

SEVERITY OF RECENT STRESSFUL LIFE EVENTS IN DEPRESSIVE PATIENTS

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ABSTRACT

OBJECTIVE

To determine the frequency of recent stressful life events in depressive patients.

STUDY DESIGN

Cross sectional study.

PLACE AND DURATION OF STUDY

The study was conducted in psychiatric unit of civil hospital Karachi from 2016 to 2017.

SUBJECTS AND METHODS

The present prospective cross sectional study was conducted over a period of six months in the Department of Psychiatry of Pakistan Navy Ship (PNS) Shifa Hospital Karachi. After approval of synopsis from CPSP and the ethical committee of PNS Shifa hospital. All the patients through Psychiatry inpatients and outpatient's departments who fulfilled the eligibility criteria were enrolled in the study. Informed consent was taken after explaining the procedure, risks and benefits of the study. The stressful life events were diagnosed on social readjustment rating scale (SRRS) score. All the collected information will be entered the pre-designed Performa and SPSS version 20.0 was used for data analysis.

RESULTS

Mean \pm SD of age was 36.81 ± 11.02 years. Out of 237 patients, 90 (38%) were male and 147 (62%) were female. Mean \pm SD of SRRS was 220.61 ± 80.06 . In frequency of life event severity 156 (66%) had low, 49 (21%) and 32 (13%) had severe and mild severity of life event respectively.

CONCLUSION

Current study concludes that most of the depressive patients had low stressful life event severity. It is to be concluded that to handle the stressful events during short and long-term period, prevention and treatment strategies for depression are required.

KEY WORDS

Depression, Mood Disorders, Life change events, Life event severity.

INTRODUCTION

Public health concern in developing countries includes an increasing percentage of depressive disorder¹. Major contribution of depressive disorder to the global burden of diseases in 2020 is predicted to be the second most common cause of disability². Occurrence of depressive disorders in Pakistan is particularly high a major fraction being contributed by women³. In Pakistan, the adjusted prevalence of depressive disorders is 44.4%⁴. An overall prevalence of anxiety and depressive disorders recommended by systematically collected peer reviewed studies is 34%⁵.

Stressful Life event stress is directly associated with depression and is mostly operationalized by self-report checklists of specific distressing life experiences such as divorce, loss of close relatives, serious diseases, or sexual abuse in childhood. The development of depression is most likely to occur with the person who has experienced more stressful life events and can also be caused by job related factors⁶. Depression affects the whole life in general and can impact performance on job⁷. Research has also shown that stressful life events (SLEs) influence the pattern of individual depressive symptoms⁸.

Recent studies identify various factors that are directly associated to or that may predispose to the progression of first depressive episode or contributes to the recurrence. Different clinical, demographic variables and psychosocial factors have been identified^{9,10}. Major stressful life events play significant important role in the etiology of depression. In a recent study, life events severity pertaining to number of episodes showcased statistically differences in SRRS total score, moderate and mild life events ($F= 15.14, p<0.001$) but not for severe life events¹¹. People with a recurrent major stressful life event are 2.3-12 times more vulnerable to develop depression^{12,13}. A local study concluded that stressful life events preceding depressive illness as compared with dissociative (conversion) disorder were of similar timing, type, nature and intensity. While majority of such events were marked within first 02 months prior to the development of the current episode¹⁴. In a study, the prevalence of low, mild and severe stressful life events in patients with first and recurrent depressive episodes was 65%, 29.8% and 5.9%¹¹.

The purpose of this study is to find out the frequency of severity of stressful life events in our target population, which might suffer from depression due to stressful life events. This study would help in

preclusion and management strategies for the recurrences of depression and to educate them as to how to manage stressful events of life during mild and long term periods and not just in the initial recurrences of the disease.

SUBJECTS AND METHODS

Participants

237 patients with depression (using ICD-10 diagnostic criteria) were recruited using non-probability consecutive sampling technique. The biasness was controlled by strictly following the inclusion and exclusion criteria.

Inclusion criteria was patients of age between 18-60 years, of either gender and already diagnosed as depressive using ICD-10 diagnostic criteria. Exclusion criteria followed as patients, who had a lifetime history of bipolar disorder, schizophrenia, schizoaffective disorder, confirmed on the basis of history or medical records, patients with history of substance use/abuse within last 6 months and patients with Intellectual development disorder/general learning disability on the basis of clinical history.

Instruments

After identifying patient, the demographic profile of the patients was noted and stressful life events were diagnosed on the basis of psychometric rating instrument named as social readjustment rating scale (SRRS). Stressful life events were categorized into three levels of severity (mild, moderate and severe). The relevant effect modifiers/confounders like age, gender, living status, educational status, employment status, marital status, economic status and depression status were analyzed.

Procedure

The present prospective cross sectional study was conducted over a period of six months in the Department of Psychiatry of Pakistan Navy Ship (PNS) Shifa Hospital Karachi. After institutional ethical committee approval, patients were briefed about the study and informed consent was sought. the data were collected and confidentiality of patient was maintained.

The data was analysed by using SPSS version 21. Mean and standard deviation were computed for quantitative variable, i.e. age, number of family members, SRSS Score. Frequency and percentage were calculated for qualitative variables [i.e. Gender, living status, lives, educational status, employment status, marital status, economic status, depression status and recent stressful life events (Low/Mild/Severe). Stratification were done with regards to age, living status, lives, educational status, employment status, marital status, economic status and depression status to see the effect of these on confounders, by using chi square test and P-value < 0.05 was taken as significant.

RESULTS

A total of 237 patients was recruited to assess the recent stressful life events in depressive patients. Mean age of the sample was 36.81±11.02, mean score of SRRS was 220.61±80.06 and Mean

number of family members was 6.60±3.72 (see table 1 for details). In Gender distribution 90 (38%) were male and 147 (62%) were female. Most of the patients belonged to urban area, i.e. 200 (84%) and 37 (16%) belonged to rural area. Level of Education of most of the patients were primary, 57 (24.1%) and 56 (23.6%) were illiterate. In distribution of employment status 119 (51%) did housework, 98 (41%) were employed and 20 (8%) were unemployed. In marital status 194 (82%) were married, 20 (12%) were single, 14 (6%) were widowed. On socioeconomic status 66 (28%) belonged to lower class while 151 (64%) were from middle class (see table 2).

As per severity of depression 149 (63%) had moderate depression and 54 (23%) had severe depression. As per severity of recent life event severity 156 (66%) had low while 49 (21%) had mild severity (see table 3).

Stratification of recent life event severity was done with respect to age, gender, number of family members, economic status, marital status, employment status, Educational status, lives status, living area , SRSS score and depression status were done through Chi square. Chi square statistics showed statistically significant differences on age, socioeconomic status, marital status and level of education while Chi square could not produce enough evidence to establish statistical differences on gender, no of family members, employment status and area of living. Chi square statistics have also shown statistical differences in severity of depression as per severity of recent stressful life events (see table 4).

Table 1
Descriptive statistics of age, SRRS, and no of family members (n= 237)

	Age	SRRS	No. of family member
Mean	36.81	220.01	6.60
SD	11.02	80.06	3.72
95% Confidence interval	35.40 -38.22	210.37 -230.86	6.13 -7.08
Median	36	225	6
Rang	39	377	17
Interruptible Range	18	103	4

Table 2
Descriptive statistics of the sample (n= 237)

Demographic		f	%
Living Area	Rural	37	16
	Urban	200	
Gender	Male	90	38
	Female	147	62
Education Status	Literate	56	23.6
	Primary	57	24.1
	Secondary	48	20.3
	Metrie	29	12.2
Employee Status	Graduated	47	19.8
	House work	119	51
	Employed	98	41
	Unemployed	20	8
Marital status	Married	194	82
	Single	29	12
	Widow	14	6
Socio-economic status	Lower	66	28
	Middle	151	64
	Upper	20	8

Table 3
Descriptive statistics of the variables of the study (n = 237)

Variable		f	%
Stressful life events	Low	156	66
	Mild	32	13
	Severe	49	21
Severity of depression	Mild	34	14
	Moderate	149	63
	Severe	54	23

Table 4
Chi square statistics on demographic variables (n = 237)

Variables		Recent life events			P
		Low	Mild	Severe	
Age group	20-36	89	20	10	.0001
	Grater then 36	67	12	39	
Gender	Male	56	14	20	.635
	Female	100	18	29	
No. of family member	1-6	101	18	24	.127
	More then 6	55	14	25	
Severity of depression	Mild	31	3	0	.0001
	Moderate	110	25	14	
	Severe	15	4	35	
Socio economic status	Low	34	8	24	.002
	Middle	106	20	25	
	Upper	16	4	0	
Marital status	Married	136	28	30	.001
	Single	20	4	5	
	Widow	0	0	14	
Employee status	House wife	84	15	20	.541
	Employee	59	15	24	
	Unemployed	13	2	5	
Education status	Illiterate	30	6	20	.0001
	Primary	45	6	5	
	Middle	35	9	4	
	Metric	11	3	15	

DISCUSSION

The study aimed to assess the frequency of recent stressful life events in depressive patients. In recent years recurrent depression studies have moved from a simple demonstration of the effect of stressful life events to examining more complex interrelationships. Empirical research on hysterical conversion has lagged behind theoretical speculation¹⁵. Prevalence studies are rare, etiological considerations are even rarer.

ICD-10 research criteria do not consider the impact of depressive symptoms on daily living activities in arriving at a diagnosis of a depressive episode¹⁶. Consequently, we performed parallel tests using both a broader depressive phenotype (i.e., ICD-10 depressive episode of any severity) and a narrower phenotype (i.e., only ICD-10 severe depressive episode). The results for the gene–environment interaction are more apparent when using the latter to construct.

This may indicate that ICD-10 severe depressive episode is a more specific depressive phenotype. It may also suggest that there could be a linear tendency for the reported gene–environment interaction to influence increasingly more intense depressive states. The definition of the depressive phenotype is crucial in tests of the gene–environment interactions and has been one of the major limitations of previous research on this topic^{17,18,19}.

In the present study, the mean age of the patient was 36.81 ± 11.02 years with a confidence level (35.40-38.22) years. This result correlates with the other studies²⁰.

Marital tension was more prominently present in manic and depressed patients. In earlier studies also marital tension has been reported as a stressful life event of depressed patients²¹. In a recent study of stratification of marital status, severity of depression, economic and educational status highly significant difference was found i.e.(0.0001).

Our results show a somewhat better model fit after adjustment for potential confounders, such as gender and family history. Age had a significant impact. The relationship between gender and depression was established by some studies^{20,22-24} but we found no statistically significant differences in gender.

The strength of our study was the use of non-probability consecutive sampling technique best suited for our sample selection and study design, as our eligibility criteria was stringent. The use of operational definitions of the dependent and independent variable also minimizes the source of bias in our study. The main limitations of our study were the use of a weak study design (cross-sectional); the analysis and strength of evidence of which is limited and therefore the study design does not require any prior sample size calculation. Also limited outcomes selected in our study affects the worth of our study. There were many variables and factors that have associated with our independent and outcome variables that could have been included in our study. The use of non-probability sampling also limits generalizability; however, we had a small number of patients and no follow up.





CONCLUSION

Current study concludes that most of the depressive patients had “LOW” stressful life event severity preceding the index episode. Hence, prevention and management strategies for depression, need to focus even more on “LOW” stressful life events.

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