



Original Article



Exploring Gender Differences in Perceived Stress, Internalized Stigma of Mental Illness, and Coping Styles among Caregivers of People Diagnosed with Psychiatric Illness

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ABSTRACT

Globally it is seen that not only the patients who are suffering from mental disorders but also the caregivers or family members are also facing multiple psychological distress due to their disturbances. **Objectives:** To measure perceived stress, internalized stigma, and coping styles among caregivers of psychiatric patients. **Methods:** 160 participants were selected through purposive sampling from eight hospitals in Lahore. The study questionnaire booklet included the Urdu versions of the Internalized Stigma Scale, Coping Styles Scale, and Perceived Stress Scale respectively. Pearson product-moment correlations and T-tests were computed to explore gender differences in levels of the study variables. **Results:** The results revealed that women spent more time with loved ones as compared to men. There was a strong relationship with most of the variables among men, whereas the copying style scale showed no relationship with all variables. There was a strong relationship reported among women on most of the variables but coping style indicates a negligible relationship with the internalized stigma of mental illness. The T-test indicates that there was a significant difference ($p\text{-value}=0.04^*$) reported on the internalized stigma of mental illness stereotype endorsement among men and women, whereas the rest of the variables did not report any significant differences. **Conclusions:** It was concluded that future research should be conducted on caregivers to create awareness and mitigate internalized stigma of mental illness as well as reduce stress common among people.

INTRODUCTION

Psychological disorders are increasingly prevalent, affecting approximately one in four families globally [1]. This rise in mental illness places a significant burden not only on individuals but also on their caregivers, who often face profound emotional and psychological challenges. In Pakistan, caregivers typically provide support without financial compensation due to cultural and religious norms, contrasting with many European countries where caregiving is often compensated. This disparity highlights a critical research gap in understanding the unique challenges faced by caregivers in different cultural contexts. Despite extensive research on mental illness, there is a notable lack of studies focusing on the experiences of caregivers, particularly in Pakistan.

Existing research has predominantly centered on patients, leaving a gap in our understanding of how caregivers manage internalized stigma, perceived stress, and coping strategies. According to one study, the caregivers of patients diagnosed with psychiatric illness reported severe psychological problems [2]. Patients suffering from different mental disorders experience perceived stress and internalized stigma by using different coping styles such as emotions-focused and problem-focused copying styles to move on in their life. The primary research problem is the inadequate understanding of how internalized stigma impacts caregivers' perceived stress and coping strategies, especially in culturally specific contexts such as Pakistan. While there is substantial



literature on mental illness and patient experiences, there is a significant gap in research focusing on caregivers, particularly regarding how cultural and socio-economic factors influence their stress and coping mechanisms. This study is crucial for several reasons, such as it provides insights into the psychological burden borne by caregivers and highlights the impact of internalized stigma on their well-being. Understanding these dynamics will help in developing targeted support interventions and improving resources for caregivers in Pakistan and similar settings. The objective of this study is to investigate the relationship between internalized stigma, coping styles, and perceived stress among caregivers of individuals with psychiatric disorders in Pakistan. Specifically, it aims to: Assess how internalized stigma affects caregivers' psychological well-being; Explore the coping strategies used by caregivers in response to stigma and stress; Determine the impact of these coping strategies on caregivers' stress levels; and Develop recommendations for tailored support interventions for caregivers. The current study was influenced by "An Integrative Cognitive Model of Internalized Stigma among Caregivers and A Stress-Coping Model of Mental Illness Stigma" [3]. It was reported in every society that there was a strong social stigma, prejudice, and stereotype pattern related to mental illness. Such kind of stigma not only distresses psychiatric patients but also public prejudice and strongly influences their caregivers as well. Findings reported that most participants reported higher stress stigma and social prejudice. The research was conducted on "Comparing Affiliate Stigma between Family Caregivers of People with Different Severe Mental Illness in Taiwan" [4]. This study was conducted to examine the level of burden of mental illness, anxiety, depression, self-esteem, and affiliated stigma of caregivers diagnosed with depression, schizophrenia, and bipolar disorder, by using the ANOVA descriptive method. It was found that caregivers with schizophrenia disorder were highly stigmatized, anxious, depressed, and had lower levels of self-esteem as compared to depressive and bipolar caregivers. The caregivers with bipolar disorder were also highly stigmatized, anxious, depressed, and had less self-esteem as compared to depressive caregivers. Female caregivers as parents reported more burdened and stigmatized as compared to spouses [4]. In Pakistan, Rawalpindi city (Armed Forces Institute of Mental Health), research was done on caregivers of people diagnosed with mood disorders and schizophrenia disorder. It was examined that multiple factors were associated with increased caregivers' burden and stress in providing effective care to family members with severe mental illness [5]. It was reported that as much time is spent with patients a higher level of stigma and psychological stress was reported among caregivers, whereas as less time is spent with

patients a lower level of stigma and stress was reported. The results also revealed that less stress, and burden were reported with higher levels of education, unmarried caregivers, higher socio-economic status, and living in urban areas so their psychological well-being was good as compared to others [5].

This study aims to measure perceived stress, internalized stigma, and coping styles among caregivers of psychiatric patients.

METHODS

It was a cross-sectional study and IBM SPSS version 21.0 was used for analysis. A total of 160 adult caregivers or family members of the patients diagnosed with psychiatric illness were selected from different government hospitals in Lahore. Urdu versions of all standardized questionnaires, such as Internalized Stigma of Mental Illness (ISMI), Coping Strategies Scale, Perceived Stress Scale, and demographic variables were utilized via purposive sampling to collect data from psychiatric wards. Inclusion criteria were caregivers diagnosed with psychiatric disorders and living with the patients for the last six months. Patients must be diagnosed by a professional psychiatrist and admitted to the hospital in the last two months. Exclusion criteria were participants diagnosed with any medical or psychiatric disorder. Caregivers who were taking care of more than two family members diagnosed with psychiatric or chronic disorders. Internalized Stigma of Mental Illness was introduced by Ritsher, Otilingam, & Grajales in 2003, and there are twenty-nine items used for the adult population. This was translated into Urdu. The Coping Styles Scale (CSS) is a self-report assessment that consists of twenty-two items on a five-point Likert scale with the age range of eighteen to fifty years old. It is divided into two major groups (i) Problem-focused coping and (ii) Emotion-focused coping [6]. The Perceived Stress Scale (PSS) was used to "measure the degree to which situations in one's life are appraised as stressful" [7]. To check the relationship between study variables Pearson Product Moment Correlation Coefficient was applied and the T-test was utilized to explore the comparison of gender differences among men and women on all variables. Informed consent was taken before collecting data, and ethical guidelines were followed. At the end of data collection, the caregivers were offered counselling services to manage their stress level, for this approval was taken from hospital professionals. Approval of educational institutions, the Board of Advance Research Studies, and the IRB Board were sought out for this research. The Institutional Ethical Committee overviewed the research proposal including the research aim, methodology, proposed statistical analysis and expected outcomes and after careful investigation, the IRB ethical committee approved the present research study. Moreover, the IRB Reference number was IRB-224/06-2020. The total time duration of the research process and

data collection was between June 2020 to July 2021.

RESULTS

The mean age of men was 34.14 (SD=13.69) and for women, it was 36.50 (SD=12.40) years. Men (56%) outnumbered women (44%) in the sample. The length of time living with the patient for women was higher than for men as the male participants of this research were reported based on the length of time living with the patient less than one month was 9 percentile was 10.34 (Table 1).

Table 1: Descriptive Statistics of the Sample (n=160)

Variables		Frequency (%)
Gender	Men	87 (55.6%)
	Women	73 (44.4%)
Length of Time Living with the Patient	Men	
	Less Than One Month	9 (10.34%)
	More Than One Month	78 (89.66%)
	Women	
	Less Than One Month	17 (23.29%)
	More Than One Month	56 (76.71%)
Education Level	Men	
	Secondary or Below	65 (74.6%)
	Graduation or Higher	44 (25.2%)
	Women	
	Secondary or Below	58 (39.2%)
	Graduation or Higher	15 (6.9%)

The internalized stigma of mental illness consisted of 29 items highly reliable (0.90). The perceived stress scale consisted of 10 items and it is also good reliability (0.75). The coping style scale consisted of 22 items and it has good reliability (0.77). The problem-focused coping style consisted of 8 items and it is also good reliability (0.75) (Table 2).

Table 2: Cronbach's Alpha Reliability of Internalized Stigma of Mental Illness, Perceived Stress Scale and Coping Style Scale (n=160)

Variables	No of Items	α
Internalized Stigma of Mental Illness	29	0.90
Internalized Stigma of Mental Illness Alienation	6	0.74
Internalized Stigma of Mental Illness Stereotype Endorsement	7	0.74
Internalized Stigma of Mental Illness Discrimination Experience	5	0.68
Internalized Stigma of Mental Illness Social Withdraw	6	0.68
Perceived Stress Scale	10	0.75
Coping Style Scale	22	0.77
Problems Focus Coping Styles	8	0.75
Emotion Focus Coping Style	14	0.62

Note, α =Cronbach Alpha

There is a strong positive correlation among most of the variables, whereas the emotion-focused coping style revealed a significant correlation with the internalized stigma of mental illness and its four subscales including

alienation, stereotype endorsement, discrimination experience, social withdrawal, and perceived stress scale variables. There was not any significant relationship between the internalized stigma of mental illness stigma resistance and with emotion-focused coping style scale (Table 3).

Table 3: Correlation Matrix of Study Variables in Men (n=87)

Scales	1	2	3	4	5	6	7	8	9	10
1. ISMI	-	-	-	-	-	-	-	-	-	-
2. ISMIA	0.90*	-	-	-	-	-	-	-	-	-
3. ISMISE	0.89**	0.73**	-	-	-	-	-	-	-	-
4. ISMIDE	0.92**	0.79**	0.83**	-	-	-	-	-	-	-
5. ISMISW	0.81**	0.72**	0.54	0.69**	-	-	-	-	-	-
6. ISMISR	0.64**	0.45**	0.57**	0.49**	0.43**	-	-	-	-	-
7. PSS	0.55*	0.48**	0.49**	0.47**	0.46**	0.41**	-	-	-	-
8. CSS	0.33**	0.29**	0.29**	0.27*	0.29**	0.24*	0.33**	-	-	-
9. CSSpfcs	0.08	0.03	0.12	0.04	0.02	0.21*	0.09	0.76**	-	-
10. CSSefcs	0.42**	0.40**	0.37**	0.36**	0.44*	0.181	0.40*	0.88**	0.36**	-
11. M (SD)	74.71 (14.8)	15.43 (4.13)	19.00 (4.48)	13.05 (3.23)	14.18 (3.39)	13.03 (2.15)	24.64 (7.80)	73.67 (11.03)	29.95 (5.67)	43.72 (7.67)

Note. ISMIA=internalized Stigma of Mental illness, Alienation, ISMISE=Internalized Stigma of Mental illness Stereotype Endorsement, ISMIDE=Internalized Stigma of Mental illness Discrimination Experience, ISMISW=Internalized Stigma of Mental illness Social withdrawal, ISMISR, Internalized Stigma of Mental illness Stigma Resistance, CSS, Coping Style Scale, CSSpfcs=Problem Focus Coping Style Scale, and CSSefcs=Problem Focus Coping Style Scale

There is a strong positive correlation of ISMI (**p<0.01) with most of the variables. There was not any significant relationship reported among internalized stigma of mental illness discrimination experience, social withdrawal, and perceived stress scale variables. Problem-focused coping style variables do have not any significant association with the internalized stigma of mental illness social withdrawal and stereotype endorsement. It was also found that emotions-focused coping styles did not have any significant relationship with the internalized stigma of mental illness, alienation, stereotype endorsement, discrimination experience, and stigma resistance, emotions-focused coping styles have a negative relationship with the internalized stigma of mental illness and social withdrawal (Table 4).

Table 4: Correlation Matrix of Study Variables in Female (n=73)

Scales	1	2	3	4	5	6	7	8	9	10
1. ISMI	-	-	-	-	-	-	-	-	-	-
2. ISMIA	0.85**	-	-	-	-	-	-	-	-	-
3. ISMISE	0.87**	0.70**	-	-	-	-	-	-	-	-
4. ISMIDE	0.79**	0.59**	0.62**	-	-	-	-	-	-	-
5. ISMISW	0.75**	0.55**	0.55**	0.49**	-	-	-	-	-	-
6. ISMISR	0.57**	0.38**	0.33**	0.37**	0.31**	-	-	-	-	-
7. PSS	0.32**	0.27*	0.29**	0.16	0.19	0.29*	-	-	-	-

8. CSS	0.20	0.24*	0.16	0.19	0.03	0.24*	0.34**	-	-	-
9. CSSpfcs	0.26*	0.28*	0.17	0.27*	0.07	0.28*	0.24*	0.89**	-	-
10. CSSefcs	0.12	0.19	0.13	0.11	0.09	0.18	0.37**	0.99**	0.67**	-
11. M (SD)	78.43 (11.8)	16.09 (3.10)	20.36 (4.13)	13.76 (2.62)	14.94 (2.92)	13.26 (2.31)	26.61 (5.25)	72.91 (12.44)	28.97 (5.78)	43.94 (7.82)

There was a significant difference among both genders on the internalized stigma of mental illness stereotype endorsement ($p=0.04^*$, Cohen's $d=0.31$), whereas, there were not any significant differences reported among all other variables. It was revealed that men ($M=24.64$, $SD=7.80$) and women ($M=26.61$, $SD=5.25$) showed a marginally significant difference in PSS, Cohen's $d=0.29$. There was no significant difference between men and women in the coping style scale but a significant difference was found in the problem-focused coping style, where women ($M=48.97$, $SD=5.78$) scored significantly higher than men ($M=29.95$, $SD=5.67$), Cohen's $d=3.32$ (Table 5).

Table 5: Comparison of Gender Differences (Men and Women) on All Variables

Variables	Men	Women	t(304)	p	95% CI		Cohen's d
	M ± SD	M ± SD			LL	UL	
1. ISMI	74.71 ± 14.83	78.43 ± 11.30	-1.73	0.08	-7.96	0.51	0.28
2. ISMIA	15.43 ± 4.13	16.09 ± 3.10	-1.12	0.68	-1.81	0.50	0.18
3. ISMISE	19.00 ± 4.48	20.37 ± 4.13	-1.99	0.04*	-2.72	-0.01	0.31
4. ISMIDE	13.05 ± 3.23	13.76 ± 2.63	-1.50	0.13	-1.64	0.22	0.24
5. ISMISW	14.18 ± 3.39	14.94 ± 2.92	-1.50	0.14	-1.77	0.23	0.09
6. ISMISR	13.03 ± 2.15	13.27 ± 2.31	-0.63	0.52	-0.92	0.47	0.10
7. PSS	24.64 ± 7.80	26.61 ± 5.25	-1.84	0.07	-4.09	0.14	0.29
8. CSS	73.67 ± 11.03	72.91 ± 12.44	.409	0.68	-2.90	4.42	0.06
9. CSSpfcs	29.95 ± 5.67	48.97 ± 5.78	1.08	0.29	-0.81	2.78	3.32
10. CSSefcs	43.72 ± 7.67	43.94 ± 7.82	-0.18	0.85	-2.64	2.20	0.02

DISCUSSION

Past research reported, that a higher level of stigma develops a higher level of stress so to minimize this, maximum coping styles need to be implemented to take good care of patients diagnosed with psychiatric illness [8]. In previous research, it was reported that problem-focused coping styles were mostly practised coping styles, and emotion-focused coping styles were less likely practised among both genders (men and women). It was also reported that there was no significant relationship between perceived stress and the stigma of mental illness [9]. In another research, it was reported that most people practice emotion-focus coping styles frequently to overcome daily life issues [10]. In various research, it was reported that coping styles PFCS and EFCS and perceived stress did not have any significant differences among male and female [11-13]. Another Indian study explored that sometimes cultural background and differences have significantly influenced the perception of schizophrenia illness. It was also revealed that family members were highly affected by the perception of illness of

schizophrenia and several coping styles were adopted to manage their stress [14]. However, another study reported that as the stigma increases the psychological distress and burden also increase which requires maximum practice of coping styles among caregivers of patients with psychiatric illness [15]. In Bangalore and India, research was conducted on caregivers of psychosis patients to the results indicate that caregivers did not notice any change in the behaviour of their dear ones because of illiteracy and lack of awareness of psychiatric illness so they could not handle their psychosis symptoms. caregivers reported that the perceived stigma of illness of their loved ones also affects the mental health as well as the daily life of the caregivers [16]. Another research was conducted in the UK on caregivers of patients diagnosed with schizophrenia and schizoaffective disorders. Results indicated that socioeconomic burden, mental stress, and psychological disturbances were moderately reported among caregivers across multiple cultures. The majority of the participants, living with schizophrenia and schizoaffective or both disorders reported higher levels of emotional disturbances and imbalances [17]. Caregivers of patients suffering from mental disorders have numerous psychological disturbances and mental distress, including stress, anxiety, depression, lack of social interaction, various interpersonal conflicts, multiple emotional problems, psychological distress, social pressure, and even mental illness [18]. Results were also supported by previous research conducted in China in 2005-2008 on adult participants [19]. A previous study explored that female caregivers were more stigmatized due to stress and social/mental stigma as compared to male caregivers [20]. During data collection and analysis, it was observed that individuals lack awareness of psychiatric illness and psychological disorders because it is most commonly considered mental disorders that are highly labelled and stigmatized by society, so they need to work and create awareness among people. According to the World Health Organization (WHO), mental health awareness would be for patients, caregivers, external relatives, and other common individuals so that the stigma of mental illness can be minimized. The main goal of the current study was to develop awareness among local people related to the psychological distress of caregivers of patients suffering from psychiatric disorders.

CONCLUSIONS

It was concluded that this study provides valuable insights into gender differences in perceived stress, internalized stigma, and coping styles among caregivers of individuals with psychiatric illnesses. Key findings indicate that female caregivers report higher levels of perceived stress and internalized stigma compared to their male counterparts.

Women also spend significantly more time providing care, which may contribute to their heightened stress levels. While both men and women show strong relationships between the study variables, coping styles among caregivers have different implications: men exhibit more pronounced correlations with stress and stigma, whereas women's coping styles show a minimal relationship with internalized stigma.

Authors Contribution

Conceptualization: SB, ES

Methodology: SB, ES

Formal analysis: AN, HY

Writing review and editing: SB, ES, AN, HY, RS

All authors have read and agreed to the published version of the manuscript.

Conflicts of Interest

The authors declare no conflict of interest.

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