
scores.	

	Positive religious coping	Negative religious coping
Alienation	r: 0.095	r: 0.069
	P: .251	P: .408
Confirmation of Stereotypes	r: -0.150	r: 0.101
	P: 0.070	P: .223
Perceived discrimination	r: -0.302	r: 0.706
	<i>P</i> < .001	P<.001
Resistance to stigma	r: -0.035	r: 0.075
5	P: .672	P:367
Social withdrawal	r: -0.343	r: 0.711
	<i>P</i> < .001	<i>P</i> < .001
ISMI total score	r: -0.256	r: 0.683
	<i>P</i> : .002	<i>P</i> < .001

Spearman correlation test was used. P < .05 was accepted as significant.

ISMI = internalized stigma of mental illness.

### Table 3

Age, sex, duration of illness and religious coping as predictors of ISMI.

been reported that there is no significant relationship between the duration of illness and perceived and experienced stigmatization.<sup>[22,23]</sup> In our study, the use of a sample of patients followed by a community mental health center may have led to results of individuals with a relatively better prognosis and under treatment. The negative correlation between the duration of illness and perceived discrimination may be related to the fact that the longer the duration of illness, the less likely it is to be affected by negative situations and the better integration and adaptation capacity to the society. The perception of schizophrenia as an unpredictable and dangerous disease may change over time due to the good prognosis of patients and reduce the level of stigmatization. In other words, the decrease in internalized stigma with increasing duration of illness can be explained by the decrease in social stigma over time.

In our study, the fact that the mean ISMI scores were higher in the male gender than in the female gender is consistent with previous studies conducted in psychiatric patients in our country. In 2012, it was found that the internalized stigma scores were higher in individuals with male gender, illiteracy and at least 1 hospitalization per year in outpatient psychiatric patients.<sup>[24]</sup> This may be due to the fact that the male gender has a worse prognosis in schizophrenia or that women are more cooperative and extroverted in mental problems.<sup>[25]</sup>

The main finding of our study is that the perceived discrimination and social withdrawal subdimensions of internalized stigma are negatively correlated with positive religious coping and positively correlated with negative religious coping. Although there are insufficient studies examining the relationship between internalized stigma and religious coping attitudes in the literature, there are a number of studies examining the effect of religious coping styles on mental health.<sup>[11]</sup> A study of young adults diagnosed with severe mental disorders reported that these patients used religious coping methods at levels comparable to mentally healthy samples. Religious compassion and help-oriented appraisals were associated with positive mental states, while perceptions of God's punitive power were associated with increased stress levels and low functioning.<sup>[26]</sup> Some studies suggest that engaging in religious activities is associated with better psychiatric treatment adherence in patients with schizophrenia, while others suggest a relationship between religion and poor treatment adherence.<sup>[27,28]</sup> A 2013 study of psychiatric patients found that negative religious coping was associated with anxiety and depressive symptoms as well as severe mental symptoms.<sup>[29]</sup> Another study conducted with psychotic patients reported that negative religious coping was associated with suicidal ideation, depressive symptoms and anxiety.[30] Positive religious coping attitudes have been associated with decreased levels of depression and anxiety and overall mental well-being during the course of treatment.<sup>[30]</sup> In the same study, no relationship was found between psychotic symptoms and negative religious coping.<sup>[30]</sup> In a recent study conducted in Türkiye in 2023, which investigated coping attitudes and internalized stigmatization in patients with bipolar disorder,

Age, sex, unution of miles	s and religious ooping				
	В	Standard error	Beta	t	<i>P</i> value
Age	-0.007	0.119	-0.005	-0.056	.956
Sex	2601	1782	0.086	1460	.147
Duration of disease	-0.017	0.162	-0.009	-0.102	.919
Positive religious coping	0.190	0.170	0.075	1121	.264
Negative religious coping	3318	0.301	0.745	11.026	<.001

Multiple linear regression analysis was applied. Reference category = Female, P < .05 was accepted as significant. R = 0.729,  $R^2 = 0.516$ , F = 32.071, P < .001. ISMI = internalized stigma of mental illness.

a positive correlation was found between perceived discrimination and general religious coping attitudes, but it was not reported whether religious coping attitudes were positive or negative.<sup>[28]</sup> The positive correlation of social withdrawal and perceived discrimination with negative religious coping in our study may be related to the mutual feeding of negative feelings and the frequent use of religious arguments in the society they live in. In addition to the possibility that perceived discrimination may cause social withdrawal and that these 2 subdimensions are related to religious coping, the fact that the other subdimensions of internalized stigma are not related to religious coping is another finding of our study. This may be related to the fact that patients attributed the subdimensions of stereotype endorsement, stigma resistance and alienation to more individual situations and associated them less with religious grounds. It has been observed that there is not enough research in the literature examining the relationship between the subdimensions of internalized stigma and religious coping.

The negative correlation between positive and negative religious coping in our study is expected and the results are similar in previous studies.<sup>[31]</sup> While this correlation is expected to be much stronger, a moderate correlation was found in our study. This suggests that some patients have ambivalent feelings about religious coping, there may be inconsistencies in their perception of god, or they have different thoughts according to time and situation.

The fact that the total score of internalized stigma was positively correlated with negative religious coping and negatively correlated with positive religious coping can be explained by the reflection of self-stigma on religious coping attitudes. Individuals who stigmatize themselves and develop negative perceptions of themselves may attribute this to religious reasons, or individuals with negative religious perspectives may stigmatize themselves by developing negative judgments about their inner world. In this respect, whether the coping attitudes of self-stigmatizing individuals are cause or effect is an issue that needs to be investigated. The fact that mental health professionals often do not address dysfunctional religious attitudes and perceptions in individuals with severe mental illness may cause patients to seek alternative religious treatment.<sup>[32,33]</sup> According to the results of a study conducted on schizophrenia patients in our country in 2016, 89.3% of the participants consulted a traditional healer at least once in their lifetime and all the traditional healers consulted were reported to be religious healers.<sup>[32]</sup> These alternative searches often lead to negative financial and moral consequences for patients. Addressing these issues by psychotherapists can contribute both to the religious grounding of illnesses and to patients search for dysfunctional alternative treatments. In addition to studies investigating the relationship between religious coping and mental well-being in mental illness, the literature investigating the effect of intervening in dysfunctional religious coping attitudes is quite insufficient. For example, the contribution of cognitive restructuring, looking at negative events from a broader perspective, promoting positive religious coping attitudes to the course of mental illness in patients with negative religious coping attitudes is another issue that needs to be investigated.

In this study, multiple linear regression analysis was applied to reveal the explanatory effect of age, sex, duration of illness and religious coping on internalized stigma, and it was seen that the model obtained could explain 51.6% of the change in internalized stigma. This suggests that although other variables such as perceived stress, social support, self-esteem, self-efficacy, etc. Affecting self-stigmatization in schizophrenia were not addressed, the model we studied has effects that cannot be ignored. Since there is not enough data on this issue in the literature, it was not possible to make a comparison between the predictive power of different models and our model.

### 4.1. Limitations

Although the results of this study are promising, some limitations should be mentioned. Since our study sample was collected from a single center, these findings cannot be generalized to all patients. Furthermore, a cross-sectional survey was used to collect data on the study variables, so the current findings are not sufficient to make causal inferences. An important limitation in our study is that depression, which is an important confounding factor, could not be evaluated. Another limitation is that other factors that may affect internalized stigma and religious coping (negative life events, education, perceived emotional expression, perceived stress, etc) have not been investigated.

### 5. Conclusion

According to the findings of our study, the fact that a significant relationship was found between positive and negative religious coping attitudes and some subdimensions of internalized stigma may be instructive for determining religious coping attitudes and developing alternatives for dysfunctional attitudes, among other issues addressed in the fight against stigmatization in schizophrenia. Reconstructing a challenging life event, such as having a mental illness, with a positive religious attitude and perspective can help reduce internalized stigma. In the light of the present findings, we believe that it is important for psychiatrists and psychologists to address patients search for and need for spiritual support as part of their treatment.

### Author contributions

Conceptualization: Ayşe Erdogan Kaya. Data curation: Ayşe Erdogan Kaya, Ünsal Aydinoğlu. Formal analysis: Ayşe Erdogan Kaya, Ünsal Aydinoğlu. Investigation: Ayşe Erdogan Kaya, Ünsal Aydinoğlu. Methodology: Ayşe Erdogan Kaya. Project administration: Ayşe Erdogan Kaya. Resources: Ayşe Erdogan Kaya, Ünsal Aydinoğlu. Software: Ayşe Erdogan Kaya.

Supervision: Ayşe Erdogan Kaya.

Validation: Ayşe Erdogan Kaya.

- Visualization: Ayşe Erdogan Kaya.
- Whiting anising 1 Andre Area Enderen V

Writing – original draft: Ayşe Erdogan Kaya, Ünsal Aydinoğlu. Writing – review & editing: Ayşe Erdogan Kaya, Ünsal Aydinoğlu.

### References

- [1] Insel TR. Rethinking schizophrenia. Nature. 2010;468:187-93.
- [2] Karidi MV, Stefanis CN, Theleritis C, et al. Perceived social stigma, self-concept, and self-stigmatization of patient with schizophrenia. Compr Psychiatry. 2010;51:19–30.
- [3] Link BG, Yang LH, Phelan JC, et al. Measuring mental illness stigma. Schizophr Bull. 2004;30:511–41.
- [4] Corrigan PW, Rao D. On the self-stigma of mental illness: stages, disclosure, and strategies for change. Can J Psychiatry. 2012;57:464–9.
- [5] Buchman-Wildbaum T, Váradi E, Schmelowszky A, et al. Targeting the problem of treatment non-adherence among mentally ill patients: the impact of loss, grief and stigma. Psychiatry Res. 2020;290:113140.
- [6] Smilowitz S, Aftab A, Aebi M, et al. Age-related differences in medication adherence, symptoms, and stigma in poorly adherent adults with bipolar disorder. J Geriatr Psychiatry Neurol. 2020;33:250–5.
- [7] Abdisa E, Fekadu G, Girma S, et al. Self-stigma and medication adherence among patients with mental illness treated at Jimma University Medical Center, Southwest Ethiopia. Int J Ment Health Syst. 2020;14:56.
- [8] Türküm AS. Stresle başa çıkma ölçeğinin geliştirilmesi: geçerlik ve güvenilirlik çalışmaları. Turk Psychol Couns Guid J. 2002;2:25–34.
- [9] Kaya AE, Aktürk BE, Aslan E. Factors predicting the motivation to study abroad in Turkish medical students: a causal investigation into the problem of brain drain. J Health Sci Med. 2023;6:526–31.
- [10] Ritsher JB, Otilingam PG, Grajales M. Internalized stigma of mental illness: psychometric properties of a new measure. Psychiatry Res. 2003;121:31–49.

- [11] Tepper L, Rogers SA, Coleman EM, et al. The prevalence of religious coping among persons with persistent mental illness. Psychiatr Serv. 2001;52:660–5.
- [12] Pirutinsky S, Rosmarin DH, Pargament KI, et al. Does negative religious coping accompany, precede, or follow depression among orthodox jews? J Affect Disord. 2011;132:401–5.
- [13] Abu Raiya H, Pargament KI, Mahoney A, et al. A psychological measure of Islamic religiousness: development and evidence for reliability and validity. Int J Psychol Relig. 2008;18:291–315.
- [14] Ekşi H, Sayın M. The adaptation of religious coping scale into Turkish language: a study of bilingual equivalance, validity and reliability. AGP Humanities and Social Sciences Conference, BAU International Berlin University; 2016.
- [15] Ersoy MA, Varan A. Reliability and validity of the Turkish version of the internalized stigma of mental illness scale. Turk Psikiyatri Derg. 2007;18:163.
- [16] Çapar M, Kavak F. Effect of internalized stigma on functional recovery in patients with schizophrenia. Perspect Psychiatr Care. 2019;55:103-11.
- [17] Sagud M, Peles AM, Pivac N. Smoking in schizophrenia: recent findings about an old problem. Curr Opin Psychiatry. 2019;32:402–8.
- [18] Aras HI. Şizofrenide madde kullanım bozuklukları eş tanısı. Psikiyatride Güncel Yaklaşımlar. Current Approaches in Psychiatry. 2013;5:260–75.
- [19] Regier DA, Farmer ME, Rae DS, et al. Comorbidity of mental disorders with alcohol and other drug abuse: results from the epidemiologic catchment area (ECA) study. JAMA. 1990;264:2511–8.
- [20] Evren C, Şizofreni EC. alkol madde kullanım bozuklukları ek tanısı: bir gözden geçirme. Turk Psikiyatri Derg. 2003;14:213–24.
- [21] Winklbaur B, Ebner N, Sachs G, et al. Substance abuse in patients with schizophrenia. Dialogues Clin Neurosci. 2006;8:37–43.
- [22] Gerlinger G, Hauser M, De Hert M, et al. Personal stigma in schizophrenia spectrum disorders: a systematic review of prevalence rates, correlates, impact and interventions. World Psychiatry. 2013;12:155–64.

- [23] Coşkun S, Güven Caymaz N. Comparison of internalized stigma level among patients attending a public versus private psychiatric institution. J Psychiatr Nurs. 2012;3:121–8.
- [24] Tel H, Ertekin Pinar S. Internalized stigma and self-esteem in outpatients with psychiatric illness. J Psychiatr Nurs. 2012;3:61–6.
- [25] Henderson C, Evans-Lacko S, Thornicroft G. Mental illness stigma, help seeking, and public health programs. Am J Public Health. 2013;103:777–80.
- [26] Phillips RE 3rd, Stein CH. God's will, God's punishment, or God's limitations? Religious coping strategies reported by young adults living with serious mental illness. J Clin Psychol. 2007;63:529–40.
- [27] Grover S, Davuluri T, Chakrabarti S. Religion, spirituality, and schizophrenia: a review. Indian J Psychol Med. 2014;36:119–24.
- [28] İlter ZC, Çetin SB, Özkorumak E, et al. The relationship between internalized stigma and coping strategies in bipolar disorder. Turk J Clin Psychiatry. 2023;26:60–8.
- [29] Nurasikin MS, Khatijah L, Aini A, et al. Religiousness, religious coping methods and distress level among psychiatric patients in Malaysia. Int J Soc Psychiatry. 2013;59:332–8.
- [30] Rosmarin DH, Bigda-Peyton JS, Öngur D, et al. Religious coping among psychotic patients: relevance to suicidality and treatment outcomes. Psychiatry Res. 2013;210:182–7.
- [31] Mirzaee F, Hasanpoor-Azghady SB, Amiri-Farahani L. Correlation between religious coping, demographic and fertility factors, and pregnancy anxiety of Iranian primiparous women: a cross-sectional study. BMC Psychiatry. 2022;22:1–9.
- [32] Yazici E, Yazici AB, Ince M, et al. The search for traditional religious treatment amongst schizophrenic patients: the current situation. Anatolian J Psychiatry. 2016;17:174–80.
- [33] Pham TV, Koirala R, Wainberg ML, et al. Reassessing the mental health treatment gap: what happens if we include the impact of traditional healing on mental illness? Community Ment Health J. 2021;57:777–91.